

PESHAWAR ELECTRIC SUPPLY COMPANY LIMITED

Phone: 091-9212041-47

Fax: 091-9211987

Regd

OFFICE OF THE
FINANCE DIRECTOR(PESCO)
WAPDA HOUSE PESHAWAR.

No. 226 /FD/PESCO/Payment

Date: 10/8/2015

NEPRA

NEPRA Office Building, G-5/1,
Attaturak Avenue (East) Islamabad.

P/ND
051-9205500

SUBJECT:- REMITTANCE ON ACCOUNT OF CHEQUE.

Enclosed please find herewith a cross cheque Bearing
No. 34428760 dated: 10.8.15 amounting to Rs. 755870/-
on account of payment of fee for submission of Multi Year
Tariff Petition for FY 2015-16 to 2018-20.

Gross Amount:-

839856.

Income Tax:-

83986.

Professional Tax:-

-

L.D:-

-

Net Amount:-

755870.

D.A

As above

For *Manahan & M.A.H.*

— DG(Fin)

Cd. to:

12.08.15

— D/Ry-I/SAR

cc: Chairman

vc/m(m)

— M/F

m.(T)

m.(M.A.E)

m.(Lic)

[Signature]
Accounts Officer
(Payment)

Registrar

8649

Dy No.

Dated: 12-08-15



Payee's A/C Only
CHANDIA BRANCH,

Cheque No 13 34428760

Date _____

10082015

Pay

Pay NERA Island d. or bearer
 in full of Seven Hundred & Fifty Five Dollars &
Eight Hundred & 9. Twenty one.

PKR-7558701

PK22ABPA0010001691250084

DIRECTOR FINANCE PESCO (C.E)

Add. Dy: Manager A/c's

Deputy Manager (HRM)

Please do not write below this line.

PESCO, Peshawar

O/o Finance Director PESCO
Wapda House Peshawar

#34428760#014070

314

PESHAWAR ELECTRIC SUPPLY COMPANY LIMITED

TARIFF PETITION FOR FY 2015-16 TO 2019-20



PREPARED BY

Peshawar Electric Supply Company Limited

August 2015

Annexure "D" to "H"

No. Of Consumers and %age Growth

Category	2014-15	Growth	2015-16 (Pro)	Growth	2016-17 (Pro)	Growth	2017-18 (Pro)	Growth	2018-19 (Pro)	Growth	2019-20 (Pro)	Growth
Domestic	2602181	3%	2648834	2%	2710484	2%	2772143	2%	2833812	2%	2895465	2%
Commercial	298739	3%	301227	1%	308234	2%	315241	2%	322250	2%	329258	2%
Industrial	30344	2%	30123	-1%	30823	2%	31524	2%	32225	2%	32926	2%
Bulk	860	1%	879	2%	881	0%	883	0%	885	0%	888	0%
Others	1114	1%	1085	-3%	1092	1%	1098	1%	1105	1%	1114	1%
T/Well	23328	0%	30123	29%	30823	2%	31524	2%	32225	2%	32926	2%
TOTAL	2956566	3%	3012271	2%	3082337	2%	3152413	2%	3222502	2.2%	3292577	2.2%

UNITS BILLED & %AGE GROWTH

Category	2014-15	Growth	2015-16 (Pro)	Growth	2016-17 (Pro)	Growth	2017-18 (Pro)	Growth	2018-19 (Pro)	Growth	2019-20 (Pro)	Growth
Domestic	4296.70	2%	4620.10	8%	4803	4%	5039	5%	5231	4%	5400	3%
Commercial	653.63	5%	688.09	5%	716	4%	752	5%	779	4%	804	3%
Industrial	2019.91	2%	2047.39	1%	2129	4%	2233	5%	2318	4%	2393	3%
Bulk	264.06	4%	283.14	7%	294	4%	309	5%	321	4%	331	3%
Others	272.00	-10%	285.42	5%	297	4%	311	5%	323	4%	333	3%
T/Well	92.61	-8%	100.86	9%	105	4%	110	5%	114	4%	118	3%
TOTAL	7598.91	2%	8025.00	6%	8344.35	4%	8754.40	5%	9086.40	3.8%	9378.62	3.2%



Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2015-16

	(KW)	(MkWh)	(%age)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)
Residential - A1 Sanctioned Load Less Than 5Kw	-	-	-	-	-	-	-	-	-
UPTO-50 Units per month	-	263.25	3.28%	-	1,053	-	1,177	-	124
Consumption Exceeding 50 Units	-	-	0.00%	-	-	-	-	-	-
1-100 Units P/M	-	719.09	8.96%	-	8,989	-	10,051	-	1,062
101-200 Units P/M	-	1,489.99	18.57%	-	24,585	-	27,490	-	2,905
201-300 Units P/M	-	792.06	9.87%	-	13,069	-	14,613	-	1,544
301-700 Units P/M	-	718.13	8.95%	-	12,855	-	14,374	-	1,519
ABOVE 700 Units	-	342.10	4.26%	-	6,500	-	7,268	-	768
Time of Day (TOD - Peak) For Load 5Kw & Above	-	47.06	0.59%	-	894	-	1,000	-	106
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	165.76	2.07%	-	2,205	-	2,465	-	261
Temporary E-1 (I) Residential Supply	-	0.22	0.00%	-	4	-	4.84	-	0.49
TOTAL DOMESTIC	-	4,537.66	55.54%	-	70,153	-	78,444	-	8,291
Commercial - A2	-	-	-	-	-	-	-	-	-
For Load Less 5KW	-	243.54	3.03%	-	4,827	-	5,174	-	547
For Load requirement 5KW & Above	0	12.63	0.16%	169	189	169	212	-	22
Time of Day (TOD - Peak)	-	82.94	1.03%	-	1,576	-	1,762	-	188
Time of Day (TOD - Off-Peak)	2	347.13	4.33%	756	4,617	756	5,182	-	548
Temporary E-1 (II) Commercial Supply	-	4.05	0.05%	-	77	-	88	-	9
TOTAL COMMERCIAL	2	690.28	8.60%	925	11,086	925	12,396	-	1,310
INDUSTRIAL	-	-	-	-	-	-	-	-	-
B-1 upto 25 Kw (at 400/230 VOLTS)	-	30.09	0.37%	-	436	-	488	-	52
B-1b (09) T Peak	-	31.25	0.39%	-	594	-	664	-	70
B-1b (09) T Off Peak	-	153.57	1.91%	-	2,042	-	2,284	-	241
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	8.85	0.09%	359	96	359	107	-	11
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	70.99	0.88%	-	1,349	-	1,508	-	159
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	452.25	5.84%	751	5,924	751	6,825	-	700
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	64.07	0.80%	-	1,217	-	1,361	-	144
B-3 - TOD (off-peak)	1	738.18	9.20%	499	9,596	499	10,730	-	1,134
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	87.42	0.84%	-	1,281	-	1,432	-	151
B-4 TOD (off-peak)	1	518.51	6.46%	431	6,689	431	7,479	-	790
Temporary E-2 Industrial Supply	-	0.03	0.00%	-	0.48	-	0.53	-	0.06
TOTAL INDUSTRIAL	5	2,133.18	26.58%	2,040	29,225	2,040	32,679	-	3,454
Single Point Supply (Bulk)	-	-	-	-	-	-	-	-	-
C-1 (a) Sanctioned Load Less than 5KW	-	0.36	0.00%	-	5	-	6	-	1
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	53.08	0.66%	187	770	167	881	-	91
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	17.80	0.22%	-	338	-	378	-	40
Bulk Supply C-1(c) (TOD) Off-Peak	0	45.82	0.57%	29	609	29	681	-	72
C-2 (a) 11/33 KV upto & including 5000 Kw	0	31.54	0.39%	8	451	8	504	-	53
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	23.39	0.29%	-	444	-	497	-	53
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	90.28	1.12%	60	1,163	60	1,322	-	140
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	3.82	0.05%	66	73	66	81	-	9
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	12.79	0.16%	13	166	13	186	-	20
TOTAL BULK SUPPLY	1	278.87	3.47%	343	4,039	343	4,517	-	477
Agricultural T-Wells - Tariff D	-	-	-	-	-	-	-	-	-
D-1(a) Scarp Less than 5KW	-	5.99	0.07%	-	87	-	97	-	10
D-2 Agri T/Well	1	24.80	0.31%	108	347	106	388	-	41
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	12.66	0.16%	-	241	-	269	-	28
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	54.35	0.68%	81	707	81	790	-	84
TOTAL AGRICULTURAL TWELL	1	97.80	1.22%	187	1,381	187	1,544	-	163
Public Lighting - Tariff-G	-	14.97	0.19%	-	210	-	234	-	25
Residential Colony att. to Industrial - H	-	2.51	0.03%	-	35	-	39	-	4
K (AJK)	0	0.80	0.01%	39	11	39	13	-	1
Time of Day (TOD - Peak)	-	37.12	0.46%	-	705	-	789	-	83
Time of Day (TOD - Off-Peak)	2	231.79	2.89%	790	3,083	790	3,447	-	364
Company Total	12	8,025	100%	4,324	119,929	4,324	134,102	-	14,173

Distribution Company

2016-17

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

	(KW)	(MkWh)	(%)	(Min Ra)	(Min Ra)	(Min Ra)	(Min Ra)	(Min Ra)	(Min Ra)
Residential - A1 Sanctioned Load Less Than 5Kw	-	-	-	-	-	-	-	-	-
UPTO-50 Units per month	-	273.88	3.28%	-	1,095	-	1,200	-	105
Consumption Exceeding 50 Units	-	-	-	-	-	-	-	-	-
1-100 Units P/M	-	747.58	8.96%	-	9,345	-	10,245	-	900
101-200 Units P/M	-	1,549.03	18.57%	-	25,559	-	28,022	-	2,463
201-300 Units P/M	-	823.44	9.87%	-	13,587	-	14,896	-	1,309
301-700 Units P/M	-	746.59	8.95%	-	13,364	-	14,852	-	1,288
ABOVE 700 Units	-	355.86	4.28%	-	8,757	-	7,409	-	651
Time of Day (TOD - Peak) For Load 5Kw & Above	-	46.93	0.59%	-	930	-	1,019	-	90
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	172.33	2.07%	-	2,292	-	2,513	-	221
Temporary E-1 (I) Residential Supply	-	0.23	0.00%	-	4	-	4.73	-	0.42
TOTAL DOMESTIC	-	4,717.47	56.54%	-	72,933	-	79,960	-	7,027
Commercial - A2	-	-	-	-	-	-	-	-	-
For Load Less 5Kw	-	253.19	3.03%	-	4,811	-	5,274	-	484
For Load requirement 5Kw & Above	0	13.13	0.18%	189	197	189	216	-	19
Time of Day (TOD - Peak)	-	86.22	1.03%	-	1,838	-	1,796	-	158
Time of Day (TOD - Off-Peak)	2	360.88	4.33%	756	4,800	756	5,262	-	462
Temporary E-1(II) Commercial Supply	-	4.21	0.05%	-	80	-	88	-	8
TOTAL COMMERCIAL	2	717.64	8.60%	925	11,528	925	12,636	-	1,110
INDUSTRIAL	-	-	-	-	-	-	-	-	-
B-1 upto 25 Kw (at 400/230 VOLTS)	-	31.28	0.37%	-	454	-	497	-	44
B-1b (09) T Peak	-	32.49	0.39%	-	817	-	877	-	59
B-1b (09) T Off Peak	-	159.65	1.91%	-	2,123	-	2,328	-	205
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.12	0.09%	359	100	359	109	-	10
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	73.80	0.88%	-	1,402	-	1,537	-	135
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	470.17	5.64%	751	6,159	751	6,753	-	593
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	66.81	0.80%	-	1,268	-	1,387	-	122
B-3 - TOD (off-peak)	1	787.41	9.20%	499	9,976	499	10,938	-	961
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	70.09	0.84%	-	1,332	-	1,460	-	126
B-4 TOD (off-peak)	1	539.06	6.46%	431	6,954	431	7,624	-	870
Temporary E-2 Industrial Supply	-	0.03	0.00%	-	0.50	-	0.54	-	0.05
TOTAL INDUSTRIAL	5	2,217.71	26.58%	2,040	30,383	2,040	33,311	-	2,927
Single Point Supply (Bulk)	-	-	-	-	-	-	-	-	-
C-1 (a) Sanctioned Load Less than 5Kw	-	0.38	0.00%	-	8	-	8	-	1
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	55.18	0.68%	167	800	167	877	-	77
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	18.50	0.22%	-	352	-	385	-	34
Bulk Supply C-1(c) (TOD) Off-Peak	0	47.63	0.57%	29	634	29	695	-	61
C-2 (a) 11/33 KV upto & Including 5000 Kw	0	32.79	0.39%	8	469	8	514	-	45
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & Including 5000 Kw	-	24.31	0.29%	-	462	-	506	-	45
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & Including 5000 Kw	0	93.86	1.12%	60	1,230	60	1,348	-	118
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	3.97	0.05%	66	75	66	83	-	7
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	13.29	0.16%	13	173	13	189	-	17
TOTAL BULK SUPPLY	1	289.92	3.47%	343	4,199	343	4,804	-	405
Agricultural T-Well - Tariff D	-	-	-	-	-	-	-	-	-
D-1(a) Scarp Less than 5KW	-	6.23	0.07%	-	90	-	99	-	9
D-2 Agri TWell	1	25.78	0.31%	106	361	106	396	-	35
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	13.16	0.16%	-	250	-	274	-	24
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	58.51	0.68%	81	735	81	805	-	71
TOTAL AGRICULTURAL TWell	1	101.68	1.22%	187	1,438	187	1,574	-	136
Public Lighting - Tariff-G	-	15.58	0.19%	-	218	-	239	-	21
Residential Colony att. to Industrial - H	-	2.61	0.03%	-	37	-	40	-	4
K (AJK)	0	0.83	0.01%	39	12	39	13	-	1
Time of Day (TOD - Peak)	-	38.59	0.46%	-	733	-	804	-	71
Time of Day (TOD - Off-Peak)	2	240.98	2.89%	790	3,205	790	3,514	-	309
Company Total	12	8,343	100%	4,324	124,681	4,324	136,695	-	12,013

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2017-18

	(KW)	(MkWh)	(%)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)
Residential - A1 Sanctioned Load Less Than 5Kw	-	-	-	-	-	-	-	-	-
UPTO-50 Units per month	-	287.13	3.28%	-	1,149	-	1,252	-	104
Consumption Exceeding 50 Units	-	-	0.00%	-	-	-	-	-	-
1-100 Units P/M	-	784.32	8.96%	-	9,804	-	10,689	-	885
101-200 Units P/M	-	1,625.15	18.57%	-	26,815	-	29,236	-	2,421
201-300 Units P/M	-	863.91	9.87%	-	14,255	-	15,542	-	1,287
301-700 Units P/M	-	783.28	8.95%	-	14,021	-	15,287	-	1,268
ABOVE 700 Units	-	373.13	4.26%	-	7,090	-	7,730	-	640
Time of Day (TOD - Peak) For Load 5Kw & Above	-	51.33	0.58%	-	975	-	1,063	-	88
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	180.80	2.07%	-	2,405	-	2,622	-	217
Temporary E-1 (I) Residential Supply	-	0.24	0.00%	-	5	-	4.94	-	0.41
TOTAL DOMESTIC	-	4,949.30	56.54%	-	76,517	-	83,425	-	6,909
Commercial - A2	-	-	-	-	-	-	-	-	-
For Load Less 5Kw	-	265.84	3.03%	-	5,047	-	5,503	-	456
For Load requirement 5Kw & Above	0	13.77	0.16%	169	207	169	225	-	19
Time of Day (TOD - Peak)	-	90.46	1.03%	-	1,719	-	1,874	-	155
Time of Day (TOD - Off-Peak)	2	378.82	4.33%	756	5,036	756	5,490	-	455
Temporary E-1(II) Commercial Supply	-	4.42	0.05%	-	84	-	92	-	8
TOTAL COMMERCIAL	2	752.90	8.60%	925	12,092	925	13,184	-	1,092
INDUSTRIAL	-	-	-	-	-	-	-	-	-
B-1 upto 25 Kw (at 400/230 VOLTS)	-	32.82	0.37%	-	478	-	519	-	43
B-1b (09) T Peak	-	34.09	0.39%	-	648	-	706	-	58
B-1b (09) T Off Peak	-	167.50	1.91%	-	2,228	-	2,429	-	201
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.47	0.08%	359	105	359	114	-	9
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	77.43	0.88%	-	1,471	-	1,604	-	133
B-2 - TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	493.28	5.64%	751	6,482	751	7,045	-	583
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	69.88	0.80%	-	1,328	-	1,448	-	120
B-3 - TOD (off-peak)	1	805.12	9.20%	499	10,467	499	11,412	-	945
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	73.53	0.84%	-	1,397	-	1,523	-	126
B-4 TOD (off-peak)	1	565.55	6.46%	431	7,296	431	7,954	-	659
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	0.52	-	0.57	-	0.05
TOTAL INDUSTRIAL	5	2,326.70	26.58%	2,040	31,876	2,040	34,754	-	2,878
Single Point Supply (Bulk)	-	-	-	-	-	-	-	-	-
C-1 (a) Sanctioned Load Less than 5Kw	-	0.40	0.00%	-	6	-	6	-	1
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	57.89	0.66%	167	839	167	915	-	76
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	19.41	0.22%	-	369	-	402	-	33
Bulk Supply C-1(c) (TOD) Off-Peak	0	49.97	0.57%	29	665	29	725	-	60
C-2 (a) 11/33 KV upto & including 5000 Kw	0	34.40	0.39%	8	492	6	536	-	44
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	25.51	0.29%	-	485	-	528	-	44
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	98.47	1.12%	60	1,290	60	1,406	-	116
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.17	0.05%	66	79	66	66	-	7
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	13.95	0.16%	13	181	13	198	-	16
TOTAL BULK SUPPLY	1	304.16	3.47%	343	4,406	343	4,804	-	398
Agricultural T- Wells - Tariff D	-	-	-	-	-	-	-	-	-
D-1(a) Scarp Less than 5KW	-	6.53	0.07%	-	95	-	103	-	9
D-2 Agri T/Well	1	27.05	0.31%	106	379	106	413	-	34
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	13.61	0.16%	-	282	-	286	-	24
D-1(b) Off-Peak Scarp & Agricultural 5KW & Above	0	59.28	0.68%	81	771	81	840	-	70
TOTAL AGRICULTURAL T/WELL	1	106.67	1.22%	187	1,506	187	1,642	-	136
Public Lighting - Tariff-G	-	16.33	0.19%	-	229	-	248	-	21
Residential Colony att. to Industrial - H	-	2.74	0.03%	-	36	-	42	-	3
K (AJK)	0	0.87	0.01%	39	12	39	13	-	1
Time of Day (TOD - Peak)	-	40.48	0.46%	-	769	-	839	-	69
Time of Day (TOD - Off-Peak)	2	252.82	2.89%	790	3,363	790	3,666	-	304
Company Total	12	8,763	100%	4,324	130,809	4,324	142,619	-	11,811

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2018-19

	(KW)	(MkWh)	(%)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)
Residential - A1 Sanctioned Load Less Than 5Kw	-	-	-	-	-	-	-	-	-
UPTO-50 Units per month	-	298.05	3.28%	-	1,192	-	1,304	-	112
Consumption Exceeding 50 Units	-	-	0.00%	-	-	-	-	-	-
1-100 Units P/M	-	814.16	8.96%	-	10,177	-	11,134	-	957
101-200 Units P/M	-	1,686.98	18.57%	-	27,835	-	30,453	-	2,618
201-300 Units P/M	-	896.78	9.87%	-	14,787	-	18,188	-	1,392
301-700 Units P/M	-	813.08	8.95%	-	14,554	-	15,923	-	1,369
ABOVE 700 Units	-	387.33	4.28%	-	7,359	-	8,051	-	692
Time of Day (TOD - Peak) For Load 5Kw & Above	-	53.29	0.59%	-	1,012	-	1,108	-	85
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	187.88	2.07%	-	2,496	-	2,731	-	235
Temporary E-1 (I) Residential Supply	-	0.25	0.00%	-	5	-	5.14	-	0.44
TOTAL DOMESTIC	-	5,137.59	56.54%	-	79,428	-	86,898	-	7,470
Commercial - A2	-	-	-	-	-	-	-	-	-
For Load Less 5Kw	-	275.74	3.03%	-	5,239	-	5,732	-	493
For Load requirement 5Kw & Above	0	14.30	0.18%	169	214	169	235	-	20
Time of Day (TOD - Peak)	-	93.90	1.03%	-	1,784	-	1,952	-	168
Time of Day (TOD - Off-Peak)	2	393.02	4.33%	756	5,227	758	5,719	-	492
Temporary E-1 (II) Commercial Supply	-	4.59	0.05%	-	87	-	95	-	8
TOTAL COMMERCIAL	2	781.55	8.60%	925	12,552	925	13,733	-	1,181
INDUSTRIAL	-	-	-	-	-	-	-	-	-
B-1 upto 25 Kw (at 400/230 VOLTS)	-	34.06	0.37%	-	494	-	540	-	48
B-1b (09) T Peak	-	35.38	0.39%	-	672	-	735	-	63
B-1b (09) T Off Peak	-	173.87	1.91%	-	2,312	-	2,530	-	217
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.76	0.09%	359	109	359	119	-	10
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	80.38	0.88%	-	1,527	-	1,671	-	144
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	512.04	5.64%	751	6,708	751	7,339	-	631
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	72.54	0.80%	-	1,378	-	1,508	-	130
B-3 - TOD (off-peak)	1	835.75	9.20%	499	10,865	499	11,887	-	1,022
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	76.33	0.84%	-	1,450	-	1,587	-	138
B-4 TOD (off-peak)	1	587.07	6.46%	431	7,573	431	8,285	-	712
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	0.54	-	0.59	-	0.05
TOTAL INDUSTRIAL	5	2,415.21	26.58%	2,040	33,089	2,040	36,201	-	3,112
Single Point Supply (Bulk)	-	-	-	-	-	-	-	-	-
C-1 (a) Sanctioned Load Less than 5Kw	-	0.41	0.00%	-	6	-	7	-	1
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	80.09	0.66%	167	871	167	953	-	82
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	20.15	0.22%	-	383	-	419	-	36
Bulk Supply C-1(c) (TOD) Off-Peak	0	51.88	0.57%	29	690	29	755	-	65
C-2 (a) 11/33 KV upto & including 5000 Kw	0	35.71	0.39%	8	511	8	559	-	48
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	26.48	0.29%	-	503	-	550	-	47
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	102.22	1.12%	60	1,339	60	1,485	-	128
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.33	0.05%	66	82	66	90	-	8
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	14.48	0.16%	13	188	13	206	-	18
TOTAL BULK SUPPLY	1	316.74	3.47%	343	4,673	343	5,004	-	430
Agricultural T-Well - Tariff D	-	-	-	-	-	-	-	-	-
D-1(a) Scarp Less than 5Kw	-	6.78	0.07%	-	98	-	108	-	9
D-2 Agri T/Well	1	28.08	0.31%	106	393	106	430	-	37
D-1 (b) - Peak Scarp & Agricultural 5Kw & Above	-	14.34	0.16%	-	272	-	298	-	26
D-1 (b) Off-Peak Scarp & Agricultural 5Kw & Above	0	81.54	0.88%	61	800	61	875	-	75
TOTAL AGRICULTURAL T/Well	1	110.73	1.22%	137	1,564	187	1,711	-	147
Public Lighting - Tariff-G	-	16.95	0.19%	-	237	-	260	-	22
Residential Colony att. to industrial - H	-	2.85	0.03%	-	40	-	44	-	4
K (AJK)	0	0.91	0.01%	39	13	39	14	-	1
Time of Day (TOD - Peak)	-	42.03	0.46%	-	799	-	874	-	75
Time of Day (TOD - Off-Peak)	2	262.44	2.89%	790	3,490	790	3,819	-	328
Company Total	12	9,086	100%	4,324	135,785	4,324	148,556	-	12,771

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2019-20

	(KW)	(MkWh)	(%)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)	(Min Rs)
Residential - A1 Sanctioned Load Less Than 5Kw	-	-	-	-	-	-	-	-	-
UPTO-50 Units per month	-	307.63	3.28%	-	1,231	-	1,354	-	123
Consumption Exceeding 50 Units	-	-	-	-	-	-	-	-	-
1-100 Units P/M	-	840.32	8.96%	-	10,504	-	11,558	-	1,053
101-200 Units P/M	-	1,741.20	18.57%	-	28,730	-	31,611	-	2,881
201-300 Units P/M	-	925.60	9.87%	-	15,272	-	16,804	-	1,532
301-700 Units P/M	-	839.21	8.95%	-	15,022	-	16,528	-	1,507
ABOVE 700 Units	-	399.78	4.26%	-	7,596	-	8,358	-	762
Time of Day (TOD - Peak) For Load 5Kw & Above	-	55.00	0.59%	-	1,045	-	1,150	-	105
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	193.71	2.07%	-	2,576	-	2,835	-	258
Temporary E-1 (I) Residential Supply	-	0.28	0.00%	-	5	-	5.34	-	0.49
TOTAL DOMESTIC	-	5,302.70	56.54%	-	81,980	-	90,203	-	8,222
Commercial - A2	-	-	-	-	-	-	-	-	-
For Load Less 5Kw	-	284.60	3.03%	-	5,407	-	5,950	-	542
For Load requirement 5Kw & Above	0	14.78	0.16%	169	221	169	244	-	22
Time of Day (TOD - Peak)	-	96.92	1.03%	-	1,841	-	2,026	-	185
Time of Day (TOD - Off-Peak)	2	405.65	4.33%	756	5,395	756	5,836	-	541
Temporary E-1(II) Commercial Supply	-	4.73	0.05%	-	90	-	99	-	9
TOTAL COMMERCIAL	2	806.66	8.60%	925	12,966	926	14,266	-	1,299
INDUSTRIAL	-	-	-	-	-	-	-	-	-
B-1 upto 25 Kw (at 400/230 VOLTS)	-	35.18	0.37%	-	510	-	561	-	51
B-1b (09) T Peak	-	36.52	0.39%	-	694	-	763	-	70
B-1b (09) T Off Peak	-	179.46	1.81%	-	2,387	-	2,626	-	239
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	8.01	0.09%	359	112	359	123	-	11
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	62.96	0.66%	-	1,576	-	1,734	-	156
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	528.50	5.64%	751	6,923	751	7,618	-	694
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	74.67	0.80%	-	1,423	-	1,565	-	143
B-3 - TOD (off-peak)	1	662.61	9.20%	499	11,214	499	12,339	-	1,125
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	78.78	0.84%	-	1,497	-	1,647	-	150
B-4 TOD (off-peak)	1	605.93	6.46%	431	7,817	431	8,600	-	784
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	0.56	-	0.61	-	0.06
TOTAL INDUSTRIAL	5	2,492.83	26.58%	2,040	34,153	2,040	37,678	-	3,426
Single Point Supply (Bulk)	-	-	-	-	-	-	-	-	-
C-1 (a) Sanctioned Load Less than 5Kw	-	0.43	0.00%	-	6	-	7	-	1
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	62.03	0.66%	167	899	167	990	-	90
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	20.80	0.22%	-	395	-	435	-	40
Bulk Supply C-1(c) (TOD) Off-Peak	0	53.54	0.57%	29	712	29	784	-	71
C-2 (a) 11/33 KV upto & Including 5000 Kw	0	36.85	0.39%	6	527	8	580	-	53
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & Including 5000 Kw	-	27.33	0.29%	-	519	-	571	-	52
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & Including 5000 Kw	0	105.50	1.12%	60	1,382	60	1,521	-	139
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.47	0.05%	66	85	66	93	-	9
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	14.94	0.16%	13	194	13	214	-	19
TOTAL BULK SUPPLY	1	325.88	3.47%	343	4,720	343	5,194	-	473
Agricultural T-Well - Tariff D	-	-	-	-	-	-	-	-	-
D-1(a) Scarp Less than 5KW	-	7.00	0.07%	-	101	-	112	-	10
D-2 Agri TWell	1	28.98	0.31%	106	406	106	446	-	41
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	14.60	0.16%	-	281	-	309	-	28
O-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	63.52	0.68%	81	826	81	909	-	83
TOTAL AGRICULTURAL TWell	1	114.29	1.22%	167	1,614	167	1,776	-	162
Public Lighting - Tariff-G	-	17.50	0.19%	-	245	-	269	-	25
Residential Colony att. to Industrial - H	-	2.94	0.03%	-	41	-	45	-	4
K (AJK)	0	0.94	0.01%	39	13	39	14	-	1
Time of Day (TOD - Peak)	-	43.38	0.46%	-	824	-	907	-	83
Time of Day (TOD - Off-Peak)	2	270.87	2.89%	790	3,603	790	3,964	-	381
Company Total	12	9,378	100%	4,324	140,149	4,324	154,206	-	14,056

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2015-16

	(KW)	(MkWh)	(%)age	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)
Residential - A1 Sanctioned Load Less Than 5Kw									
UPTO-50 Units per month	-	263.25	3.28%	-	4.00	-	4.47	-	0.47
Consumption Exceeding 50 Units	-	-	-	-	-	-	-	-	-
1-100 Units P/M	-	719.09	8.96%	-	12.50	-	13.98	-	1.48
101-200 Units P/M	-	1,489.99	18.57%	-	18.50	-	18.45	-	1.95
201-300 Units P/M	-	792.06	9.87%	-	18.50	-	18.45	-	1.95
301-700 Units P/M	-	718.13	8.95%	-	17.90	-	20.02	-	2.12
ABOVE 700 Units	-	342.10	4.26%	-	19.00	-	21.25	-	2.25
Time of Day (TOD - Peak) For Load 5Kw & Above	-	47.06	0.59%	-	19.00	-	21.25	-	2.25
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	165.76	2.07%	-	13.30	-	14.87	-	1.57
Temporary E-1 (I) Residential Supply	-	0.22	0.00%	-	19.00	-	21.25	-	2.25
TOTAL DOMESTIC	-	4,537.66	56.54%	-	15.46	-	17.29	-	1.83
Commercial - A2									
For Load Less 5KW	-	243.54	3.03%	-	19.00	-	21.25	-	2.25
For Load requirement 5KW & Above	0.423	12.63	0.16%	400	15.00	400	16.77	-	1.77
Time of Day (TOD - Peak)	-	82.94	1.03%	400	19.00	400	21.25	-	2.25
Time of Day (TOD - Off-Peak)	1.890	347.13	4.33%	400	13.30	400	14.87	-	1.57
Temporary E-1 (II) Commercial Supply	-	4.05	0.05%	-	19.00	-	21.25	-	2.25
TOTAL COMMERCIAL	2.313	690.28	8.60%	1.34	16.06	1.34	17.96	-	1.90
INDUSTRIAL									
B-1 upto 25 Kw (at 400/230 VOLTS)	-	30.09	0.37%	-	14.50	-	16.21	-	1.71
B-1b (09) T Peak	-	31.25	0.39%	-	19.00	-	21.25	-	2.25
B-1b (09) T Off Peak	-	153.57	1.91%	-	13.30	-	14.87	-	1.57
B-2(a) exceeding 25-500 Kw (at 400 Volts)	0.898	8.85	0.09%	400	14.00	400	15.85	-	1.85
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	70.99	0.88%	400	19.00	400	21.25	-	2.25
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	1.878	452.25	5.64%	400	13.10	400	14.85	-	1.55
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	64.07	0.80%	380	19.00	380	21.25	-	2.25
B-3 - TOD (off-peak)	1.313	738.16	9.20%	380	13.00	380	14.54	-	1.54
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	67.42	0.84%	380	19.00	380	21.25	-	2.25
B-4 TOD (off-peak)	1.197	518.51	6.46%	380	12.90	380	14.42	-	1.52
Temporary E-2 Industrial Supply	-	0.03	0.00%	-	14.50	-	16.21	-	1.71
TOTAL INDUSTRIAL	5.285	2,133.16	26.58%	0.96	13.70	0.96	16.32	-	1.82
Single Point Supply (Bulk)									
C-1 (a) Sanctioned Load Less than 5Kw	-	0.36	0.00%	-	15.00	-	16.77	-	1.77
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0.418	53.08	0.66%	400	14.50	400	16.21	-	1.71
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	17.80	0.22%	400	19.00	400	21.25	-	2.25
Bulk Supply C-1(c) (TOD) Off-Peak	0.073	45.82	0.57%	400	13.30	400	14.87	-	1.57
C-2 (a) 11/33 KV upto & Including 5000 Kw	0.020	31.54	0.39%	380	14.30	380	15.99	-	1.69
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	23.39	0.29%	380	19.00	380	21.25	-	2.25
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0.158	90.28	1.12%	380	13.10	380	14.85	-	1.55
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0.183	3.82	0.05%	380	19.00	380	21.25	-	2.25
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0.036	12.79	0.16%	380	13.00	380	14.54	-	1.54
TOTAL BULK SUPPLY	0.887	276.87	3.47%	1.23	14.49	1.23	16.20	-	1.71
Agricultural T-Well - Tariff D									
D-1(a) Scarp Less than 5KW	-	5.99	0.07%	-	14.50	-	16.21	-	1.71
D-2 Agri T/Well	0.530	24.80	0.31%	200	14.00	200	15.85	-	1.85
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	12.66	0.16%	200	19.00	200	21.25	-	2.25
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0.405	54.35	0.68%	200	13.00	200	14.54	-	1.54
TOTAL AGRICULTURAL T/WELL	0.935	97.80	1.22%	1.91	14.12	1.91	15.79	-	1.67
Public Lighting - Tariff-G									
Residential Colony att. to Industrial - H	-	2.51	0.03%	-	14.00	-	15.85	-	1.85
K (AJK)	0.108	0.80	0.01%	380	14.00	380	15.85	-	1.85
Time of Day (TOD - Peak)	-	37.12	0.46%	380	19.00	380	21.25	-	2.25
Time of Day (TOD - Off-Peak)	2.194	231.79	2.89%	380	13.30	380	14.87	-	1.57
Company Total	11.723	6,025	100%	0.54	14.94	0.54	16.71	-	1.77

02

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2016-17

	(KW)	(MkWh)	(%)	(RatKWh)	(RatKWh)	(RatKWh)	(RatKWh)	(RatKWh)	(RatKWh)
Residential - A1 Sanctioned Load Less Than 5Kw									
UPTO-50 Units per month	-	273.88	3.28%	-	4.00	-	4.39	-	0.39
Consumption Exceeding 50 Units	-	-	0.00%	-	-	-	-	-	-
1-100 Units P/M	-	747.58	8.96%	-	12.50	-	13.70	-	1.20
101-200 Units P/M	-	1,549.03	18.57%	-	16.50	-	18.09	-	1.59
201-300 Units P/M	-	823.44	9.87%	-	16.50	-	18.09	-	1.59
301-700 Units P/M	-	746.59	8.95%	-	17.90	-	19.82	-	1.72
ABOVE 700 Units	-	355.66	4.28%	-	19.00	-	20.83	-	1.83
Time of Day (TOD - Peak) For Load 5Kw & Above	-	48.93	0.58%	-	19.00	-	20.83	-	1.83
Time of Day (TOD - Off-Peak For Load 5Kw & Above	-	172.33	2.07%	-	13.30	-	14.58	-	1.28
Temporary E-1 (I) Residential Supply	-	0.23	0.00%	-	19.00	-	20.83	-	1.83
TOTAL DOMESTIC	-	4,717.47	56.54%	-	15.46	-	16.95	-	1.49
Commercial - A2									
For Load Less 5KW	-	253.19	3.03%	-	19.00	-	20.83	-	1.83
For Load requirement 5KW & Above	0	13.13	0.18%	400	15.00	400	16.45	-	1.45
Time of Day (TOD - Peak)	-	88.22	1.03%	400	19.00	400	20.83	-	1.83
Time of Day (TOD - Off-Peak	2	360.88	4.33%	400	13.30	400	14.58	-	1.28
Temporary E-1(ii) Commercial Supply	-	4.21	0.05%	-	19.00	-	20.83	-	1.83
TOTAL COMMERCIAL	2.31	717.64	8.60%	1.29	16.06	1.29	17.61	-	1.55
INDUSTRIAL									
B-1 upto 25 Kw (at 400/230 VOLTS)	-	31.28	0.37%	-	14.50	-	15.90	-	1.40
B-1b (09) T Peak	-	32.49	0.39%	-	19.00	-	20.83	-	1.83
B-1b (09) T Off Peak	-	159.85	1.91%	-	13.30	-	14.58	-	1.28
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.12	0.09%	400	14.00	400	15.35	-	1.35
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	73.80	0.88%	400	19.00	400	20.83	-	1.83
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	470.17	5.64%	400	13.10	400	14.36	-	1.26
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	66.81	0.80%	380	19.00	380	20.83	-	1.83
B-3 -TOD (off-peak)	1	767.41	9.20%	380	13.00	380	14.25	-	1.25
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	70.09	0.84%	360	19.00	360	20.83	-	1.83
B-4 TDD (off-peak)	1	539.08	6.46%	360	12.90	380	14.14	-	1.24
Temporary E-2 Industrial Supply	-	0.03	0.00%	-	14.50	-	15.90	-	1.40
TOTAL INDUSTRIAL	5.29	2,217.71	26.58%	0.92	13.70	0.92	15.02	-	1.32
Single Point Supply (Bulk)									
C-1 (a) Sanctioned Load Less than 5Kw	-	0.38	0.00%	-	15.00	-	16.45	-	1.45
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	55.16	0.66%	400	14.50	400	15.90	-	1.40
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	18.50	0.22%	400	19.00	400	20.83	-	1.83
Bulk Supply C-1(c) (TOD) Off-Peak	0	47.83	0.57%	400	13.30	400	14.58	-	1.28
C-2 (a) 11/33 KV upto & including 5000 Kw	0	32.79	0.39%	380	14.30	380	15.68	-	1.38
Bulk Supply C-2(b) (TDD) Peak 11/33 KV upto & including 5000 Kw	-	24.31	0.29%	380	19.00	380	20.83	-	1.83
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	93.86	1.12%	380	13.10	380	14.36	-	1.26
Bulk Supply C-3 (b) (TDD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	3.97	0.05%	360	19.00	360	20.83	-	1.83
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	13.29	0.16%	380	13.00	360	14.25	-	1.25
TOTAL BULK SUPPLY	0.89	289.92	3.47%	1.18	14.49	1.18	15.88	-	1.40
Agricultural T-Wells - Tariff D									
D-1(a) Scarp Less than 5KW	-	6.23	0.07%	-	14.50	-	15.90	-	1.40
D-2 Agri TWell	1	25.78	0.31%	200	14.00	200	15.35	-	1.35
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	13.16	0.16%	200	19.00	200	20.83	-	1.83
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	56.51	0.68%	200	13.00	200	14.25	-	1.25
TOTAL AGRICULTURAL T/WELL	0.94	101.88	1.22%	1.84	14.12	1.84	15.38	-	1.36
Public Lighting - Tariff-G	-	15.58	0.19%	-	14.00	-	15.35	-	1.35
Residential Colony att. to Industrial - H	-	2.81	0.03%	-	14.00	-	15.35	-	1.35
K (AJK)	0	0.83	0.01%	360	14.00	360	15.35	-	1.35
Time of Day (TDD - Peak)	-	38.59	0.46%	360	19.00	360	20.83	-	1.83
Time of Day (TOD - Off-Peak	2	240.98	2.89%	360	13.30	360	14.58	-	1.28
Company Total	-11.72	8,343	100%	0.52	14.94	0.52	16.38	-	1.44

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2017-18

	(KW)	(MWh)	(%)	(Rs/KW)	(Rs/KWh)	(Rs/KW)	(Rs/KWh)	(Rs/KW)	(Rs/KWh)
Residential - A1 Sanctioned Load Less Than 5Kw									
UPTD-50 Units per month	-	287.13	3.28%	-	4.00	-	4.38	-	0.38
Consumption Exceeding 50 Units	-	-	-	-	-	-	-	-	-
1-100 Units P/M	-	784.32	8.96%	-	12.50	-	13.63	-	1.13
101-200 Units P/M	-	1,825.15	18.57%	-	16.50	-	17.99	-	1.49
201-300 Units P/M	-	863.91	9.87%	-	16.50	-	17.99	-	1.49
301-700 Units P/M	-	783.28	8.95%	-	17.90	-	19.52	-	1.62
ABOVE 700 Units	-	373.13	4.26%	-	19.00	-	20.72	-	1.72
Time of Day (TOD - Peak) For Load 5Kw & Above	-	51.33	0.59%	-	19.00	-	20.72	-	1.72
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	180.80	2.07%	-	13.30	-	14.50	-	1.20
Temporary E-1 (i) Residential Supply	-	0.24	0.00%	-	19.00	-	20.72	-	1.72
TOTAL DOMESTIC	-	4,949.30	56.54%	-	15.46	-	16.86	-	1.40
Commercial - A2									
For Load Less 5KW	-	285.84	3.03%	-	19.00	-	20.72	-	1.72
For Load requirement 5KW & Above	0	13.77	0.16%	400	15.00	400	16.35	-	1.35
Time of Day (TOD - Peak)	-	90.46	1.03%	400	19.00	400	20.72	-	1.72
Time of Day (TOD - Off-Peak)	2	378.62	4.33%	400	13.30	400	14.50	-	1.20
Temporary E-1(ii) Commercial Supply	-	4.42	0.05%	-	19.00	-	20.72	-	1.72
TOTAL COMMERCIAL	2.31	762.90	8.60%	1.23	16.06	1.23	17.51	-	1.45
INDUSTRIAL									
B-1 upto 25 Kw (at 400/230 VOLTS)	-	32.82	0.37%	-	14.50	-	15.81	-	1.31
B-1b (09) T Peak	-	34.09	0.39%	-	19.00	-	20.72	-	1.72
B-1b (09) T Off Peak	-	167.50	1.91%	-	13.30	-	14.50	-	1.20
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.47	0.09%	400	14.00	400	15.28	-	1.28
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	77.43	0.88%	400	19.00	400	20.72	-	1.72
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	493.28	5.64%	400	13.10	400	14.28	-	1.18
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	69.88	0.80%	380	19.00	380	20.72	-	1.72
B-3 - TOD (off-peak)	1	805.12	9.20%	380	13.00	380	14.17	-	1.17
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	73.53	0.84%	360	19.00	360	20.72	-	1.72
B-4 TOD (off-peak)	1	565.55	6.48%	360	12.90	360	14.06	-	1.16
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	14.50	-	15.81	-	1.31
TOTAL INDUSTRIAL	5.29	2,326.70	26.58%	0.88	13.70	0.88	14.94	-	1.24
Single Point Supply (Bulk)									
C-1 (a) Sanctioned Load Less than 5Kw	-	0.40	0.00%	-	15.00	-	16.35	-	1.35
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	57.89	0.66%	400	14.50	400	15.81	-	1.31
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	19.41	0.22%	400	19.00	400	20.72	-	1.72
Bulk Supply C-1(c) (TOD) Off-Peak	0	49.97	0.57%	400	13.30	400	14.50	-	1.20
C-2 (a) 11/33 KV upto & Including 5000 Kw	0	34.40	0.39%	380	14.30	380	15.59	-	1.29
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & Including 5000 Kw	-	25.51	0.29%	380	19.00	380	20.72	-	1.72
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & Including 5000 Kw	0	98.47	1.12%	380	13.10	380	14.28	-	1.18
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.17	0.05%	360	19.00	360	20.72	-	1.72
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	13.95	0.16%	360	13.00	360	14.17	-	1.17
TOTAL BULK SUPPLY	0.89	304.16	3.47%	1.13	14.49	1.13	15.79	-	1.31
Agricultural T-Well - Tariff D									
D-1(a) Scarp Less than 5KW	-	6.53	0.07%	-	14.50	-	15.81	-	1.31
D-2 Agri T/Well	1	27.05	0.31%	200	14.00	200	15.28	-	1.28
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	13.81	0.16%	200	19.00	200	20.72	-	1.72
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	59.28	0.68%	200	13.00	200	14.17	-	1.17
TOTAL AGRICULTURAL T/WELL	0.94	106.67	1.22%	1.75	14.12	1.75	15.40	-	1.28
Public Lighting - Tariff-G									
Residential Colony att. to Industrial - H	-	2.74	0.03%	-	14.00	-	15.28	-	1.28
K (AJK)	0	0.87	0.01%	360	14.00	360	15.28	-	1.28
Time of Day (TOD - Peak)	-	40.49	0.46%	360	19.00	360	20.72	-	1.72
Time of Day (TOD - Off-Peak)	2	252.82	2.89%	360	13.30	360	14.50	-	1.20
Company Total	11.72	8,753	100%	0.49	14.94	0.49	16.29	-	1.35

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2018-19

	(KW)	(MkWh)	(%)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)	(Rs/kWh)
Residential - A1 Sanctioned Load Less Than 5Kw									
UPTO-50 Units per month	-	298.05	3.28%	-	4.00	-	4.38	-	0.38
Consumption Exceeding 50 Units	-		0.00%	-	-	-	-	-	-
1-100 Units P/M	-	814.18	8.96%	-	12.50	-	13.68	-	1.18
101-200 Units P/M	-	1,686.98	18.57%	-	16.50	-	18.05	-	1.55
201-300 Units P/M	-	896.76	9.87%	-	16.50	-	18.05	-	1.55
301-700 Units P/M	-	613.08	8.95%	-	17.90	-	19.58	-	1.68
ABOVE 700 Units	-	387.33	4.26%	-	19.00	-	20.79	-	1.79
Time of Day (TOD - Peak) For Load 5Kw & Above	-	53.29	0.59%	-	19.00	-	20.79	-	1.79
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	187.88	2.07%	-	13.30	-	14.55	-	1.25
Temporary E-1 (I) Residential Supply	-	0.25	0.00%	-	19.00	-	20.79	-	1.79
TOTAL DOMESTIC	-	5,137.59	56.54%	-	15.46	-	16.91	-	1.45
Commercial - A2									
For Load Less 5KW	-	275.74	3.03%	-	19.00	-	20.79	-	1.79
For Load requirement 5KW & Above	0	14.30	0.16%	400	15.00	400	16.41	-	1.41
Time of Day (TOD - Peak)	-	93.90	1.03%	400	19.00	400	20.79	-	1.79
Time of Day (TOD - Off-Peak)	2	393.02	4.33%	400	13.30	400	14.55	-	1.25
Temporary E-1(ii) Commercial Supply	-	4.59	0.05%	-	19.00	-	20.79	-	1.79
TOTAL COMMERCIAL	2	781.55	8.60%	1.18	16.06	1.18	17.57	-	1.51
INDUSTRIAL									
B-1 upto 25 Kw (at 400/230 VOLTS)	-	34.06	0.37%	-	14.50	-	15.66	-	1.36
B-1b (09) T Peak	-	35.38	0.39%	-	19.00	-	20.79	-	1.79
B-1b (09) T Off Peak	-	173.87	1.91%	-	13.30	-	14.55	-	1.25
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	7.78	0.09%	400	14.00	400	15.32	-	1.32
B-2 (b) -TDD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	80.38	0.88%	400	19.00	400	20.79	-	1.79
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	512.04	5.64%	400	13.10	400	14.33	-	1.23
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	72.54	0.80%	380	19.00	380	20.79	-	1.79
B-3 - TOD (off-peak)	1	835.75	9.20%	380	13.00	380	14.22	-	1.22
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	76.33	0.84%	360	19.00	360	20.79	-	1.79
B-4 TOD (off-peak)	1	587.07	6.46%	360	12.90	360	14.11	-	1.21
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	14.50	-	15.66	-	1.36
TOTAL INDUSTRIAL	5.29	2,415.21	26.58%	0.84	13.70	0.84	14.99	-	1.29
Single Point Supply (Bulk)									
C-1 (a) Sanctioned Load Less than 5Kw	-	0.41	0.00%	-	15.00	-	16.41	-	1.41
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	80.09	0.86%	400	14.50	400	15.66	-	1.36
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	20.15	0.22%	400	19.00	400	20.79	-	1.79
Bulk Supply C-1(c) (TOD) Off-Peak	0	51.88	0.57%	400	13.30	400	14.55	-	1.25
C-2 (a) 11/33 KV upto & including 5000 Kw	0	35.71	0.39%	380	14.30	380	15.64	-	1.34
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	28.48	0.29%	380	19.00	380	20.79	-	1.79
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	102.22	1.12%	380	13.10	380	14.33	-	1.23
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.33	0.05%	360	19.00	360	20.79	-	1.79
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	14.48	0.16%	360	13.00	360	14.22	-	1.22
TOTAL BULK SUPPLY	0.89	315.74	3.47%	1.09	14.49	1.09	15.85	-	1.36
Agricultural T-Wells - Tariff D									
D-1(a) Scarp Less than 5KW	-	6.78	0.07%	-	14.50	-	15.66	-	1.36
D-2 Agri T/Well	1	28.08	0.31%	200	14.00	200	15.32	-	1.32
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	14.34	0.16%	200	19.00	200	20.79	-	1.79
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	81.54	0.88%	200	13.00	200	14.22	-	1.22
TOTAL AGRICULTURAL T/Well	0.94	110.73	1.22%	1.69	14.12	1.69	15.45	-	1.33
Public Lighting - Tariff-G									
Public Lighting - Tariff-G	-	18.95	0.19%	-	14.00	-	15.32	-	1.32
Residential Colony att. to Industrial - H									
K (AJK)	0	0.91	0.01%	360	14.00	360	15.32	-	1.32
Time of Day (TOD - Peak)	-	42.03	0.46%	360	19.00	360	20.79	-	1.79
Time of Day (TOD - Off-Peak)	2	262.44	2.89%	360	13.30	360	14.55	-	1.25
Company Total	11.72	9,086	100%	0.48	14.94	0.48	16.35	-	1.41

Distribution Company

Existing & Proposed Tariff Statement

(Monthly, Quarterly as well as Consolidated)

2019-20

	(KW)	(MkWh)	(%)	(Rs/KVAh)	(Rs/KWh)	(Rs/KVAh)	(Rs/KWh)	(Rs/KVAh)	(Rs/KWh)
Residential - A1 Sanctioned Load Less Than 5Kw									
UPTO-50 Units per month	-	307.63	3.28%	-	4.00	-	4.40	-	0.40
Consumption Exceeding 50 Units	-	-	-	-	-	-	-	-	-
1-100 Units P/M	-	840.32	8.98%	-	12.50	-	13.75	-	1.25
101-200 Units P/M	-	1,741.20	18.57%	-	16.50	-	18.15	-	1.65
201-300 Units P/M	-	925.60	9.87%	-	16.50	-	18.15	-	1.65
301-700 Units P/M	-	839.21	8.95%	-	17.90	-	19.70	-	1.80
ABOVE 700 Units	-	399.78	4.26%	-	19.00	-	20.91	-	1.91
Time of Day (TOD - Peak) For Load 5Kw & Above	-	55.00	0.59%	-	19.00	-	20.91	-	1.91
Time of Day (TOD - Off-Peak) For Load 5Kw & Above	-	193.71	2.07%	-	13.30	-	14.63	-	1.33
Temporary E-1 (I) Residential Supply	-	0.26	0.00%	-	19.00	-	20.91	-	1.91
TOTAL DOMESTIC	-	5,302.70	56.54%	-	15.46	-	17.01	-	1.66
Commercial - A2									
For Load Less 5KW	-	284.60	3.03%	-	19.00	-	20.91	-	1.91
For Load requirement 5KW & Above	0	14.76	0.16%	400	15.00	400	16.50	-	1.50
Time of Day (TOD - Peak)	-	96.92	1.03%	400	19.00	400	20.91	-	1.91
Time of Day (TOD - Off-Peak)	2	405.65	4.33%	400	13.30	400	14.63	-	1.33
Temporary E-1(II) Commercial Supply	-	4.73	0.05%	-	19.00	-	20.91	-	1.91
TOTAL COMMERCIAL	2.31	806.66	8.60%	1.15	16.06	1.15	17.67	-	1.61
INDUSTRIAL									
B-1 upto 25 Kw (at 400/230 VOLTS)	-	35.16	0.37%	-	14.50	-	15.95	-	1.45
B-1b (09) T Peak	-	36.52	0.39%	-	19.00	-	20.91	-	1.91
B-1b (09) T Off Peak	-	179.46	1.91%	-	13.30	-	14.63	-	1.33
B-2(a) exceeding 25-500 Kw (at 400 Volts)	1	8.01	0.08%	400	14.00	400	15.40	-	1.40
B-2 (b) -TOD (Peak) exceeding 25-500 Kw (at 400 Volts)	-	82.96	0.88%	400	19.00	400	20.91	-	1.91
B-2 -TOD (off-peak) exceeding 25-500 Kw (at 400 Volts)	2	528.50	5.64%	400	13.10	400	14.41	-	1.31
B-3 TOD (peak) (for all loads upto 5000 Kw at 11, 33 KV)	-	74.67	0.80%	380	19.00	380	20.91	-	1.91
B-3 - TOD (off-peak)	1	862.61	9.20%	380	13.00	380	14.30	-	1.30
B-4 TOD (peak) (for all loads at 66, 132 KV & Above)	-	76.76	0.84%	360	19.00	360	20.91	-	1.91
B-4 TOD (off-peak)	1	605.93	6.46%	360	12.90	360	14.19	-	1.29
Temporary E-2 Industrial Supply	-	0.04	0.00%	-	14.50	-	15.95	-	1.45
TOTAL INDUSTRIAL	5.29	2,492.83	26.58%	0.82	13.70	0.82	15.07	-	1.37
Single Point Supply (Bulk)									
C-1 (a) Sanctioned Load Less than 5Kw	-	0.43	0.00%	-	15.00	-	16.50	-	1.50
C-1 (b) Sanctioned Load 5Kw & upto 500 Kw	0	62.03	0.66%	400	14.50	400	15.95	-	1.45
Bulk Supply C-1(c) for supply at 400/230 Volts 5Kw & upto 500 Kw Peak	-	20.80	0.22%	400	19.00	400	20.91	-	1.91
Bulk Supply C-1(c) (TOD) Off-Peak	0	53.54	0.57%	400	13.30	400	14.63	-	1.33
C-2 (a) 11/33 KV upto & including 5000 Kw	0	36.65	0.39%	380	14.30	380	15.73	-	1.43
Bulk Supply C-2(b) (TOD) Peak 11/33 KV upto & including 5000 Kw	-	27.33	0.29%	380	19.00	380	20.91	-	1.91
Bulk Supply C-2(b) (TOD) Off-Peak 11/33 KV upto & including 5000 Kw	0	105.50	1.12%	380	13.10	380	14.41	-	1.31
Bulk Supply C-3 (b) (TOD) Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	4.47	0.05%	380	19.00	380	20.91	-	1.91
Bulk Supply C-3 (b) (TOD) Off-Peak at 66 Kv & above & sanctioned load above 5000 Kw	0	14.94	0.16%	360	13.00	360	14.30	-	1.30
TOTAL BULK SUPPLY	0.89	325.88	3.47%	1.05	14.49	1.05	15.94	-	1.45
Agricultural T-Well - Tariff D									
D-1(a) Scarp Less than 5KW	-	7.00	0.07%	-	14.50	-	15.95	-	1.45
D-2 Agri TWell	1	28.98	0.31%	200	14.00	200	15.40	-	1.40
D-1 (b) - Peak Scarp & Agricultural 5KW & Above	-	14.80	0.16%	200	19.00	200	20.91	-	1.91
D-1 (b) Off-Peak Scarp & Agricultural 5KW & Above	0	63.52	0.68%	200	13.00	200	14.30	-	1.30
TOTAL AGRICULTURAL T/WELL	0.94	114.29	1.22%	1.64	14.12	1.64	15.54	-	1.42
Public Lighting - Tariff-G									
G-1 (a) Public Lighting	-	17.50	0.19%	-	14.00	-	15.40	-	1.40
Residential Colony att. to Industrial - H									
H-1 (a) Residential Colony	0	0.94	0.01%	380	14.00	380	15.40	-	1.40
Time of Day (TOD - Peak)	-	43.38	0.46%	360	19.00	360	20.91	-	1.91
Time of Day (TOD - Off-Peak)	2	270.87	2.89%	360	13.30	360	14.63	-	1.33
Company Total	11.72	9,378	100%	0.46	14.94	0.46	16.44	-	1.60

**PESHAWAR ELECTRIC SUPPLY COMPANY LIMITED
(PESCO)**

AUDITED FINANCIAL STATEMENTS

FOR THE YEAR ENDED JUNE 30, 2014

AUDITORS' REPORT TO THE MEMBERS

We have audited the annexed balance sheet of **Peshawar Electric Supply Company Limited** as at **June 30, 2014** and the related profit and loss account, statement of comprehensive income, cash flow statement and statement of changes in equity together with the notes forming part thereof, for the year then ended and we state that except for the matter discussed in paragraph below, we have obtained all the information and explanations which, to the best of our knowledge and belief, were necessary for the purposes of our audit.

It is the responsibility of the Company's management to establish and maintain a system of internal control, and prepare and present the above said statements in conformity with approved accounting standards and the requirements of the Companies Ordinance, 1984. Our responsibility is to express an opinion on these statements based on our audit.

We conducted our audit in accordance with the auditing standards as applicable in Pakistan. These standards require that we plan and perform the audit to obtain reasonable assurance about whether the above said statements are free of any material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the above said statements. An audit also includes assessing the accounting policies used and significant estimates made by management, as well as, evaluating the overall presentation of the above said statements. We believe that our audit provides a reasonable basis for our opinion and, after due verification, we report that:

- (a) As reported in the previous report the Company still has remained unable to recover receivables from the Government of Azad Jammu & Kashmir (GoAJK) amounting to Rs. 8.604 billion for the current years and previous years in spite of efforts made. In our opinion, the Company should have recorded impairment against receivable of Rs. 6.295 billion from GoAJK up to 30 June 2013 and should have reversed the same. The receivable of Rs. 2.309 billion recognized during the year against sale of electricity to GoAJK. If the above mentioned impairment had been recorded, sale of electricity would have been reduced by Rs. 2.309 billion and operating loss for the current year would have increased by Rs. 2.309 billion and accumulated loss would have increased to Rs. 8.604 billion at the balance sheet. However management has taken the view that amount is most likely recoverable and the difference is due to not payment of PESCO and paid by GoAJK and the case is under consideration at GoAJK level therefore sale of electricity could not be reduced by the said amount.

- (b) The Company has not been able to record supplemental charges of Rs. 25.630 billion from the year 2010. These are charged by Central Power Purchasing Authority (CPPA) and this includes Rs. 9.64 billion for the year under review. In our opinion had the supplemental charges been charged it would have enhanced the expenditures and current year loss by Rs. 9.64 billion. Similarly the accumulated loss would have too increased by a substantial figure of Rs. 25.630 billion at the balance sheet date. However management is of the view that these charges are not related to PESCOO and are delayed payment charges for the Power Producers/Generators and are the liability of CPPA accordingly not booked in these financial statements.
- (c) In our opinion, except for the effect and possible effect of matters discussed in the preceding paragraphs above, proper books of account have been kept by the Company as required by the Companies Ordinance, 1984:
- (d) In our opinion;
- (i) except for the effect of the matters reported in preceding paragraphs above, the balance sheet, profit and loss account together with the notes thereon have been drawn up in conformity with the Companies Ordinance, 1984, and are in agreement with the books of account and are further in accordance with accounting policies consistently applied;
 - (ii) the expenditure incurred during the year was for the purpose of the Company's business; and
 - (iii) the business conducted, investments made and the expenditure incurred during the year were in accordance with the objects of the Company;
- (e) Except for the effect on the financial statements of the matters stated in preceding paragraphs above, in our opinion and to the best of our information and according to the explanations given to us, the balance sheet, profit and loss account, statement of comprehensive income, cash flow statement and statement of changes in equity together with the notes forming part thereof conform with the approved accounting standards as applicable in Pakistan, and give the information required by the Companies Ordinance, 1984, in the manner so required and respectively give a true and fair view of the state of the Company's affairs as at June 30, 2014 and of the loss, its comprehensive income, its cash flows and changes in equity for the year then ended; and
- (f) In our opinion, no Zakat was deductible at source under the Zakat and Ushr Ordinance, 1980.
- (g) Without further qualifying our opinion, we draw attention to the:
- The Company has suffered a net loss of Rs. 34.403 billion for the year 2013-14 and as that date the accumulated losses was Rs. 208.34 billion. Similarly, the current liabilities exceed current assets by Rs. 5.423 billion as at the balance sheet date. However, the financial statements have been prepared on going concern basis as the company has managed to continue with the operation due to the continuous support from Government of Pakistan (GOP) and WAPDA and also there was some reduction in the line losses. The support is likely to be continued in the future and therefore these financial statements have not been adjusted under the "Going Concern Assumption".

Avais Hyder Liaquat Nauman
Chartered Accountants

- The note 19.1 of the financial statements shows Rs. 28.144 billion (2013: 26.8 billion) as receivables from TESCO, but as explained in the note 19.1.1, the management is confident of recovering the debts.
- As explained in note 5.4, closing has been achieved effective June 30, 2008, however the company has yet not been able to issue the shares to WAPDA, and
- As explained in the note 11.2, the reasons have been given for not recording Company's liability of Rs. 175.10 billion towards CPPA for the cost of electricity transmitted to TESCO and corresponding receivables from TESCO.

Peshawar
Dec, 08, 2014


Avais Hyder Liaquat Nauman
Chartered Accountants
Engagement Partner: Amjad Javed

Peshawar Electric Supply Company Limited
Balance Sheet
As at 30 June 2014

EQUITY AND LIABILITIES

SHARE CAPITAL AND RESERVES

Authorized:
5,000,000,000 ordinary shares of
Rupees 10 each

Issued, subscribed and
paid up share capital
Deposits for issue of share capital
Grant in Aid (Subsidy)
Accumulated loss
Shareholders' equity

NON-CURRENT LIABILITIES

Liabilities against Govt investment
Long term loans - secured

Deferred liabilities
Staff retirement benefits
Deferred credit

TOTAL NON-CURRENT LIABILITIES

CURRENT LIABILITIES

Trade and other payables
Accrued mark-up
Current maturity of long term loans

CONTINGENCIES AND COMMITMENTS

Note	2014 Rupees	2013 Rupees	2012 Rupees
	50,000,000,000	50,000,000,000	50,000,000,000

4	10,000	10,000	10,000
5	18,082,025,791	18,082,025,791	18,082,025,791
6	43,221,664,558		
	(208,340,603,478)	(165,172,416,540)	(132,036,521,584)
	(147,036,903,130)	(147,090,380,749)	(113,954,485,793)

7	82,145,411,150		2,455,068,512
8	57,008,771,488	42,096,250,707	
9	28,098,011,000	19,240,597,000	16,521,193,269
10	18,640,128,199	15,463,894,459	14,777,893,623
	46,738,139,199	34,704,491,460	31,299,086,892
	185,892,321,837	76,800,742,167	33,754,155,404

11	110,689,319,497	213,402,965,287	213,824,781,207
12	4,212,941,524	2,155,226,104	457,205,312
	14,530,740,183	929,336,203	333,116,235
	129,433,001,204	216,487,527,594	214,615,102,754
	168,288,419,911	146,197,889,012	134,414,772,365

ASSETS

NON-CURRENT ASSETS

Property, plant and equipment

Long term loans - considered good

TOTAL NON-CURRENT ASSETS

CURRENT ASSETS

Stores, spare parts and loose tools
Trade debts
Loans and advances - considered good
Interest accrued
Other receivables
Receivable from Government
(Ministry of Finance)
Cash and bank balances

Note	2014 Rupees	2013 Rupees	2012 Rupees
14	44,201,492,713	39,901,822,378	35,131,606,108
15	77,648,900	126,259,846	161,331,052
	44,279,141,613	40,028,082,224	35,292,937,160

16	3,704,632,476	3,292,834,212	3,036,976,810
17	37,316,019,955	29,592,516,560	24,766,057,310
18	286,042,645	421,360,961	361,444,703
		5,676,717	35,417,400
19	765,597,603,616	56,128,283,278	45,688,995,437
20	14,801,411,774	16,099,718,299	23,367,369,674
21	2,303,567,832	629,416,761	1,865,573,871
	124,009,278,298	106,169,806,788	99,121,835,205

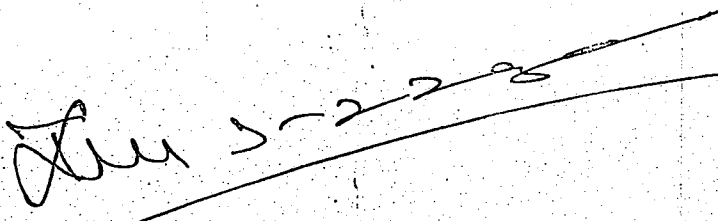
168,288,419,911	146,197,889,012	134,414,772,365

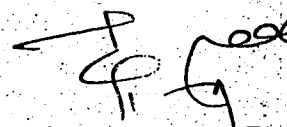
DIRECTOR

Peshawar Electric Supply Company Limited
Statement of Comprehensive Income
For the year ended 30 June 2014

	2014 Rupees	2013 Rupees
Net loss after taxation	(34,403,599,419)	(32,506,988,224)
Other comprehensive income / (Loss)		
Re-measurement of staff benefit liability	(7,661,921,000)	(628,906,73)
Total comprehensive income for the year	<u>(42,065,520,419)</u>	<u>(33,135,894,9)</u>

The annexed notes form an integral part of these financial statements.


CHIEF EXECUTIVE


DIRECTOR

Peshawar Electric Supply Company Limited
Cash Flow Statement
For the year ended 30 June 2014

CASH FLOW FROM OPERATING ACTIVITIES

Net loss before taxation

Adjustments for non-cash charges and other items:

Depreciation

Provision for staff retirement benefits

Provision for doubtful debts

Write-off long term advance

Amortization of deferred credit

Profit on bank deposits

Exchange difference - net

Financial charges

Cash flows from operations before working capital changes

(Increase) / decrease in current assets:

Stores, spare parts and loose tools

Trade debts

Loans and advances

Other receivables

Receivable from GOP

Decrease in trade and other payables

Cash flows from operations

Staff retirement benefits paid

Financial charges paid

Net cash generated from operating activities

CASH FLOWS FROM INVESTING ACTIVITIES

Capital expenditure incurred during the year

Profit received on bank deposits

Proceed received from customers in deferred credit

Long term loans recovered during the year

Net cash used in investing activities

CASH FLOWS FROM FINANCING ACTIVITIES

Proceeds from long term loans

Proceeds from Government Grant in Aid

Proceeds from GOP Investment against Circular debt

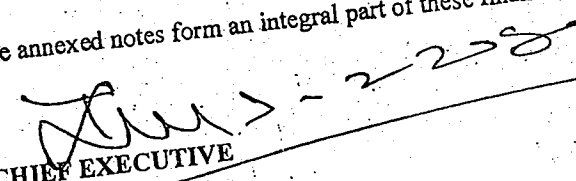
Net cash generated from financing activities

Net (decrease) / increase in cash and cash equivalents

Cash and cash equivalents at beginning of the year

Cash and cash equivalents at end of the year

The annexed notes form an integral part of these financial statements.


CHIEF EXECUTIVE

Note

2014
Rupees

2013-
Rupees

(34,403,599,419) (32,506,988,224)

14.1
9.2

10

27

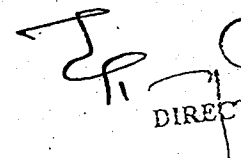
1,773,255,365	1,555,567,455
3,068,638,732	3,197,098,646
5,668,007,582	6,316,489,802
-	-
(879,201,857)	(737,261,611)
(54,686,240)	(92,123,337)
(7,299,212)	41,921,295
8,876,728,809	6,340,875,348
18,445,443,179	16,621,667,598
(15,958,156,240)	(15,885,320,626)

(411,798,264)	(255,857,402)
(13,391,510,977)	(11,142,949,052)
135,318,316	(59,916,258)
(9,469,320,338)	(10,439,287,841)
1,298,306,525	7,267,651,375
(21,839,004,738)	(14,639,359,178)
(102,713,645,790)	(421,815,920)
(140,510,806,768)	(30,937,495,725)
(1,244,239,000)	(1,166,601,641)
(6,483,292,446)	(5,883,670,03)
(148,238,338,214)	(37,927,767,40)

(8,140,219,893)	(5,084,968,21)
60,362,957	121,864,0
4,055,435,596	1,423,262,4
48,610,946	35,071,2
(3,975,810,395)	(3,504,770,)

28,521,223,972	40,196,380
43,221,664,558	
82,145,411,150	
153,888,299,680	40,196,380
1,674,151,072	(1,236,15)
629,416,759	1,865,57
2,303,567,832	629,41

21


DIRECT

Peshawar Electric Supply Company L
Statement of Changes in Equity
For the year ended 30 June 2014

	Issued, subscribed and paid up share capital Rupees	Deposit for shares Rupees	Grant in Aid (Subsidy)	Accumulated loss Rupees	Total Rupees
Balance as at July 01, 2012 as previously reported	10,000	18,082,025,791	-	(126,265,084,088)	(108,183,048,297)
Effect of change in accounting policy (Note 2.6)					
Recognition of cumulative net unrecognised actuarial loss for the year ended June 30, 2012				(5,771,437,496)	(5,771,437,496)
Balance as at July 01, 2012 - as restated	10,000	18,082,025,791	-	(132,036,521,584)	(113,954,485,793)
Total comprehensive income / (Loss) for the year				(32,506,988,224)	(32,506,988,224)
Loss for the year					
Effect of change in accounting policy (Note 2.6)					
Recognition of cumulative net unrecognised actuarial loss for the year ended June 30, 2013				(628,906,732)	(628,906,732)
Balance as at June 30, 2013 - as restated	10,000	18,082,025,791	-	(165,172,416,540)	(147,090,380,749)
Total comprehensive income / (Loss) for the year				(42,065,520,419)	(42,065,520,419)
Grant in Aid (Subsidy)			43,221,664,558		43,221,664,558
Prior year adjustment				(1,102,666,519)	(1,102,666,519)
Balance as at 30 June 2014	10,000	18,082,025,791	43,221,664,558	(208,340,603,478)	(147,036,903,129)

The annexed notes form an integral part of these financial statements.

DIRECTOR

1. STATUS AND ACTIVITIES

- 1.1. Peshawar Electric Supply Company Limited (PESCO) ("the Company") is a public limited company incorporated under the Companies Ordinance, 1984, having its registered office situated at WAPDA House, Lahore. The company was incorporated on April 23, 1998 to acquire/takeover all the properties, rights, assets, obligations and liabilities of Peshawar Area Electricity Board owned by Pakistan Water and Power Development Authority (WAPDA) and such other assets and liabilities as agreed. The company commenced commercial operation w.e.f. July 01, 1998. The principal activity of the company is the distribution and supply of electricity within its defined geographical boundaries. National Electric Power Regulatory Authority (NEPRA) has granted Distribution License to the company for electricity distribution. Government of Pakistan has notified the tariff for effective from 06 May 2012, which is retrospectively effective from March 2012. It currently purchases electricity from National Transmission and Dispatch Company Limited (NTDC) / Central Power Purchasing Authority (CPPA), being the sole supplier and an associated undertaking of the company.
- 1.2. The company has suffered a net loss of Rs. 34,403 million during the year under reference has increased the accumulated losses to Rs. 208.34 billion. Moreover, the current liabilities exceed current assets by an amount of Rs. 5.423 billion. The distribution losses of the company are 33.5% of the electricity purchased (2013: 34.2 %). These factors indicate the existence of a material uncertainty, which may cast significant doubts on the company's ability to continue as a going concern.

However, these financial statements have been prepared on going concern basis on the rational assumption that the losses due to shortfall in tariff and distribution losses will be made through Government subsidies. Further the company has initiated the programs and actions for reduction of distribution losses and recovery of receivables from consumers and associated undertakings.

2 BASIS OF PREPARATION

2.1 Statement of compliance

These financial statements have been prepared in accordance with approved accounting standards as applicable in Pakistan. Approved accounting standards comprise of such International Financial Reporting Standards (IFRS) issued by the International Accounting Standard Board as are notified under the Companies Ordinance, 1984 provisions of and directives issued under the Companies Ordinance, 1984. In case requirement differ, the provisions or directives of Companies Ordinance,

2.2 Basis of measurement

These financial statements have been prepared under the historical convention except for the staff retirement benefits which are carried at present value in accordance with the requirement of IAS-19, "Employee Benefits", and carrying values of certain items of property, plant and equipment are based on their revalued values.

2.3 Functional and presentation currency

Items included in the financial statements are measured using currency of the primary economic environment in which the Company operates. The financial statements are prepared in Pakistani Rupees which is the Company's functional and presentation currency. All functional information presented in Pakistani Rupees has been rounded to the nearest rupee unless otherwise stated.

Application of new and revised International Financial Reporting Standards (IFRSs)

15.1 Standards, amendments to standards and interpretations becoming effective in current year

The following standards, amendments to standards and interpretations have been effective and are mandatory for financial statements of the Company for the periods beginning on or after July 01, 2013 and therefore, have been applied in preparing these financial statements.

IFRS 7 (Amendments) "Financial Instruments Disclosures" on offsetting financial assets and financial liabilities. The amendments to IFRS 7 require entities to disclose information about rights of offset and related arrangements for financial instruments under an enforceable master netting agreement or similar arrangement. The Company does not have any offsetting arrangements in place, therefore, the amendments do not have material impact on the disclosures.

IFRS 12 "Disclosures of interest in other entities" This is a disclosure standard and is applicable to entities that have interests in subsidiaries, joint arrangements, associates or unconsolidated structured

IFRS 12 establishes disclosure objectives and specifies minimum disclosures that entities must provide to meet those objectives. The objective of IFRS 12 is that entities should disclose information that helps users of financial statements evaluate the nature of and risks associated with its interests in other entities and the effects of those interests on their financial statements. The standard does not have any material impact on the Company's financial statements.

IFRS 13 "Fair Value Measurement" establishes a single source of guidance for fair value measurements and disclosures about fair value measurements. IFRS 13 defines fair value for financial reporting purposes, establishes a framework for measuring fair value, and requires disclosures about fair value measurements. It applies to both financial instrument items and non-financial instrument items for which other IFRSs require or permit fair value measurements and disclosures about fair value measurements, except in specified circumstances. The application of IFRS 13 may result in changes in how entities determine fair values for financial reporting purposes. IFRS 13 requires extensive disclosures about fair value measurements. For example, quantitative and qualitative disclosures based on the three-level fair value hierarchy currently required for financial instruments only under IFRS 7 Financial Instruments. Disclosures are extended by IFRS 13 to cover all assets and liabilities within its scope. The standard does not have any material impact on the Company's financial statements.

IAS 19 "Employee Benefits" The amendments to IAS 19 change the accounting for defined benefit plans and termination benefits. The most significant change relates to the accounting for changes in defined benefit obligations and plan assets. The amendments require the recognition of changes in defined benefit obligations and in fair value of plan assets when they occur, and hence eliminate the 'corridor approach' permitted under the previous version of IAS 19 and accelerate the recognition of past service costs. The amendments require all actuarial gains and losses to be recognised immediately through other comprehensive income in order for the net pension asset or liability recognised in the statement of financial position to reflect the full value of the plan deficit or surplus. Net interest recognised in profit or loss and calculated by applying the discount rate at the beginning of each reporting period to the net defined benefit liability or asset at the beginning of that reporting period, taking into account any changes in the net defined benefit liability (asset) during the period as a result

The Company has applied this change in accounting policy retrospectively in accordance with IAS-8 'Accounting policies, changes in accounting estimates and errors' and recorded un-recognized actuarial gains / losses associated with retirement benefits plan by adjusting the opening balance of unappropriated profit and retirement benefit for the prior years presented.

IAS 28 (as Revised in 2011) "Associates and joint Ventures" The revised standard deals with how to apply the equity method of accounting for investment in joint ventures, as well as associates, following the issue of IFRS 11 which requires investments in Joint ventures to be accounted for using the equity method of accounting. The standard does not have any material impact on the Company's financial

2.5.2 Standards, amendments to standards and interpretations becoming effective in current year but not relevant.

There are certain amendments to standards that became effective during the year and are mandatory for accounting periods of the Company beginning on or after July 01, 2013 but are considered not to be relevant to the Company's operations and are, therefore, not disclosed in these financial statements.

2.5.3 Standards, amendments to standards and interpretations becoming effective in future periods

The following standards, amendments to standards and interpretations have been published and are mandatory for the Company's accounting periods beginning on or after their respective effective dates:

IFRS 9 Financial Instruments (2014): A finalized version of IFRS 9 which contains accounting requirements for financial instruments, replacing IAS 39 Financial Instruments: Recognition and Measurement. The standard contains requirements in the areas of classification and measurement, impairment hedge accounting, de-recognition:

Financial assets are classified by reference to the business model within which they are held and their contractual cash flow characteristics. The 2014 version of IFRS 9 introduces a 'fair value through other comprehensive income' category for certain debt instruments. Financial liabilities are classified in a similar manner to under IAS 39, however there are differences in the requirements applying to the measurement of an entity's own credit risk. Introduces an 'expected credit loss' model for the measurement of the impairment of financial assets, so it is no longer necessary for a credit event to have occurred before a credit loss is recognized. Introduces a new hedge accounting model that is designed to be more closely aligned with how entities undertake risk management activities when hedging financial and non-financial risk exposures. The requirements for the derecognition of financial assets and liabilities are carried forward from IAS 39. The standard is effective for accounting period beginning on or after January 01, 2018.

IFRS 9 (2014) supersedes IFRS 9 (2009), IFRS 9 (2010) and IFRS 9 (2013), but these standards remain available for application if the relevant date of initial application is before 1 February 2015. The management of the Company is reviewing the changes to evaluate the impact of application of standard on the financial statements.

IFRS 15 Revenue from Contracts with Customers: IFRS 15 provides a single, principles based five-step model to be applied to all contracts with customers.

Guidance is provided on topics such as the point in which revenue is recognised, accounting for variable consideration, costs of fulfilling and obtaining a contract and various related matters. New disclosures about revenue are also introduced. The standard is effective for accounting periods beginning on or after January 01, 2017. The Management is in the process of evaluating the impact of application of the standard on the Company's financial statements.

Amendment to IAS 16 "Property Plant and Equipment" and IAS 38 "Intangible Assets": In this amendment it is clarified that the use of revenue based methods to calculate the depreciation of an asset is not appropriate because revenue generated by an activity that includes the use of an asset generally reflects factors other than the consumption of the economic benefits embodied in the asset. It is clarified that revenue is generally presumed to be an inappropriate basis for measuring the consumption of the economic benefits embodied in an intangible asset. The amendment is effective for accounting periods beginning on or after January 01, 2016. The application of amendment is not expected to have any material impact on the Company's financial statements.

Amendments to IAS 19 "Employee Benefits": These amendments apply to contributions from employees or third parties to defined benefit plans. The objective of the amendments is to simplify the accounting for contributions that are independent of the number of years of employee service. The amendments are effective for accounting periods beginning on or after July 01, 2014. The application of amendments is not expected to have any material impact on the Company's financial statements.

IAS 32 (Amendment) "Financial Instruments: Presentation". This amendment updates the application guidance to clarify some of the requirements for offsetting financial assets and financial liabilities on the balance sheet. The amendment is effective for accounting periods of the Company beginning on or after July 01, 2014. The application of the amendment is not expected to have any material impact on the Company's financial statements.

Amendments to IAS 36 "Impairment of Assets": These amendments address the disclosures and clarify the circumstances in which the recoverable amount of assets or cash-generating units is required to be disclosed, clarify the disclosures required, and introduce an explicit requirement to disclose the discount rate used in determining impairment (or reversals) where recoverable amount (based on fair value less costs of disposal) is determined using a present value technique. The amendments are effective for accounting periods beginning on or after January 01, 2014. The application of amendments is not expected to have any material impact on the Company's financial statements.

Amendments to IAS 39 "Financial Instruments Recognition and Measurement": These amendments allow hedge accounting to continue in a situation where a derivative, which has been designated as a hedging instrument, is novated to effect clearing with a central counterparty as a result of laws or regulation, if specific conditions are met (in this context, a novation indicates that parties to a contract agree to replace their original counterparty with a new one). The amendments are effective for accounting periods beginning on or after January 01, 2014. The application of amendments is not expected to have any material impact on the Company's financial statements.

The IASB has issued Annual Improvements to IFRS's 2010-2012 Cycle

Amendments to the following standards were made:

IFRS 2 — Amends the definitions of 'vesting condition' and 'market condition' and adds definitions for 'performance condition' and 'service condition'

IFRS 3 — Require contingent consideration that is classified as an asset or a liability to be measured at fair value at each reporting date.

IFRS 8 — Requires disclosure of the judgments made by management in applying the aggregation criteria to operating segments, clarify reconciliations of segment assets only required if segment assets are reported regularly.

IFRS 13 — Clarify that issuing IFRS 13 and amending IFRS 9 and IAS 39 did not remove the ability to measure certain short-term receivables and payables on an undiscounted basis (amends basis for conclusions only).

IAS 16 and IAS 38 — Clarify that the gross amount of property, plant and equipment is adjusted in a manner consistent with a revaluation of the carrying amount.

IAS 24 — Clarify how payments to entities providing management services are to be disclosed.

These amendments are not expected to have any material impact on the Company's financial

The IASB has issued Annual Improvements to IFRS's 2011-2013 Cycle

Amendments to the following standards were made:

IFRS 1 — Clarify which versions of IFRSs can be used on initial adoption

IFRS 3 — Clarify that IFRS 3 excludes from its scope the accounting for the

IFRS 13 — Clarify the scope of the portfolio exception in paragraph 52.

IAS 40 — Clarifying the interrelationship of IFRS 3 and IAS 40 when classifying

These amendments are not expected to have any material impact on the

IFRIC 21 Levies

This interpretation provides guidance on when to recognize a liability for a levy imposed by a government, both for levies that are accounted for in accordance with IAS 37 Provisions, Contingent Liabilities and Contingent Assets and those where the timing and amount of the levy is certain.

Tariff adjustment

Tariff adjustment for variation in fuel price is recognized in the relevant period on the basis of rates determined by NEPRA and notified by Government of Pakistan up to the date of approval of financial statement by the board of directors of the company.

Interest / mark-up

Interest / Mark-up on interest on bank deposits is recognized on time proportion basis.

Miscellaneous

Miscellaneous revenues are recognized on actual receipt basis.

3.11 Electricity subsidy to consumers

Subsidy on electricity announced by the Government of Pakistan for consumers is recognized under revenue on accrual basis.

3.12 Power purchase variation subsidy

Subsidy provided by the Government of Pakistan on cost of electricity purchased by the company is recognized in the profit and loss account by deducting the amount of subsidy from the related cost of electricity purchased on a systematic basis in the same period in which the electricity cost is incurred.

3.13 Mark-up bearing borrowings

Mark-up bearing borrowings are recognized initially at cost, less attributable transaction cost. Subsequent to initial recognition, mark-up bearing borrowings are stated at original cost less subsequent repayments, while the difference between the original recognized amounts (as reduced by periodic payments) and redemption value is recognized in the profit and loss account over the period of borrowing on effective rate basis. The borrowing cost on qualifying asset is included in the cost of

3.14 Financial Instruments

Financial Assets and liabilities are recognized in the financial statements when the company becomes a party to the contractual provisions of the instrument and assets and liabilities are stated at fair value or amortized cost as the case may be. The company derecognizes the financial assets and liabilities when it ceases to be a party to such contractual provisions of the instruments. Any gain or losses on de-recognition of financial assets and liabilities are included in income currently.

3.15 Trade and Other Payables

Liabilities for trade and other amounts payable are carried at amortized cost, which approximates the fair value of the consideration to be paid in future for goods and services received, whether or not billed to the company.

3.16 Trade debts and other receivables

Trade debts and other receivables are stated initially at fair value and subsequently measured at amortized cost less provision for impairment, if any. A provision for impairment is established when there is an objective evidence that the company will not be able to collect all amounts due according to the original terms of receivable. Trade debts and receivables are written off when considered

3.17 Off setting of financial assets and liabilities

A financial asset and financial liability is offset and the net amount is reported in the Financial statement only when there is a legally enforceable right to set off the recognized amounts and the company intends either to settle on net basis or to realize the asset and settle the liability

3.18 Cash and cash equivalents

Cash and cash equivalents comprise cash in hand and bank balances.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

4. ISSUED, SUBSCRIBED AND PAID UP SHARE CAPITAL

1,000 Ordinary shares of Rupees 10 each, issued as fully paid up in cash to President of Pakistan (through PEPCO) and its nominee directors

Note	2014 Jan-00	2013 Rupees
	10,000	10,000
	10,000	10,000

5. DEPOSITS FOR ISSUE OF SHARE CAPITAL

Incorporation expenses incurred by WAPDA
Allocation of net worth transferred by WAPDA

Adjustment of other loans and assets
Adjustment of net assets on transfer of FATA business to Tribal Area Electric Supply Company Limited (TESCO)

5.1	5,042,575 8,885,483,927	5,042,575 8,885,483,927
5.2	8,890,526,502 7,620,265,187	8,890,526,502 7,620,265,187
5.3	1,571,234,102	1,571,234,102
	18,082,025,791	18,082,025,791

5.1 This represents net worth of the Company as on 01 July 1998 and subsequent adjustments/additions.

5.2 This represents adjustments of loan repayment and assets transferred, through current account maintained with WAPDA.

5.3 This represents net worth of FATA related business determined effective 01 July 2003, amounting to Rs. 1,670,284,895 net of reversal of employees' retirement benefits of Rs. 99,050,793 surrendered to WAPDA on incorporation of TESCO.

5.4 Effective 30 June 2008, closing has been notified by WAPDA. The Company is in the process of valuing its fixed assets and issuing shares. WAPDA has confirmed vide letter No 36-66/GMF(P)/MFHQ/B.K-40 to the Company to issue shares of Rs. 10 each equivalent to share deposit money of Rs. 18,082 million.

6. GRANT IN AID (SUBSIDY)

Loan treated as subsidy

Note	2014 Rupees	2013 Rupees
6.1	43,221,664,558	
	43,221,664,558	

6.1 Rs. 216 billion PPTFC Loan was obtained by corporatized entities to cover the revenue short fall in the absence of subsidy mechanism for the period FY 2003 to FY 2007. Later on the same was picked up by PHPL and treated as subsidy. As this loan was to be allocated to all the DISCO's therefore DG(CPCC) PEPCO vide its note dated 2012 accorded approval for allocation Rs. 216 Billion on the basis of DISCO's Receivables. As per Finance Director NTDC Rs. 12 Billion has not been traceable up till now against the Power Sector Liability and Rs. 1 Billion against the receivables from DISCO's therefore they have requested to treat Rs. 203,219 Billion loan as subsidy credit to DISCO's was proposed and it was approved by CFO Pepco. PESCO share was accordingly allocated Credit Memo #: PPA-195/PESCO-25.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

7. LIABILITIES AGAINST GOVT INVESTMENT

Federal Govt. Investments (Circular Debt Settlement)

Note	2014 Rupees	2013 Rupees
7.1	82,145,411,150	-
	<u>82,145,411,150</u>	<u>-</u>

7.1 This loan shows GOP Investment in the DISCO's against Circular Debt Settlement. As per letter of Government of Pakistan Finance Division No. F.1(5) CF-I/2012-13/1017 dated: July 02, 2013 Finance Division has transferred Rs. 341.958 Billion in PEPCO's account through State Bank of Pakistan on 27th June, 2013 for the settlement of power sector circular debt payable to IPP's and other entities. PESCO received Credit Memo No. PPA-204/PESCO-26 dated 6-5-2014 from CPPA on account of GOP Investment against Circular debt of aforesaid amount.

8. LONG TERM LOANS - secured

Loan from GoP
 Asian Development Bank - Trench I
 Asian Development Bank - Trench II
 Earthquake Reconstruction and Rehabilitation Authority
 TFC Loan through PHPL (HBL) I
 TFC Loan through PHPL (NBP) II
 TFC Loan through PHPL (OGDCL) III

Note	Rupees	Rupees
8.1	125,284,795	125,284,795
8.2	1,933,169,264	1,978,127,100
8.3	1,149,693,423	642,754,000
8.4	799,939,154	807,238,000
8.5	39,472,181,602	39,472,181,000
8.6	4,339,058,263	-
8.7	23,720,185,170	-
	<u>71,539,511,671</u>	<u>43,025,586,000</u>
	<u>(14,530,740,183)</u>	<u>(929,336,000)</u>
	<u>57,008,771,488</u>	<u>42,096,250,000</u>

Current maturity

8.1 This loan has been advanced by the Government of Pakistan (GOP) for the restoration of Power Distribution Infrastructure and Electricity Consumption in earthquake affected areas. The loan is free of interest and currency fluctuations.

8.2 This represents relevant portion of total term finance facility obtained by the Government of Pakistan (GoP) from Development Bank (ADB) for power distribution and enhancement project. Out of total finance facility amount of US \$ 36.60 million has been allocated to the Company vide letter dated 30 March 2009 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. Out of the total allocated finance facility, the Company has utilized US \$ 22.661 million (2013: US\$ 22.661 million) up to the year end. On 16 October 2012 has revised the terms and conditions of the loan. Under the revised terms, the loan carries 17 % inclusive of exchange risk 6% is repayable in 24 semi-annual instalments ending 15 August 2023. The first repayment due on 15 February 2011. Accordingly the principal amount which has fallen due and is repayable within 12 months of the reporting date have been transferred to current portion. Further, since the repayment terms require the repayment of principal in Pak Rupee, exchange difference arising on revaluation of loan for the year has not been recognized.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

- 8.3 This represents re-lent portion of total term finance facility obtained by the GOP from ADB for power distribution and enhancement project. Out of total finance facility an amount of US \$ 25.27 million has been allocated to the Company vide letter No. 1(3) ADB-II/06-A dated 31 March 2011 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. Out of total allocated facility, the Company has utilized US \$ 11.516 million (2013: 6.661 million) up to the year end. As per the letter dated 9th April 2011 of the Ministry of Economic Affairs & Statistics (Economic Affairs Division) the loan amount has been relented to the Company on the following terms:
- 15% p.a inclusive of interest rate of 8.2% plus exchange risk coverage (ERC) of 6.8% which shall be charged both on principal amount and interest amount separately.
 - repayment maximum period of 17 years excluding a grace period of 3 years.
 - all charges and fees including commitment charges etc. if any payable by the Government of Pakistan to the above foreign lender shall also be borne by the Company.
- However the repayment of the principal amount/ interest and recoveries due from the Company will be advised by the Debt Management Wing of the Economic Affairs Division.
- 8.4 This represents re-lent portion of total term finance facility obtained by the GoP from ADB for Earthquake Emergency Assistance Project. Out of total finance facility an amount of US \$ 11.00 million has been allocated to the Company vide letter dated 22 July 2008 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. As per the above said letter, the loan amount has been relented to the Company on the terms and conditions agreed between the GoP and ADB which are as follows:
- the facility carries interest at 1% per annum on the amount of the Loan withdrawn from the loan account and outstanding from time to time.
 - repayment maximum period of 40 years including a grace period of 10 years, repayment shall be made in 30 semi annual instalments.
- 8.5 GoP through Power Holding Private Limited (PHPL) entered into a syndicated Term Finance Agreement on 22 February 2012 with syndicate of banks led by Habib Bank Limited for financing of Rs. 136 billion. The loan is for a period of five years with a grace period of two years and carries mark-up at the rate of three months' KIBOR+2% p.a. and secured by way of a guarantee by GoP, lien on collection account of electricity distribution companies (DISCOs) and assignment of receivables. Originally PHPL planned to re-lent the loan to DISCOs through multi-partite agreement between Lenders, DISCOs and PHPL with each DISCO jointly and severally liable in-case of default by any DISCOs. Management of DISCOs objected to this arrangement and based on observations by DISCOs the proposed mechanism of loan was revised in a joint meeting held at Ministry of Water and Power on 14 May 2012 whereby bilateral agreement was proposed to be signed between each DISCO and PHPL with DISCOs severally liable. Board of Directors of the Company accorded its approval in its meeting held on 29 May 2012. In May 2012 CPPA issued a draft of the relending agreement between the Company and PHPL has been received. Subsequently, during a joint meeting held at LESCO Head Office on 27th August, 2012, it was agreed among DISCOs that the relending agreement will be effective from the date it is signed by the respective DISCOs and the same was communicated Ministry of Water & Power vide LESCO Legal Director letter # L-Dir/12150-53 dated August 28, 2012.
- 8.6 GoP in order to reduce a portion of circular debt in the power sector entered into a Term Finance Agreement da November 08, 2012 through PHPL with National Bank of Pakistan amounting to Rs. 15 Billion for funding repayment of liabilities of DISCOs towards CPPA. The loan is for a period of five years with a grace period of 1 years, with grace period applicable to principal repayments only and carries markup at the rate of Six mon KIBOR+2% p.a. and secured by way of a guarantee by GoP. The repayment is to be made in Ten semiann installments. Board of Directors of the Company accorded approval of the loan in its meeting held on 30 April, 2012. CPPA issued an advise to the Company with the amount of Rs. 4.339 billion representing the facility allocated to Company.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

- 8.7 GoP in order to reduce a portion of circular debt in the power sector entered into a TFC Investor Agreement dated September 05, 2012 through PHPL with Oil and Gas Development Company Limited amounting to Rs. 82 Billion for funding of repayment of liabilities of DISCOs towards CPPA. The loan is for a period of Seven years with a grace period of two years, with grace period applicable to principal repayments only and carries markup at the rate of Six months' KIBOR+1% p.a. and secured by way of a guarantee by GoP. The repayment is to be made in Fourteen semiannual installments. Board of Directors of the Company accorded approval of the loan in its meeting held on 30 April, 2014. CPPA issued an advise to the Company with the amount of Rs. 23.720 billion representing the facility allocated to the Company.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

9. STAFF RETIREMENT BENEFITS

Four types of defined benefit plans are offered by the Company namely, pension, medical, free electricity and compensated absences.

	Pension obligations		Medical benefits		Free electricity		Compensated absences		Total	
	2014	2013	2014	2013	2014	2013	2014	2013	2014	2013
	Rupees	Rupees	Rupees	Rupees	Rupees	Rupees	Rupees	Rupees	Rupees	Rupees
9.1 Reconciliation of payable to defined benefit plan:										
Present value of defined benefit obligation	24,686,793,000	16,136,359,000	565,117,000	482,718,000	2,051,491,000	1,826,910,000	794,610,000	794,610,000	28,098,011,000	19,240,597,000
Unrecognized actuarial losses/ (gains)										
	24,686,793,000	16,136,359,000	565,117,000	482,718,000	2,051,491,000	1,826,910,000	794,610,000	794,610,000	28,098,011,000	19,240,597,000

9.2 Amount recognized in balance sheet is as follows:

Net liability at beginning of the year	16,136,359,000	14,349,958,879	482,718,000	439,506,268	1,826,910,000	1,566,025,626	794,610,000	794,610,000	19,240,597,000	17,150,100,773
Charge for the year	2,111,902,000	2,239,309,121	65,953,000	66,604,000	261,877,000	262,278,021	-	-	2,439,732,000	2,568,191,142
Re-measurement of liability	7,615,963,000	594,222,000	28,995,000	(9,093,268)	16,963,000	43,778,000	-	-	7,661,921,000	628,906,732
Benefits paid during the year	(1,177,431,000)	(1,047,131,000)	(12,549,000)	(14,299,000)	(54,259,000)	(45,171,647)	-	-	(1,244,239,000)	(1,106,601,647)
	24,686,793,000	16,136,359,000	565,117,000	482,718,000	2,051,491,000	1,826,910,000	794,610,000	794,610,000	28,098,011,000	19,240,597,000

9.3 Salaries, wages and benefits include the following in respect of defined benefits plans:

Current service cost	323,923,000	296,156,000	11,162,000	10,512,000	54,902,000	51,702,000	-	-	389,987,000	358,370,000
Interest cost	1,787,979,000	1,943,153,121	54,791,000	56,092,000	206,975,000	210,576,021	-	-	2,049,745,000	2,209,821,142
Re-measurement of liability	7,615,963,000	594,222,000	28,995,000	(9,093,268)	16,963,000	43,778,000	-	-	7,661,921,000	628,906,732
	9,727,865,000	2,833,531,121	94,948,000	57,510,732	278,840,000	306,056,021	-	-	10,101,653,000	3,197,097,874

9.4 Projected Benefit Payments is as follows:

	Pension obligations	Medical benefits	Free electricity
	Rupees in "000"		
2015	906,583	16,445	46,970
2016	1,205,921	19,525	58,343
2017	1,536,947	23,266	74,876
2018	1,748,483	27,432	92,411
2019	2,056,895	32,203	114,309
2020-24	2,056,895	32,203	114,309

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

	Note	2014 Rupees	2013 Rupees
10. DEFERRED CREDIT			
Balance brought forward		21,064,617,455	19,641,355,008
Additions during the year		4,055,435,596	1,423,262,447
		25,120,053,051	21,064,617,455
Amortization			
- Balance brought forward		(5,600,722,996)	(4,863,461,383)
- For the year		(879,201,857)	(737,261,619)
		(6,479,924,852)	(5,600,722,996)
		18,640,128,199	15,463,894,459
11. TRADE AND OTHER PAYABLES			
Creditors			
Associated undertakings - unsecured	11.1	93,845,523,918	196,962,525,548
Others		1,316,034,670	838,433,886
		95,161,558,588	197,800,959,434
Receipt against deposit work		7,261,788,137	8,131,715,193
Electricity duty payable		400,565,169	332,303,911
Withholding tax payable		52,094,242	110,103,014
TV License fee payable		69,548,719	81,695,844
Realized Neelum Jhelum surcharge		91,941,412	121,085,362
Realized equalization surcharge payable		942,756,782	966,018,092
GST payable		35,788,075	46,199,589
Employees shares in fund		1,545,609	1,548,047
Accrued liabilities		291,635,252	218,005,732
Retention money - contractors / suppliers		147,378,160	135,889,864
Capital contribution awaiting connections		503,543,485	375,845,080
Unrealized electricity duty		507,097,631	454,847,340
Unrealized income tax		239,475,028	193,555,648
Unrealized TV license fee		423,777,904	346,560,171
Unrealized Neelum Jhelum surcharge		666,622,363	552,440,131
Unrealized equalization surcharge payable		266,367,378	276,902,222
Unrealized general sales tax		1,357,830,875	1,357,830,875
Short term consumers' security deposits	11.3	2,223,433,171	1,896,512,260
Unrealized extra tax		-	-
Unrealized further tax		-	-
Others		44,571,516	2,947,477
		110,689,319,497	213,402,965,287
11.1 Creditors - associated undertakings			
Central Power Purchase Agency		93,293,034,306	196,405,728,166
Multan Electric Power Company Limited		465,079,974	465,691,054
Faisalabad Electric Supply Company Limited		50,712,495	44,375,202
Lahore Electric Supply Company Limited		1,709,492	3,022,443
Pakistan Electric Power Company Limited		30,089,062	39,262,020
CE (RE) Lahore		4,898,589	4,446,663
		93,845,523,918	196,962,525,548

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

11.2 TESCO hold the license to act as an electricity distribution company while electricity utilized by TESCO from CPPA is supplied through network of this Company. This arrangement is in accordance with the directions of NEPRA and confirmed vide its letter no. NEPRA/TRF-45/7549 dated 21 November 2006 and ratified by NTDC vide its letter no. CEO/NTDC/PESCO 5317-20 dated 23 January 2007. Since electricity is primarily supplied by CPPA to the Company, the cost of electricity invoiced by CPPA to the Company is allocated on the basis of actual units transmitted to TESCO through the Company's network. Cost of electricity utilized and corresponding obligation towards CPPA is recorded by TESCO in its books of account which is evident from the latest available audited financial statements of TESCO. In-addition, payment against utilization of units is also made directly by TESCO to CPPA. Although CPPA raises invoices to the Company however since the Company only acts as a conduit and a facilitator under the arrangement and is neither liable to pay to CPPA or recover from TESCO, the Company has not recorded obligation towards CPPA against cost of electricity transmitted to TESCO and corresponding receivable from TESCO of Rs. 175.10 billion to appropriately reflect the economic substance of this arrangement.

11.3 These represent security deposits received from consumers at the time of electricity connection and are refundable / adjustable on disconnection of electricity supply.

12. ACCRUED MARK-UP

Opening Balance

For the year:

Mark up on TFC PHPL (HBL) I

Mark up on PHPL (NBP) II

Mark up on PHPL (OGDCL) III

Asian Development Bank - Trench I

Asian Development Bank - Trench II

Earthquake Reconstruction and Rehabilitation Authority

Less:

Payments mad during the year

Note	2014 Rupees	2013 Rupees
	2,155,226,104	457,205,312
	1,792,715,023	1,463,706,539
	391,057,923	-
	813,010,971	-
	369,590,800	147,869,982
	146,142,242	47,957,154
	8,905,000	38,487,117
	3,521,421,959	1,698,020,792
	(1,463,706,539)	-
	<u>4,212,941,524</u>	<u>2,155,226,104</u>

13. CONTINGENCIES AND COMMITMENTS

13.1 Income tax contingencies

13.1.1 Taxation Authorities amended the assessments of the Company for the tax years from 2003 to 2006 by creating a demand of Rs. 31.65 million on applicability of Section 113 of the Income Tax Ordinance, 2001 on receipts other than sale of electricity. The Company's appeal against the demand was decided in favour of RTO Peshawar by the Commissioner Income Tax / Wealth Tax (Appeals-II). The Company has filed an appeal against the order of Commissioner Income Tax / Wealth Tax (Appeals-II); which is pending adjudication at Appellate Tribunal Inland Revenue, Peshawar.

13.1.2 Taxation Authorities also amended the assessment of the Company for the tax year 2007 on various issues by creating a demand of Rs. 3.9 million. The Company's appeal against the demand was partially decided in favour of RTO Peshawar by the Commissioner Income Tax / Wealth Tax (Appeals-II). The Company has filed an appeal against the order of Commissioner Income Tax / Wealth Tax (Appeals-II), whereas Department has also filed appeal on the issues of allow ability of Depreciation of Assets which was decided in favour of PESCO, which is pending adjudication at Appellate Tribunal Inland Revenue, Peshawar.

11.1.3 Taxation Authority has issued notice for the recovery of penalty amounting to Rs.12.08 million. The Company has appealed against the decision made in favour of RTO Peshawar before the Commissioner Appeals which is pending.

13.2 Other contingencies

13.2.1 Inland letters of credit as at 30 June 2014 are of Rs. 339.672 million (2013: Rs. 913.468 million).

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

14. Property, plant and equipment

Operating fixed assets
 Capital work in progress

Note	2014 Note	2013 Rupees	2012 Rupees
14.1	34,696,997,752	29,730,322,814	28,249,165,466
14.2	9,504,494,961	10,171,499,564	6,882,440,642
	44,201,492,713	39,901,822,378	35,131,606,108

14.1 Statement of operating fixed assets as of 30 June 2014 is as follows:

	Freehold land	Leasehold land	Building	Distribution equipment	Vehicles	Computer and ancillary equipment	Furniture and fixtures	Other plant and equipment	Total
Cost									
Accumulated depreciation									
NBV as at 30 June 2013									
Additions during the year									
Depreciation charge for the year									
Net book value As at 30 June 2014									
Cost									
Accumulated depreciation									
Net book value As at 30 June 2014									
Depreciation rate / number of years									
Cost									
Accumulated depreciation									
NBV as at 30 June 2012									
Additions during the year									
Depreciation charge for the year									
NBV as at 30 June 2013									
Cost									
Accumulated depreciation									
NBV as at 30 June 2013									

415,594,442

95

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

14.1.1 The title of land and buildings amounting to Rs. 45.78 million and Rs. 72.34 million, respectively transferred to the associated undertakings is not in the name of the Company.

14.2 CAPITAL WORK IN PROGRESS

Civil works
Distribution equipment

Note	2014 Rupees	2013 Rupees
	224,797,417	124,403,375
	9,279,697,544	10,047,053,189
	9,504,494,961	10,171,499,564

14.2.1 This includes borrowing cost capitalized during the year amounting to Rs. 146.142 million (2013: Rs. 195.83 million)

15. LONG TERM LOANS - considered good

House building / purchase of plots
Vehicles

Current maturity of long term loans

Note	2014 Rupees	2013 Rupees
	123,892,275	165,128,800
	3,462,958	7,144,600
	127,355,233	172,273,400
	(49,706,333)	(46,013,600)
18	77,648,900	126,259,800

15.1 This represents long term loans made to employees. House building and plot loans are repayable in 10 years, car motor-cycle loans in 5 years and bicycle loans in 5 years. Mark-up is charged on these loans at the same rate as payable on employees balances in General Provident Fund. Loans are secured by mortgage of immovable property hypothecation of vehicles. These loans have not been carried at their fair value pursuant to the requirements of IAS "Financial Instruments: Recognition and Measurement", since the management believes that related financial risk will not be material.

16. STORES, SPARE PARTS AND LOOSE TOOLS

Stores

Note	2014 Rupees	2013 Rupees
	3,704,632,476	3,292,830
	3,704,632,476	3,292,830

17. TRADE DEBTS

Sale of electricity
Government levies and other charges
Secured and considered good
Considered doubtful

Provision for doubtful debts

17.1 & 17.2
17.3

	2014 Rupees	2013 Rupees
	27,142,744,501	21,253,300
	10,173,275,454	8,339,100
	37,316,019,955	29,592,500
	40,667,357,967	35,034,100
	77,983,377,922	64,626,700
	(40,667,357,967)	(35,034,100)
	37,316,019,955	29,592,500

17.1 Trade debts are secured to the extent of corresponding consumers' security deposits against electricity connect

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

17.2 This includes Rs. 8,604 billion receivable from the Government of Azad Jammu and Kashmir (AJK) and represents the differential of the amount billed to AJK on tariff determined by National Electric Power Regulatory Authority (NEPRA) and tariff approved by the sub-committee constituted at the time of presentation given to Chief Executive of Pakistan in September 2002 on Raising of Mangla Dam. The tariff determined by the sub-committee was Rs. 2.52 per unit which was increased to Rs. 2.59 per unit subsequently. However the Company billed electricity supplied to AJK on the basis of tariff notified by GOP from time to time after determination by NEPRA. AJK has been settling its dues at tariff of Rs. 2.59/unit and contesting the applicability of tariff approved by NEPRA and notified by GOP by claiming that AJK does not fall under purview of NEPRA. Currently tariff rate as determined by the GOP on April 25, 2014 is Rs. 12.20/unit.

In spite of various efforts, the Company has not been able to recover the outstanding balance from AJK. However the management is pursuing the resolution of this matter on various forums and requested Ministry of Water and Powers GOP to convene meeting of all stake holders to resolve the issue. Total outstanding balance of Rs. 8,604 million comprises Rs. 6,295 million relating to previous years and Rs. 2,309 million recognized during the year against sale of electricity.

The management of the Company is however confident of favourable resolution of the matter and accordingly has not recognized impairment of Rs. 6,295 million against the receivable amount up to 30 June 2013 and has not adjusted receivable recognized during the year of Rs. 2,309 million against sale of electricity, which is the difference between tariff determined by sub-committee and notified by the GoP.

17.3 Trade debts - Government levies and other charges

Electricity duty
Income tax receivable from customers
Sales tax
TV fee
Neelum Jhelum surcharge
Equalization surcharge
Extra Tax Receivable
Further Tax Receivable

Note	2014 Rupees	2013 Rupees
	507,097,430	454,847,340
	239,475,028	193,555,648
	8,013,619,296	6,514,877,505
	423,777,904	346,560,171
	666,622,363	552,440,131
	266,367,378	276,902,222
	36,982,645	
	19,333,410	
17.3.1	10,173,275,454	8,339,163,017

17.3.1 Government levies and other charges recoverable from customers on behalf of the respective authorities from consumers and will be paid to respective authorities upon receipt of these dues from consumers except general sales tax which is paid on billing basis.

18. LOANS AND ADVANCES - considered good

Current portion of long term loans - considered good
Advances to suppliers - considered good
Advances for expenses

Note	2014 Rupees	2013 Rupees
15	49,706,333	46,013,631
	212,150,255	371,327,151
	24,186,057	4,020,171
	286,042,645	421,360,961

19. OTHER RECEIVABLES - considered good

Due from WAPDA and associated undertakings - net
Sales tax receivable - net
Current account
Pension receivable
Others

Note	2014 Rupees	2013 Rupees
19.1	29,261,912,649	27,864,890,911
19.2	33,956,981,376	26,252,409,911
	146,618,568	455,362,711
	2,183,358,900	1,532,330,211
19.3	48,732,123	23,289,411
	65,597,603,616	56,128,283,211

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

19.1 Due from WAPDA and associated undertakings - net	Note	2014 Rupees	2013 Rupees
WAPDA		398,226,146	397,774,219
WAPDA Welfare Fund		85,827,297	80,607,410
National Transmission and Dispatch Company Limited		447,408,750	428,600,040
Quetta Electric Supply Company Limited		19,586,357	14,571,798
Tribal Electric Supply Company Limited	19.1.1	28,144,117,545	26,807,604,573
Sukkur Electric Supply Company		301,858	213,761
Islamabad Electric Supply Company Limited		159,009,746	131,105,053
Gujranwala Electric Power Company Limited		664,184	456,551
Hyderabad Electric Supply Company Limited		2,123,103	1,821,185
Genco I, II, III, IV		4,647,663	3,521,337
	19.1.2	<u>29,261,912,649</u>	<u>27,864,890,927</u>

19.1.1 This represents receivable on account of wheeling charges, services provided and free electricity to TESCO employees. This includes Rs. 26,807 million relating to prior years. Due to shortage of funds, TESCO has not been able to repay the Company's dues. However, the management believes that since TESCO is a Government entity there is no likelihood of default by TESCO in paying its dues and further TESCO has confirmed the balance due to the Company. Further the Company has taken up the case with TESCO for early payment and has required TESCO to approach Ministry of Water and Power to settle the Company's dues.

19.1.2 Due from WAPDA and associated undertakings are unsecured and do not carry interest.

19.2 Sales tax receivable - net

19.2.1 This represents amounts receivable from taxation authorities in respect of carry forward of excess input tax paid over output tax. The management of the Company believes that excess amounts of input sales tax paid are refundable on a lump sum basis or through monthly claims in the Company's sales tax returns.

19.2.2 Regional Tax Office (RTO), Peshawar had also issued three show cause notices to the Company on the issue of adjustment of sales tax collected from steel melter consumers against the accumulated credit sales tax balance of the Company, for the period from May 2008 to December 2010, January 2011 to June 2011 and July 2011 to December 2011 in which sales tax demands of Rs. 1.630 billion, Rs. 314.29 million and Rs. 344.00 million respectively were raised. The Company contested these show cause notices however Deputy Commissioner, Commissioner Inland Revenue (Appeals), Peshawar and Peshawar High Court, Peshawar decided the matter of demands of Rs. 1.630 billion, Rs. 344 million and Rs. 314 million in favour of RTO Peshawar. The Company has challenged the decisions of lower court before the Supreme Court of Pakistan. The management of the Company believes that since this is an industry wide issue, therefore, company has positive prospects to get favourable outcome.

19.2.3 A show cause notice has been issued to the company by RTO for recovery of Rs. 464 Million adjusted against the output tax collected from Steel Melter against the credit sale tax balance of the company for the period from January 2012 to June 2012. The Commissioner Inland Revenue (Appeals) and Appellate Tribunal Inland Revenue (ATIR), Peshawar decided the appeals against the Company. The company has challenged the decision of ATIR, Peshawar before the Peshawar High Court, Peshawar.

19.2.4 Regional Tax Office (RTO), Peshawar has also issued a recovery notice amounting to Rs. 643 million on account of different issues decided against PESCO by the Commissioner IR Appeals pertaining to the Audit Period May 2008 to April 2010 in Audit cases. The demand was challenged within hierarchal structure of FBR, wherein Appellate Tribunal Inland Revenue, Peshawar has accepted the company's appeal on major issues, whereas some of the minor issues are remanded back to Regional Tax Office, Peshawar. Since, the case is pending at RTO, Peshawar and company has good prospects to get favourable outcome, therefore provision has not been made in the financial statements against the amounts demanded by the taxation authorities.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

19.3 Receivable from associated undertakings on account of pension - unsecured, considered good

WAPDA

Islamabad Electric Supply Company Limited

Pakistan Electric Power Company Limited

National Transmission and Dispatch Company Limited

Gujranwala Electric Power Company Limited

Faisalabad Electric Supply Company Limited

Lahore Electric Supply Company Limited

Multan Electric Power Company Limited

Hyderabad Electric Supply Company Limited

Quetta Electric Supply Company Limited

Tribal Area Electric Supply Company Limited

Genco I, II, III & IV

Sukkar Electric Power Company

Regional Representative Karachi

Power Information Technology Company

Notes

2014
Rupees

2013
Rupees

1,826,394,170	1,224,962
91,873,519	120,762
12,436,643	10,235
129,976,360	98,273
15,010,263	10,259
22,668,185	17,286
19,254,994	13,714
16,388,657	13,719
21,951,443	15,829
6,477,342	6,303
13,118,364	7,503
7,445,871	5,059
144,553	652
212,536	2,008
2,183,358,900	1,532,284

20. RECEIVABLE FROM GOVERNMENT (Ministry of Finance)

This represents subsidy receivable from Ministry of Finance on account of tariff differential. Movement in this account during the year is as follows:

Note

2014
Rupees

2013
Rupees

16,099,718,299	23,367,167
37,636,463,523	36,822,562
(37,832,043,529)	(44,070,700)
(1,102,666,519)	
14,801,411,774	16,079,322

Opening balance as at 1 July

Tariff differential subsidy recognized during the year

Credit note received during the year from

CPPA and adjusted against its payable balance

Adjustment in subsidy receivable for the period Oct. 10, April and May 11.

Closing balance as at 30 June

21. CASH AND BANK BALANCES

Cash in hand

Cash with banks in:

Deposit accounts

Current accounts

2,385

629,559,425

1,674,036,021

2,303,567,832

21.1 These carry interest rate 7.00 % to 9.00 % (2013: 5 % to 9.00 %) per annum.

21.2 These include an amount of Rs. 628.574 million (2013: Rs. 54.79 million) kept in separate bank accounts relating to employees' security deposits.

22. SALE OF ELECTRICITY

Sale of power to public and private consumers

22.1 This is net of sales tax amounting to Rs. 15,244 million (2013: Rs. 13,185 million)

22.2 Electricity Sold, total units 7,471.3 million (2013: 7,161.65 million) at the average rate of Rs. 9.3195 (2013: Rs. 8.3991)

69,628,472,841

60,111

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

23. RENTAL AND SERVICE INCOME

Meter / service rent
Reconnection fees

Note	2014 Rupees	2013 Rupees
	40,560,549	57,315,908
	1,602,329	979,965
	<u>42,162,878</u>	<u>58,295,873</u>

24. COST OF ELECTRICITY

Central Power Purchase Agency
System charges

118,565,463,507	107,936,472,688
<u>118,565,463,507</u>	<u>107,936,472,688</u>

24.1 Electricity purchases during the year have been invoiced by CPPA, units 13,059 million (2013: 12,538 million) at the average rate of Rs. 10.58 per KWH (2013: Rs. 9.98 per KWH) in which, 1,757.928 million (2013: 1,643.142 million) units of electricity purchased by TESCO amounting to Rs. 19,573.919 million (2013: 16,949.015 million) has also been invoiced by CPPA to the Company, which has been excluded from the above cost and the corresponding liability has been transferred to TESCO. The difference in total units received and the total units billed has been fully adjusted in the above cost.

24.2 Tariff charged by Central Power Purchase Agency was determined by National Electric Power Regulatory Authority (NEPRA) and notified by the Government of Pakistan in the Gazette of Pakistan.

25. OTHER OPERATING COST EXCLUDING DEPRECIATION

Salaries, wages and other benefits
Repairs and maintenance
Rent, rates and taxes
Power, light and water
Postage and telephone
Office supplies and other expenses
Travelling and transportation
Insurance expense
Electricity bill collection charges
Legal and professional charges
Management fees and charges
Auditor's remuneration
NEPRA fee and charges
Advertisement and publicity
Provision for doubtful debts
Overheads charged by CPPA
Write-off long term advance
Miscellaneous expenses

Note	2014 Rupees	2013 Rupees
	9,629,766,766	10,108,089,843
	766,890,828	520,541,776
	32,812,547	58,614,496
	28,243,114	30,997,647
	18,168,911	17,667,976
	77,925,015	54,932,159
	312,014,990	287,513,304
	22,732,003	12,036,645
	+ 133,851,485	152,578,022
	22,827,854	12,093,332
	19,455,840	24,661,359
25.1	895,000	895,000
	16,397,454	14,630,929
	3,158,057	2,346,691
	5,668,007,582	6,316,489,802
	1,331,802	1,546,597
	135,738	15,327,357
	+ 12,700,121	17,630,962,934
	<u>15,767,315,107</u>	

25.1 Management fee and other charges are charged / allocated to the Company by WAPDA on the basis of mutual understanding between the Company and WAPDA.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

	Note	2014 Rupees	2013 Rupees
26. OTHER INCOME			
Profit on bank deposits		54,686,240	92,123,337
Sale of scrap		81,803,785	32,733,618
Late payment surcharge		1,372,994,634	1,386,009,048
Wheeling charges from TESCO	26.1	1,290,372,037	1,157,100,295
Miscellaneous		585,766,362	557,187,479
		<u>3,385,623,058</u>	<u>3,225,153,777</u>

26.1 This represent the amount charged to TESCO for the use of Company's transmission system/lines for electricity purchased from CPPA.

	Note	2014 Rupees	2013 Rupees
27. FINANCIAL (INCOME)/ EXPENSES			
Mark up on TFC PHPL Loan (HBL)-I		4,026,206,425	6,289,542,908
Interest on PHPL (NBP)-II		1,065,344,997	
Interest on PHPL (OGDCL)-III		3,395,750,934	
Mark up on ADB-ERRA		8,905,000	38,482,112
Asian Development Bank - Trench I		369,590,800	
Bank charges		10,930,653	12,845,322
Exchange difference - net		(7,299,212)	41,021,225
		<u>8,869,429,597</u>	<u>6,381,893,614</u>

28. TAXATION

Income tax	28.1		
28.1 Relationship between current tax and accounting profit			
Accounting loss before taxation		(34,403,598,711)	(32,506,986,547)
Applicable tax rate		34%	35%
Tax on accounting loss		(11,697,223,562)	(11,377,445,291)
Tax effect of permanent differences		(13,172,741,233)	(12,888,990,060)
Deferred tax asset not recognized		24,869,964,795	24,266,435,351

29. CHIEF EXECUTIVE'S REMUNERATION

Managerial remuneration- Lump sum package @ Rs. 550,000/month	6,600,000	6,600,000
	<u>6,600,000</u>	<u>6,600,000</u>

In addition, Chief Executive is also provided with free transport, accommodation, residential telephone and medical facilities. Further, meeting fee amounting to Rs.738,050 (2013: Rs. 275,000) has been paid to the directors for attending meetings of the Board of Directors of the Company.

30. RESTATEMENT OF COMPARATIVE FIGURES

The Financial Statements for the year ended June 30, 2013 have been restated to incorporated this revising. The effect of

the restatement on these financial statements is summarized below. There is no effect in the financial year 2014.

	2014 RUPEES	2013 RUPEES
Increase in accrued mark-up on loan		1,463,706,539
Increase in loss		1,463,706,539
Decrease in receivables from GoP		1,102,666,519
Increase / (decrease) in equity		(1,102,666,519)

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

31. Financial risk management

The Company has exposure to the following risks from its use of financial instruments:

- Credit risk
- Liquidity risk
- Market risk

This note presents information about the company's exposure to each of the above risks, the Company's objectives, policies and processes for measuring and managing risk and management of capital. Further quantitative disclosures are included throughout these financial statements.

Risk management framework

The Board of Directors has overall responsibility for the establishment and oversight of the Company's risk management framework. The Board is responsible for developing and monitoring the Company's risk management policies.

The Company's risk management policies are established to identify and analyze the risks faced by the Company, to set appropriate risk limits and controls, and to monitor risks and adherence to limits. Risk management policies and systems are reviewed regularly to reflect changes in market conditions and the Company's activities. The Company, through its training and management standards and procedures, aims to develop a disciplined and constructive control environment in which all employees understand their roles and obligations.

The Company's Board oversees how management monitors compliance with the company's risk management policies and procedures and reviews the adequacy of the risk management framework in relation to the risks faced by the Company. The Board is assisted in its oversight role by Internal Audit. Internal Audit undertakes both regular and ad hoc reviews of risk management controls and procedures, the results of which are reported to the Board.

31.1 Credit risk

Credit risk is the risk of financial loss to the Company if a consumer or counterparty to a financial instrument fails to meet its contractual obligations. The Company is exposed to credit risk to the extent of loans, deposits and advances, trade debts, interest accrued, other receivables and bank balances. The Company deals with regular and permanent consumers who normally make payments on time. The Company controls its credit risk by continuous monitoring of its receivables. The management believes that there is no credit risk involved in respect of receivables from the Government of Pakistan.

31.1.1 Exposure to credit risk

The carrying amount of financial assets represents the maximum credit exposure. The maximum exposure to credit risk at the reporting date is as follows:

	2014 Rupees	2013 Rupees
Loans, deposits and advances	275,233,990	547,620,807
Trade debts	37,316,019,955	29,592,516,561
Interest accrued	-	5,676,711
Other receivables	31,494,003,672	29,420,510,651
Bank balances	2,303,570,217	629,418,431
	<u>71,388,827,834</u>	<u>60,195,743,171</u>

Geographically there is no concentration of credit risk as the company operates in the same geographical area.

31.1.1.1 The maximum exposure to credit risk for trade receivables at the reporting date by type of sector is as follows:

	2014 Rupees	2013 Rupees
Government sector	10,173,273,454	8,339,183,011
Private sector	27,142,744,501	21,253,333,550
	<u>37,316,019,955</u>	<u>29,592,516,561</u>

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

31.1.1.2 The maximum exposure to credit risk for trade receivables at the reporting date by type of product was:

	2014 Rupees	2013 Rupees
Electricity consumers	<u>37,316,019,955</u>	<u>29,592,51</u>

Trade debts are secured to the extent of corresponding consumers' security deposits against electricity connection to employees are secured against mortgage of house / plot and hypothecation on vehicles for which loans were sanctioned. The Company has arrangements with all the financial institutions for collection of bills from consumers. The Company has issued standing instructions to all these financial institutions to transfer funds in the main account. At the end of the day the Company has funds lying in the bank accounts of financial institutions with high credit ratings. The Company assesses the credit quality of the counter parties as satisfactory. The Company does not hold any collateral assets against any of its financial assets other than trade debts and loan to employees.

31.1.2 Impairment losses

The aging of trade receivables at the reporting date was:

	Gross 2014 - Rupees	Impairment 2014 - Rupees	Gross 2013 - Rupees	Impairment 2013 - Rupees
Not past due	6,536,738,593	-	4,570,263,966	-
Past due up to 1 year	6,789,912,307	92,252,802	5,372,322,006	89,212
Past due between:				
- 1 to 3 years	5,060,170,621	714,200,502	8,788,323,591	643,392
Over 3 years	59,596,556,401	39,860,904,662	45,895,796,934	34,300,992
	<u>77,983,377,922</u>	<u>40,667,357,966</u>	<u>64,626,706,497</u>	<u>35,034,411</u>

31.1.2.1 The movement in the allowance for impairment in respect of trade debts during the year was as follows:

	2014 Rupees	2013 Rupees
Balance at 1 July	35,034,189,937	28,721,212
Provision charge	5,668,007,582	631,664
Trade debts written off	(34,839,552)	(631,664)
Balance at 30 June	<u>40,667,357,967</u>	<u>35,034,411</u>

31.1.3 Allowances for impairment

Based on past experience, the management believes that no impairment allowance is necessary in respect of trade debts against which impairment allowance has not been created. Trade debts are due from regular and permanent customers mainly include government agencies and the Company does not expect these customers to fail to meet their obligations.

31.1.4 Write-off policy

The allowance account in respect of trade debts is used to record impairment losses unless the Company is satisfied that no recovery of the amount owing is possible. At that point the amount considered irrecoverable is written off against the financial asset directly.

31.2 Liquidity risk

Liquidity risk is the risk that the Company will not be able to meet its financial obligations as they fall due. The Company's approach to managing liquidity is to ensure, as far as possible, that it will always have sufficient liquid assets to meet its liabilities when due, under both normal and stressed conditions, without incurring unacceptable losses or damage to the Company's reputation.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

31.2.1 The maturity profile of the Company's financial liabilities based on the contractual amounts is as follows:

	Long term loans including mark-up		Trade and other payables	
	Carrying amount	Contractual cash flows	Carrying amount	Contractual cash flows
2014 - Rupees				
Maturity up to one year	14,530,740,183	22,663,310,710	111,132,185,127	(111,132,185,127)
Maturity between:				
- 1 to 2 years	19,578,748,403	24,640,692,196	-	-
- 2 to 3 years	16,010,098,962	18,848,970,274	-	-
- 3 to 4 years	6,426,096,675	7,287,290,199	-	-
- 4 to 5 years	6,256,585,842	6,451,991,846	-	-
Maturity over five years	8,737,241,606	2,512,077,333	-	-
	<u>71,539,511,671</u>	<u>82,404,332,558</u>	<u>111,132,185,127</u>	<u>(111,132,185,127)</u>
2013 - Rupees				
Maturity up to one year	929,336,204	1,087,880,630	213,402,965,287	(213,402,965,287)
Maturity between:				
- 1 to 2 years	158,544,426	434,808,088	-	-
- 2 to 3 years	158,544,426	407,855,535	-	-
- 3 to 4 years	158,544,426	380,902,982	-	-
- 4 to 5 years	158,544,426	353,950,430	-	-
Maturity over five years	2,590,602,487	2,512,077,333	-	-
	<u>4,154,116,395</u>	<u>5,177,474,998</u>	<u>213,402,965,287</u>	<u>(213,402,965,287)</u>

31.2.2 The contractual cash flows relating to the loan related financial liabilities have been determined on the basis of interest rates effective as at 30 June. The rates of mark-up have been disclosed in note 6 to these financial statements.

31.3 Market risk

Market risk is the risk that changes in market prices, such as foreign exchange rates, interest rates and equity prices, will affect the company's income or the value of its holdings of financial instruments. The objective of market risk management is to manage and control market risk exposures within acceptable parameters, while optimizing the return. The Company is exposed to currency risk and interest rate risk only.

31.3.1 Exposure to currency risk

The Company is not exposed to any currency risk

	2014		2013	
	Rupees	US Dollars	Rupees	US Dollars
Long term loans	799,939,154	8,103,932	807,238,366	8,103,932
Accrued mark-up	8,905,000	97,857	38,487,117	38,487,117
Total exposure	<u>808,844,154</u>	<u>8,201,789</u>	<u>845,725,483</u>	<u>8,142,419</u>

The following significant exchange rates applied during the year:

	Average rates		Balance sheet date rate	
	2014	2013	2014	2013
US Dollars	99.16	97.09	98.71	97.09

31.3.1.1 Sensitivity analysis

A 10 percent strengthening of the Rupee against US Dollar at 30 June would have increased equity and profit after tax by Rs. 80.79 million (2013: Rs. 84.57 million). This analysis assumes that all other variables, including interest rates, remain constant. The analysis is performed on the same basis for 2013.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

10 percent weakening of the Rupees against US Dollar at 30 June would have had the equal but opposite effect on the above currencies to the amounts shown above, on the basis that all other variables remain constant.

31.3.2 Interest rate risk

The interest rate risk is the risk that the fair value of future cash flows of a financial instrument will fluctuate because of changes in the market interest rates. Majority of the interest rate exposure arises from long term loans. At the balance sheet date, the interest rate profile of the Company's interest bearing financial instrument is:

	2014 Rupees	Carrying 2013 Rupees	Change 2014 2013
Fixed rate instruments			
Financial assets			
Long term loans	127,355,233	172,479	127,182,754
Bank balances	629,559,425	276	629,559,149
	<u>756,914,658</u>	<u>176</u>	<u>756,737,982</u>
Financial liabilities			
Long term loans	71,539,511,671	43,025,911	71,496,485,760

The Company have no variable rate financial instruments.

31.4 Capital management

The Company's objective when managing capital is to safeguard the Company's ability to continue as a going concern so that it can continue to provide returns to shareholders and benefits to other stakeholders and to maintain a strong capital base to support the sustained development of its businesses. The Company manages its capital structure which comprises capital and reserves by monitoring return on net assets and makes adjustments to it in the light of changes in economic conditions. In order to maintain or adjust the capital structure, the Company may adjust the amount of dividends to shareholders, appropriation of amounts to capital reserve or / and issue new shares.

31.5 Fair value of financial assets and liabilities

(i) The fair values of financial assets and liabilities, together with the carrying amounts shown in the balance sheet are as follows:

	2014 - Rupees		2013 - Rupees	
	Carrying value	Fair value	Carrying value	Fair value
Financial assets				
Long term loans	126,559,846	126,259,846	126,259,846	126,259,846
Long term deposits	-	-	-	-
Trade debts	29,592,516,560	29,592,516,560	29,592,516,560	29,592,516,560
Loans and advances	421,360,961	421,360,961	421,360,961	421,360,961
Interest accrued	5,676,717	5,676,717	5,676,717	5,676,717
Other receivables	29,875,873,356	29,875,873,356	29,875,873,356	29,875,873,356
Bank balances	629,418,437	629,418,437	629,418,437	629,418,437
Financial liabilities				
Long term loans	43,025,586,911	43,025,586,911	43,025,586,911	43,025,586,911
Trade and other payables	111,132,85,127	111,132,185,127	213,402,965,287	213,402,965,287
Accrued mark-up	2,155,226,104	2,155,226,104	2,155,226,104	2,155,226,104

(ii) Determination of fair values

A number of the company's accounting policies and disclosures require the determination of fair value, for both financial and non - financial assets and liabilities. Fair values have been determined for measurement and / or disclosure purposes based on the following methods:

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

Non - derivative financial assets

The fair value of non derivative financial assets is estimated as the present value of future cash flows, discounted at the market rate of interest at the reporting date. This fair value is determined for disclosure purpose.

Non - derivative financial liabilities

Fair value, which is determined for disclosure purposes, is calculated based on the present value of future principal and interest cash flows, discounted at the market rate of interest at the reporting date.

32.

TRANSACTIONS WITH RELATED PARTIES

WAPDA holds 99.99% shares of the Company, therefore all electricity generation and distribution undertakings of WAPDA are related parties of the company. Other related parties comprise of associated companies, directors, key management personnel, Government of Pakistan and Government owned entities.

Transactions with Government of Pakistan and Government owned entities are not disclosed as the management is of the opinion that it is impracticable to disclose such transactions due to the nature of the Company's operations.

Balances with related parties have been disclosed in notes 6, 9, 17 and 18 to the financial statements. Transactions with electricity generation and distribution undertakings of WAPDA, other than remuneration and benefits to Chief Executive as disclosed in note 28 to the financial statements, are as follows:

Free electricity supplied by the Company
 Free electricity supplied to the Company
 Services provided by the Company
 (mainly include cash remitted to CPPA)
 Services provided to the Company
 Electricity purchased by the Company
 Management fee
 Wheeling charges recognized as income
 Relent loan received during the year
 Mark-up expense during the year
 Balance of accrued mark-up
 Trade receivable balance from Government and related departments
 Subsidy received during the year
 Subsidy claimed during the year

2014 Rupees	2013 Rupees
113,244,003	58,060,485
15,878,373	7,449,048
52,289,237,849	45,373,931,994
66,410,897	317,285,816
118,565,463,507	107,936,472,688
19,455,840	24,561,359
1,290,372,037	1,157,100,295
28,521,223,972	40,196,380,869
2,057,715,420	1,698,020,792
4,212,941,524	2,155,226,104
10,173,275,454	8,339,183,017
37,832,043,529	44,093,337,000
37,636,403,523	36,825,685,625

33.

BENAZIR EMPLOYEE STOCK OPTION SCHEME

On August 14, 2009, the Government of Pakistan (GOP) launched Benazir Employees' Stock Option Scheme (the Scheme) for employees of certain State Owned Enterprises (SOEs) and non-State Owned Enterprises, where GOP holds significant investments (non-SOEs). The scheme is applicable to permanent and contractual employees who were in employment of these entities on the date of launch of the scheme, subject to completion of five years vesting period by all contractual employees and by permanent employees in certain instances.

47

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2014

The Scheme provides for a cash payment to employees on retirement or termination of their employment with the respective entities. To administer this scheme, GOP shall transfer 12 % of its shareholding in the respective entities to a Trust Fund to be created for this purpose by each of such entities. The eligible employees shall be entitled to receive such amounts from Trust Funds in proportion to their respective length of service and on retirement or termination of their employment. The employees shall be entitled to receive such amounts from Trust Funds in exchange for the surrendered shares at the prevailing market price for listed entities or breakup value for non-listed entities. The shares surrendered shall be transferred back to GOP.

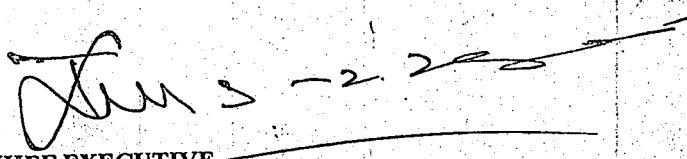
The Scheme also provides that 50% of dividend related to shares transferred to the Trust Fund shall be distributed amongst the unit-holder employees. The balance 50% dividend shall be transferred to the Central Revolving Fund managed by the Privatization Commission. The Trust Fund shall be used against surrendered units. The deficit, if any, in Trust Funds to meet the requirements shall be met by the GOP.

The IFRS 2 "Share Based Payments" will be implemented once the shares are listed on the stock exchange.

34.

DATE OF APPROVAL

These financial statements were approved by the Board of Directors in their meeting held on 30 June 2014.


CHIEF EXECUTIVE

618



RSM

ANNEX-F

Avais Hyder Liaquat Nauman
Chartered Accountants

330

Suit # 6, Block-A, 2nd Floor, Cantonment Plaza,
Fakhr-e-Alam Road, Peshawar Cantt. - Pakistan
T: +92 (91) 527 7205/527 8310 F: +92 (91) 526 0085
E: peshawar@ahln.com.pk W: www.ahln.com.pk

AUDITORS' REPORT TO THE MEMBERS

We have audited the annexed balance sheet of **Peshawar Electric Supply Company Limited** as at **June 30, 2013** and the related profit and loss account, statement of comprehensive income, cash flow statement and statement of changes in equity together with the notes forming part thereof, for the year then ended and we state that except for the matter discussed in paragraph below, we have obtained all the information and explanations which, to the best of our knowledge and belief, were necessary for the purposes of our audit.

It is the responsibility of the Company's management to establish and maintain a system of internal control, and prepare and present the above said statements in conformity with the approved accounting standards and the requirements of the Companies Ordinance, 1984. Our responsibility is to express an opinion on these statements based on our audit.

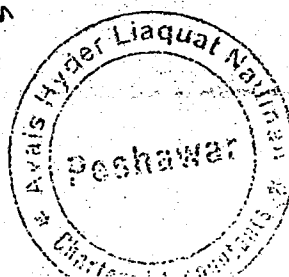
We conducted our audit in accordance with the auditing standards as applicable in Pakistan. These standards require that we plan and perform the audit to obtain reasonable assurance about whether the above said statements are free of any material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosure in the above said statements. An audit also includes assessing the accounting policies and significant estimates made by management, as well as, evaluating the overall presentation of the above said statements. We believe that our audit provides a reasonable basis for our opinion and, after due verification, we report that:

- (a) As reported in the previous report the Company still has remained unable to recover receivables from the Government of Azad Jammu & Kashmir (GoAJK) amounting to Rs.6.295 billion for the current years and previous years inspite of efforts. In our opinion, the Company should have recorded impairment against receivable balance of Rs. 4.108 billion from GoAJK up to 30 June 2012 against receivables and should have reversed the receivable of Rs. 2.186 billion recognized during the year against sale of power to GoAJK. If the above mentioned impairment had been recorded, sale of electricity would have been reduced by Rs. 2.186 billion and operating loss for the current year would have increased by Rs. 6.295 billion with increase in accumulated loss at the balance sheet date by the same amount.



Other Offices at:
Lahore : 92 (42) 3587 2731/2/3
Karachi : 92 (21) 3565 5975/6
Islamabad : 92 (51) 211 4096/7/8
Faisalabad : 92 (41) 854 1165/854 1965
Quetta : 92 (86) 202 0000

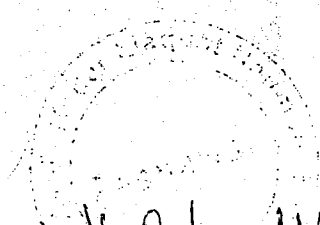
- (b) In our opinion, except for the possible effect of matters discussed in the preceding paragraph above, proper books of account have been kept by the Company as required by the Companies Ordinance, 1984:
- (d) In our opinion;
- (i) except for the effect of the matters reported in preceding paragraphs above, the balance sheet, profit and loss account together with the notes thereon have been drawn up in conformity with the Companies Ordinance, 1984, and are in agreement with the books of account and are further in accordance with accounting policies consistently applied;
 - (ii) the expenditure incurred during the year was for the purpose of the Company's business; and
 - (iii) the business conducted, investments made and the expenditure incurred during the year were in accordance with the objects of the Company;
- (e) Except for the effect on the financial statements of the matters stated in preceding paragraphs above, in our opinion and to the best of our information and according to the explanations given to us, the balance sheet, profit and loss account, statement of comprehensive income, cash flow statement and statement of changes in equity together with the notes forming part thereof conform with the approved accounting standards as applicable in Pakistan, and give the information required by the Companies Ordinance, 1984, in the manner so required and respectively give a true and fair view of the state of the Company's affairs as at June 30, 2013 and of the loss, its comprehensive income, its cash flows and changes in equity for the year then ended; and
- (f) In our opinion, no Zakat was deductible at source under the Zakat and Usher Ordinance, 1980.
- (g) Without further qualifying our opinion, we draw attention to the:
- As explained in note 1.2 in the financial statements that the Company has suffered net loss of Rs. 31.043 billion during the year raising the accumulated losses to Rs. 157.308 billion as at the year end. Similarly, the current liabilities exceed current assets by Rs. 108.162 billion as at the balance sheet date notwithstanding the matter discussed in preceding paragraph above. However, the financial statements have been prepared on going concern basis as the company has managed to continue operation due to continuous support from Government of Pakistan (GOP) and WAPDA and reduction in line losses. The support is likely to be provided in the future and therefore these financial statements have not been adjusted under the "Going Concern Assumption";
 - Note 17, Other receivable includes balance Rs. 455 million (2012:Rs. 1.23 billion) receivables which represent the un-reconciled difference between the current account (Inter Office Transaction) maintained between different accounting units and head office of the Company as at June 30, 2013. In the absence of related information, we remained unable to determine the impact on these financial statements.
 - note 17.1 of the financial statements shows a balance amounting to Rs. 26.8 billion (2012: 25.6 billion) receivables from TESCO, but as explained in note 17.1.1, the management are confident of recovery of the amount;



- As reported in previous year audited report the recoverability of subsidy claims as explained in note 18.1 withheld by the Ministry of Water and Power (MOW&P) relating to years from 2011 to 2013 aggregating Rs. 2,002.38 million is still not received and dependent upon verification and consequent acceptance of these claims by MOW&P;
- As explained in note 5.4, closing has been achieved effective June 30, 2008, however the company is in the process of issuing shares to WAPDA; and
- As explained in note 9.2, the reasons for not recording of Company's liability amounting to Rs. 153 billion towards CPPA against cost of electricity transmitted to TESCO and corresponding receivables from TESCO.

The previous year's financial statements of the Company were audited by KPMG Taseer Hadi & Co., Chartered Accountants who expressed qualified opinion in its report dated 01 November 2012.

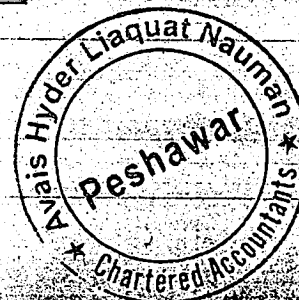
Peshawar
Nov. 29, 2013


Avais Hyder Liaquat Nauman
Avais Hyder Liaquat Nauman
Chartered Accountants
Engagement Partner: Amjad Javed Tajik

As at 30 June 2013

CONTINGENCIES AND COMMITMENTS

CHIEF EXECUTIVE

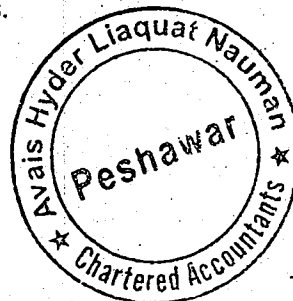


DIRECTOR

Peshawar Electric Supply Company Limited
Profit and Loss Account
For the year ended 30 June 2013

	Note	2013 Rupees	2012 Rupees
Sale of electricity	20	60,151,514,350	53,293,073,237
Subsidy from Government of Pakistan on sale of electricity		36,825,685,885	25,225,433,818
		<u>96,977,200,235</u>	<u>78,518,507,055</u>
Rental and service income	21	58,295,873	89,934,887
		<u>97,035,496,108</u>	<u>78,608,441,942</u>
Amortization of deferred credit	8	737,261,611	687,447,425
		<u>97,772,757,719</u>	<u>79,295,889,367</u>
OPERATING COST			
Cost of electricity	22	(107,936,472,688)	(106,473,613,812)
Other operating cost excluding depreciation	23	(17,630,961,257)	(24,590,500,238)
Depreciation on property, plant and equipment	12.1	(1,555,567,455)	(1,457,206,527)
		<u>(127,123,001,400)</u>	<u>(132,521,320,577)</u>
		<u>(29,350,243,681)</u>	<u>(53,225,431,210)</u>
Other income	24	3,225,153,777	6,698,331,364
		<u>(26,125,089,905)</u>	<u>(46,527,099,846)</u>
Financial expense	25	(4,918,190,104)	(3,213,409)
Net loss before taxation		<u>(31,043,280,008)</u>	<u>(46,530,313,255)</u>
Taxation	26	-	-
Net loss after taxation		<u><u>(31,043,280,008)</u></u>	<u><u>(46,530,313,255)</u></u>

The annexed notes form an integral part of these financial statements.



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CHIEF EXECUTIVE

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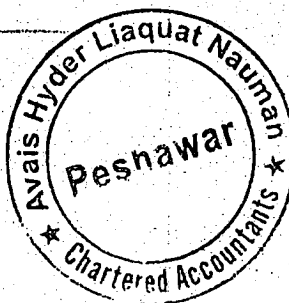
DIRECTOR

Peshawar Electric Supply Company Limited
Statement of Comprehensive Income
For the year ended 30 June 2013

	2013 Rupees	2012 Rupees
Net loss after taxation	(31,043,280,008)	(46,530,313,255)
Other comprehensive income	-	-
Total comprehensive income for the year	(31,043,280,008)	(46,530,313,255)

The annexed notes form an integral part of these financial statements.

[Signature]
CHIEF EXECUTIVE



[Signature]
DIRECTOR

Peshawar Electric Supply Company Limited

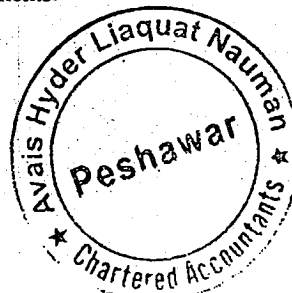
Cash Flow Statement

For the year ended 30 June 2013

	Note	2013 Rupees	2012 Rupees
CASH FLOW FROM OPERATING ACTIVITIES			
Net loss before taxation		(31,043,280,008)	(46,530,313,255)
Adjustments for non-cash charges and other items:			
Depreciation	12.1	1,555,567,455	1,457,206,527
Provision for staff retirement benefits	7.2	3,197,098,646	2,447,201,254
Provision for doubtful debts		6,316,489,802	15,276,391,887
Write-off long term advance		-	-
Amortization of deferred credit	8	(737,261,611)	(687,447,425)
Profit on bank deposits		(92,123,337)	(175,165,878)
Exchange difference - net		41,021,295	(13,278,100)
Financial charges	25	4,877,168,809	16,491,509
		15,157,961,059	18,321,399,774
Cash flows from operations before working capital changes		(15,885,318,949)	(28,208,913,481)
(Increase) / decrease in current assets:			
Stores, spare parts and loose tools		(255,857,402)	(498,455,007)
Trade debts		(11,142,949,052)	(11,764,160,442)
Loans and advances		(59,916,258)	3,496,777
Other receivables		(10,439,287,841)	(8,408,978,371)
Receivable from GOP		7,267,651,375	(9,738,818,306)
		(14,630,359,178)	(30,406,915,349)
Increase in trade and other payables		(421,815,920)	57,516,350,965
Cash flows from operations		(30,937,494,048)	(1,099,477,865)
Staff retirement benefits paid		(1,106,601,647)	(931,881,587)
Financial charges paid		(4,419,963,497)	(15,763,703)
Net cash generated from operating activities		(36,464,059,191)	(2,047,123,155)
CASH FLOWS FROM INVESTING ACTIVITIES			
Capital expenditure incurred during the year		(6,548,674,786)	(4,321,086,878)
Profit received on bank deposits		121,864,020	196,123,641
Proceed received from customers in deferred credit		1,423,262,447	3,654,977,515
Long term loans recovered during the year		35,071,206	(4,927,305)
Net cash used in investing activities		(4,968,477,113)	(474,913,027)
CASH FLOWS FROM FINANCING ACTIVITIES			
Proceeds from long term loans		40,196,380,869	747,176,915
Net cash generated from financing activities		40,196,380,869	747,176,915
Net (decrease) / increase in cash and cash equivalents		(1,236,155,435)	(1,774,859,267)
Cash and cash equivalents at beginning of the year		1,865,573,871	3,640,433,138
Cash and cash equivalents at end of the year	19	629,418,437	1,865,573,871

The annexed notes form an integral part of these financial statements.

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CHIEF EXECUTIVE



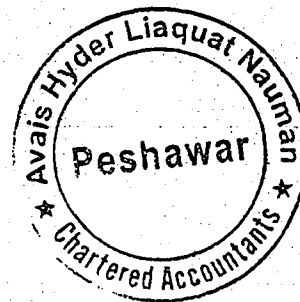
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DIRECTOR

Peshawar Electric Supply Company Limited
Statement of Changes in Equity
For the year ended 30 June 2013

	Issued, subscribed and paid up share capital Rupees	Deposit for shares Rupees	Accumulated loss Rupees	Total Rupees
Balance as at 30 June 2011	10,000	18,082,025,791	(79,734,770,833)	(61,652,735,042)
Total comprehensive income - Loss for the year	-	-	(46,530,313,255)	(46,530,313,255)
Balance as at 30 June 2012	10,000	18,082,025,791	(126,265,084,088)	(108,183,048,297)
Total comprehensive income - Loss for the year	-	-	(31,043,280,008)	(31,043,280,008)
Balance as at 30 June 2013	10,000	18,082,025,791	(157,308,364,096)	(139,226,328,305)

The annexed notes form an integral part of these financial statements.

Amir S. 22/5/13
CHIEF EXECUTIVE



[Signature]
DIRECTOR

Peshawar Electric Supply Company Limited
Notes to the Accounts
For the year ended 30 June 2013

STATUS AND ACTIVITIES

- 1.1. Peshawar Electric Supply Company Limited (PESCO) ("the Company") is a public limited company incorporated under the Companies Ordinance, 1984, having its registered office situated at WAPDA House, Lahore. The company was incorporated on April 23, 1998 to acquire/takeover all the properties, rights, assets, obligations and liabilities of Peshawar Area Electricity Board owned by Pakistan Water and Power Development Authority (WAPDA) and such other assets and liabilities as agreed. The company commenced commercial operation w.e.f. July 01, 1998. The principal activity of the company is the distribution and supply of electricity within its defined geographical boundaries. National Electric Power Regulatory Authority (NEPRA) has granted Distribution License to the company for electricity distribution. Government of Pakistan has notified the tariff for effective from 06 May 2012, which is retrospectively effective from March 2012. It currently purchases electricity from National Transmission and Dispatch Company Limited (NTDC) / Central Power Purchasing Authority (CPPA), being the sole supplier and an associated undertaking of the company.
- 1.2. The company has suffered a net loss of Rs. 31,043 million during the year under reference. Current liabilities of the company have exceeded its current assets by Rs. 108,162 million as at balance sheet date. The distribution losses of the company are 34% of the electricity purchased (2012: 36 %). These factors indicate the existence of a material uncertainty, which may cast significant doubts on the company's ability to continue as a going concern.

However, these financial statements have been prepared on going concern basis on the rational assumption that the losses due to shortfall in tariff and distribution losses will be made through Government subsidies. Further the company has initiated the programs and actions for reduction of distribution losses and recovery of receivables from consumers and associated undertakings.

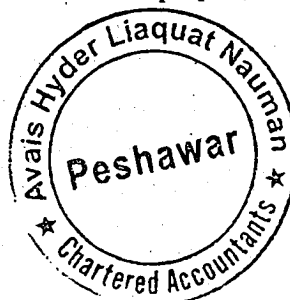
2 BASIS OF PREPARATION

2.1 Statement of compliance

These financial statements have been prepared in accordance with approved accounting standards as applicable in Pakistan. Approved accounting standards comprise of such International Financial Reporting Standards (IFRS) issued by the International Accounting Standard Board as are notified under the Companies Ordinance, 1984 provisions of and directives issued under the Companies Ordinance, 1984. In case requirement differ, the provisions or directives of Companies Ordinance, 1984 shall prevail.

2.2 Basis of measurement

These financial statements have been prepared under the historical convention except for the staff retirement benefits which are carried at present value in accordance with the requirement of IAS-19, "Employee Benefits" and carrying values of certain items of property, plant and equipment are based on their revalued values.



2.3 Functional and presentation currency

Items included in the financial statements are measured using currency of the primary economic environment in which the Company operates. The financial statements are prepared in Pakistani Rupees, which is the Company's functional and presentation currency. All functional information presented in Pakistani Rupees has been rounded to the nearest rupee unless otherwise stated.

2.3 Significant accounting estimates and judgments

The preparation of financial statements in conformity with approved accounting standards requires the use of certain critical accounting estimates. It also requires management to make judgment, estimates and assumption that affect the application of policies and reported amounts of assets and liabilities, income and expenses. Estimates and associated assumptions are based on historical experience and other factors that are believed to be reasonable under the circumstances, the result of which form the basis of making the judgment about carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates.

The estimates and underlying assumption are reviewed on an ongoing basis. Revisions to accounting estimates are recognized in the period in which the estimates are revised if the revision affects only that period or in the period of revision and future periods if it affects both current and future periods.

Judgments made by the management in application of approved accounting standards that have significant effect on the financial statements and estimates with a significant risk of material adjustment in the next year are discussed in ensuring paragraphs.

2.3.1 Property, plant and equipment

The company reviews the useful lives and residual values of property, plant and equipment on a regular basis. Any change in estimates in future years might affect the carrying amounts of the respective item of property, plant and equipments with a corresponding effect on the depreciation charge and amortization of deferred credit.

2.3.2 Provision for inventory obsolescence and doubtful receivables

The Company reviews the carrying amount of stores and spares on a regular basis and provision is made for obsolescence if there is any change in usage pattern and physical form of related stores and spares. Further the carrying amounts of trade and other receivables are assessed on a regular basis and if there is any doubt about the reliability of these receivables, appropriate amount of provision is made.

2.3.3 Staff retirement benefits

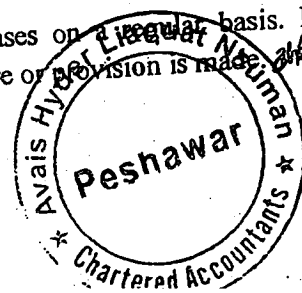
Retirement benefits are provided to regular employees of the Company. Calculation of provision for staff retirement benefits requires assumptions to be made of the future outcomes, the principal ones being in respect of increase in remuneration, discount rates and inflation rate used to convert future cash flows to current values. Calculations are sensitive to changes in the underlying assumptions.

2.4.4 Taxation

The Company takes into account the current income tax laws and decisions taken by the tax authorities. Instances where the Company's views differ from the views taken by the income tax department at the assessment stage and where the Company considers that its view on items of material nature is in accordance with law, the amounts are shown as contingent liabilities.

2.4.5 Contingencies

The Company reviews the status of all the legal cases on a regular basis. Based on the expected outcomes and lawyers' judgment, appropriate disclosure or provision is made.



Offsetting Financial Assets and Financial Liabilities (Amendments to IFRS 7) – (effective for annual periods beginning on or after 1 January 2013). The amendments to IFRS 7 contain new disclosure requirements for financial assets and liabilities that are offset in the statement of financial position or subject to master netting agreement or similar arrangement.

Annual Improvements 2009–2011 (effective for annual periods beginning on or after 1 January 2013). The new cycle of improvements contains amendments to the following four standards, with consequential amendments to other standards and interpretations.

IAS 16 Property, Plant and Equipment is amended to clarify the accounting of spare parts, stand-by equipment and servicing equipment. The definition of 'property, plant and equipment' in IAS 16 is now considered in determining whether these items should be accounted for under that standard. If these items do not meet the definition, then they are accounted for using IAS 2 Inventories. Management is currently undertaking a comprehensive exercise to assess the spares, standby equipment and servicing equipment that would qualify for recognition as property, plant and equipment. The amount of reclassification of stores and spares to property, plant and equipment has not been quantified to date

IAS 32 Financial Instruments: Presentation - is amended to clarify that IAS 12 Income Taxes applies to the accounting for income taxes relating to distributions to holders of an equity instrument and transaction costs of an equity transaction. The amendment removes a perceived inconsistency between IAS 32 and IAS 12.

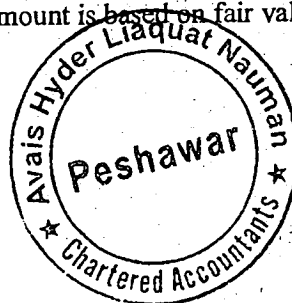
IAS 34 Interim Financial Reporting is amended to align the disclosure requirements for segment assets and segment liabilities in interim financial reports with those in IFRS 8 Operating Segments. IAS 34 now requires the disclosure of a measure of total assets and liabilities for a particular reportable segment. In addition, such disclosure is only required when the amount is regularly provided to the chief operating decision maker and there has been a material change from the amount disclosed in the last annual financial statements for that reportable segment.

IFRIC 20 - Stripping cost in the production phase of a surface mining (effective for annual periods beginning on or after 1 January 2013). The interpretation requires production stripping cost in a surface mine to be capitalized if certain criteria are met. The amendments have no impact on financial statements of the Company.

IFRIC 21- Levies 'an Interpretation on the accounting for levies imposed by governments' (effective for annual periods beginning on or after 1 January 2014). IFRIC 21 is an interpretation of IAS 37 Provisions, Contingent Liabilities and Contingent Assets. IAS 37 sets out criteria for the recognition of a liability, one of which is the requirement for the entity to have a present obligation as a result of a past event (known as an obligating event). The Interpretation clarifies that the obligating event that gives rise to a liability to pay a levy is the activity described in the relevant legislation that triggers the payment of

IAS 39 Financial Instruments: Recognition and Measurement- Notation of Derivatives and Continuation of Hedge Accounting (Amendments to IAS 39) (effective for annual periods beginning on or after 1 January 2014). The narrow- scope amendments will allow hedge accounting to continue in a situation where a derivative, which has been designated as a hedging instrument, is novated to effect clearing with a central counterparty as a result of laws or regulation, if specific conditions are met (in this context, a novation indicates that parties to a contract agree to replace their original counterparty with a

Amendment to IAS 36 "Impairment of Assets" Recoverable Amount Disclosures for Non-Financial Assets (effective for annual periods beginning on or after 1 January 2014). These narrow-scope amendments to IAS 36 Impairment of Assets address the disclosure of information about the recoverable amount of impaired assets if that amount is based on fair value less costs of disposal. *and*



61

ARY OF SIGNIFICANT ACCOUNTING POLICIES

The accounting policies set below have been applied consistently to all periods presented in these financial statements.

3.1 Deferred credit

Amount received from consumers and the government as contribution towards the cost of extension of distribution network and of providing service connections are deferred for amortization over the useful lives of related assets at the rate of 3.5%. Amortization and depreciation for the year are included in profit and loss account.

3.2 Staff retirement benefits

The Company provides unfunded pension, post retirement medical, free electricity benefits and compensated absences to all its regular employees. Liabilities for these benefits are determined on the basis of actuarial valuation carried out by using the Projected Unit Credit Method and are charged to income currently. The last valuation was conducted as at June 30, 2012.

Significant actuarial assumptions used for calculating provision as of June 30, 2013.

	Pension obligation	Medical benefits	Free electricity	Compensated absences
Discount rate	13.25 %	13.25 %	13.25 %	13.25 %
Rate of increase in eligible salary	11 %	-	-	-
Indexation in pension	4.75 %	-	-	-
Medical inflation rate	-	7.75 %	-	-
Exposure inflation rate	-	3 %	-	-
Electricity inflation rate	-	-	7.75 %	-
Mortality rate	EFU 61-66 mortality table			

The unrecognized actuarial gain / losses exceeding corridor limits defined in International Accounting Standard - 19 "Employee Benefits" are amortized over the expected remaining working lives of the employees participating in the plan.

3.3 Taxation

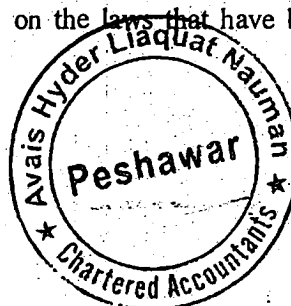
Income tax expense comprises current and differed tax. Income tax is recognized in profit and loss account except to extent that relates to items recognized directly in equity, in which case it is recognized in equity.

Current

Provision for current taxation is based on taxable income at the current rate of taxation after taking into account tax credits and tax rebates, if any.

Differed

Differed tax is accounted for using the balance sheet method, providing for temporary differences between the carrying value of assets and liabilities for financial reporting purposes and the amount used for taxation purposes. Differed tax is measured at the tax rates that are expected to be applied to temporary differences when they reverse, based on the laws that have been enacted or substantively enacted at the reporting date.



Differed tax is recognized on all major temporary differences. Differed tax assets recognized to the extent that it is probable that future taxable profits will be available against which the temporary difference, unused tax losses and tax credits can be utilized. Differed tax are reviewed at each reporting date and are reduced to the extent that it is no longer probable that the relaxed tax benefit will be

Differed tax assets and liabilities are offset if there is a legally enforceable right to offset current tax liabilities and assets, and they relate to income taxes levied by the same tax authority on the same the same taxable entity, or on different tax entities, but they intend to settle current tax liabilities and assets on the net basis or their tax assets and liabilities will be realized simultaneously.

In view of uncertainty of taxable profit in the foreseeable future against which the losses could be utilized, the company has not recognized a differed tax asset amounting to Rs.23,755 million (2012 : Rs.25,114 million)

3.4 Provision

Provisions are recognized in the balance sheet when the company has legal or constructive obligation as a result of past event and it is probable that an outflow of resources embodying economic benefits will be required to settle the obligation and a reliable estimate can be made of the amount of obligation. Provisions are measured at the present value of expected expenditure, discounted at a pre tax rate that reflects current market assessment of the time value of money and the risk specific to the obligation. However, provisions are reviewed at each balance sheet date and adjusted to reflect current best estimates.

3.5 Borrowing Cost

Borrowing costs are charged to income as and when incurred except costs that are directly attributable to acquisition, construction or production of qualifying assets that are capitalized as part of the cost of

3.6 Property, Plant and Equipment

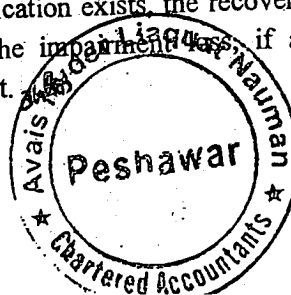
Freehold land is stated at cost amount while capital work in progress is stated at cost less impairment loss, if any. Leasehold land, building on freehold land and distribution equipment are stated at cost amount less accumulated depreciation. All other operating fixed assets are stated at cost less accumulated depreciation and accumulated impairment, if any.

Cost include expenditure that is directly attributable to the acquisition of the asset. The cost of self-constructed assets include the cost of materials, direct labour and any other costs directly attributable to bringing the assets into working condition for their intended use and capitalized borrowing costs.

Depreciation is charged to income on straight line method so as to write-off the depreciable amount of an asset over its estimated useful life at the rates mentioned in note 12 to the financial statements. Depreciation on depreciable assets is commenced from the month the asset is available for use up to the month preceding the month of disposal. Major renewals and improvements are capitalized, while minor replacements, repairs and maintenance are charged to income.

3.7 Impairment

The carrying amounts of assets are reviewed at each balance sheet date to determine whether there is any indication of impairment loss. If any such indication exists, the recoverable amount of that asset is estimated in order to determine the extent of the impairment loss, if any. Impairment losses are recognized as expense in the profit and loss account.



an impairment loss is reversed if there has been a change in the estimates used to determine the recoverable amount. An impairment loss is reversed only to the extent that the assets carrying amount does not exceed the carrying amount that would have been determined, net of depreciation or amortization. If no impairment loss had been recognized. For non-financial assets, financial assets measured at amortized cost, available for sale financial assets that are debt securities, the reversal is recognized in profit and loss account.

3.8 Foreign Currency Transactions

Transactions in foreign currencies are recorded into local currency at the rates of exchange prevailing at the date of transaction. All monetary assets and liabilities in foreign currencies are translated at exchange rates prevailing at the balance sheet date. Exchange differences are included in the profit and

3.9 Stores, spare parts and loose tools

These are valued at moving average cost less allowance for impairment for obsolete and slow moving stores. Items in transit which are valued at cost comprising invoice value and related expenses incurred thereon up to the balance sheet date less impairment, if any.

3.10 Revenue recognition

Electricity Sale

Revenue related to electricity sales is recognized on supply of electricity to consumers at rates determined by NEPRA and notified by Government of Pakistan from time to time. Late payment surcharge are recognized on accrual basis.

Tariff adjustment

Tariff adjustment for variation in fuel price is recognized in the relevant period on the basis of rates determined by NEPRA and notified by Government of Pakistan up to the date of approval of financial statement by the board of directors of the company.

Interest / mark-up

Interest / Mark-up on interest on bank deposits is recognized on time proportion basis.

Miscellaneous

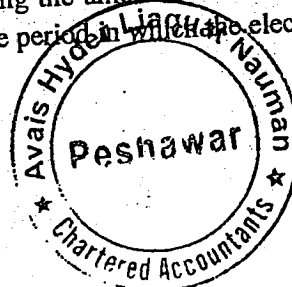
Miscellaneous revenues are recognized on actual receipt basis.

3.11 Electricity subsidy to consumers

Subsidy on electricity announced by the Government of Pakistan for consumers is recognized under revenue on accrual basis.

3.12 Power purchase variation subsidy

Subsidy provided by the Government of Pakistan on cost of electricity purchased by the company is recognized in the profit and loss account by deducting the amount of subsidy from the related cost of electricity purchased on a systematic basis in the same period in which the electricity cost is incurred.



86

Mark-up bearing borrowings

Mark-up bearing borrowings are recognized initially at cost, less attributable transaction cost. Subsequent to initial recognition, markup bearing borrowings are stated at original cost less subsequent repayments, while the difference between the original recognized amounts (as reduced by periodic payments) and redemption value is recognized in the profit and loss account over the period of borrowing on effective rate basis. The borrowing cost on qualifying asset is included in the cost of

3.14 Financial Instruments

Financial Assets and liabilities are recognized in the financial statements when the company becomes a party to the contractual provisions of the instrument and assets and liabilities are stated at fair value or amortized cost as the case may be. The company derecognizes the financial assets and liabilities when it ceases to be a party to such contractual provisions of the instruments. Any gain or losses on de-recognition of financial assets and liabilities are included in income currently.

3.15 Trade and Other Payables

Liabilities for trade and other amounts payable are carried at amortized cost, which approximates the fair value of the consideration to be paid in future for goods and services received, whether or not billed to the company.

3.16 Trade debts and other receivables

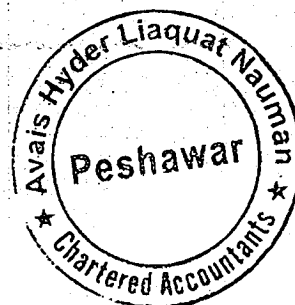
Trade debts and other receivables are stated initially at fair value and subsequently measured at amortized cost less provision for impairment, if any. A provision for impairment is established when there is an objective evidence that the company will not be able to collect all amounts due according to the original terms of receivable. Trade debts and receivables are written off when considered

3.17 Off setting of financial assets and liabilities

A financial asset and financial liability is offset and the net amount is reported in the Financial statement only when there is a legally enforceable right to set off the recognized amounts and the company intends either to settle on net basis or to realize the asset and settle the liability simultaneously.

3.18 Cash and cash equivalents

Cash and cash equivalents comprise cash in hand and bank balances. *ah*



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

4. ISSUED, SUBSCRIBED AND PAID UP SHARE CAPITAL

1,000 Ordinary shares of Rupees 10 each, issued as fully paid up in cash to President of Pakistan (through PEPCO) and its nominee directors

	2013 Rupees	2012 Rupees
	10,000	10,000
	<u>10,000</u>	<u>10,000</u>

5. DEPOSITS FOR ISSUE OF SHARE CAPITAL

Incorporation expenses incurred by WAPDA
Allocation of net worth transferred by WAPDA

	5,042,575	5,042,575
5.1	8,885,483,927	8,885,483,927
	8,890,526,502	8,890,526,502
5.2	7,620,265,187	7,620,265,187
5.3	1,571,234,102	1,571,234,102
	<u>18,082,025,791</u>	<u>18,082,025,791</u>

Adjustment of other loans and assets
Adjustment of net assets on transfer of FATA business to Tribal Area Electric Supply Company Limited (TESCO)

- 5.1 This represents net worth of the Company as on 01 July 1998 and subsequent adjustments/additions.
- 5.2 This represents adjustments of loan repayment and assets transferred, through current account maintained with WAPDA.
- 5.3 This represents net worth of FATA related business determined effective 01 July 2003, amounting to Rs. 1,670,284,895 net of reversal of employees' retirement benefits of Rs. 99,050,793 surrendered to WAPDA on incorporation of TESCO.
- 5.4 Effective 30 June 2008, closing has been notified by WAPDA. The Company is in the process of valuing its fixed assets and issuing shares. WAPDA has confirmed vide letter No 36-66/GMF(P)/MFHQ/B.K-40 to the Company to issue shares of Rs. 10 each equivalent to share deposit money of Rs. 18,082 million.

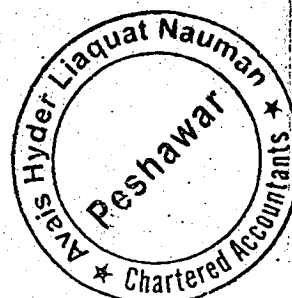
6. LONG TERM LOANS - secured

Loan from GoP ✓
Asian Development Bank - Trench I ✓
Asian Development Bank - Trench II ✓
Earthquake Reconstruction and Rehabilitation Authority
TFC Loan through PHPL

	2013 Rupees	2012 Rupees
6.1	125,284,795	125,284,795
6.2	1,978,127,173	1,888,413,101
6.3	642,754,975	8,269,780
6.4	807,238,366	766,217,071
6.5	39,472,181,602	-
	<u>43,025,586,911</u>	<u>2,788,184,747</u>
	(237,816,639)	(333,116,235)
	<u>42,787,770,272</u>	<u>2,455,068,512</u>

Current maturity

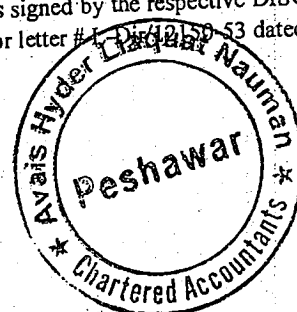
- 6.1 This loan has been advanced by the Government of Pakistan (GOP) for the restoration of Power Distribution Infrastructure and Electricity Consumption in earthquake affected areas. The loan is free of interest charges and currency fluctuations.



33

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

- 6.2 This represents relented portion of total term finance facility obtained by the Government of Pakistan (GoP) from Asian Development Bank (ADB) for power distribution and enhancement project. Out of total finance facility an amount of US \$ 36.60 million has been allocated to the Company vide letter dated 30 March 2009 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. Out of the total allocated facility, the Company has utilized US \$ 22.661 million (2012: US\$ 21.717 million) up to the year end.
- Ministry of Economic Affairs & Statistics (Economic Affairs Division) vide letter No. 6-16(7) DMR/GF/2011 dated 16 October 2012 has revised the terms and conditions of the loan. Under the revised terms, the loan is repayable in 24 semi-annual installments ending 15 August 2023 with first repayment due on 15 February 2011. Accordingly the principal amount which has fallen due and are due for repayment within 12 months of the reporting date have been transferred to current portion. Further, since the revised repayment terms require the repayment of principal in Pak Rupee, exchange difference arising on revaluation of this loan for the year has not been recognized.
- 6.3 This represents re-lent portion of total term finance facility obtained by the GOP from ADB for power distribution and enhancement project. Out of total finance facility an amount of US \$ 25.27 million has been allocated to the Company vide letter No. 1(3) ADB-II/06-A dated 31 March 2011 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. Out of total allocated facility, the Company has utilized US \$ 6.661 million (2012: 0.089 million) up to the year end. As per the letter dated 9th April 2011 of the Ministry of Economic Affairs & Statistics (Economic Affairs Division) the loan amount has been relented to the Company on the following terms:
- 15% p.a inclusive of interest rate of 8.2% plus exchange risk coverage (ERC) of 6.8% which shall be charged both on principal amount and interest amount separately.
 - repayment maximum period of 17 years excluding a grace period of 3 years.
 - all charges and fees including commitment charges etc. if any payable by the Government of Pakistan to the above foreign lender shall also be borne by the Company.
- However the repayment of the principal amount/ interest and recoveries due from the Company will be advised by the Debt Management Wing of the Economic Affairs Division.
- 6.4 This represents re-lent portion of total term finance facility obtained by the GoP from ADB for Earthquake Emergency Assistance Project. Out of total finance facility an amount of US \$ 11.00 million has been allocated to the Company vide letter dated 22 July 2008 of Ministry of Economic Affairs & Statistics (Economic Affairs Division) Government of Pakistan. As per the above said letter, the loan amount has been relented to the Company on the terms and conditions agreed between the GoP and ADB which are as follows:
- the facility carries interest at 1% per annum on the amount of the Loan withdrawn from the loan account and outstanding from time to time.
 - repayment maximum period of 40 years including a grace period of 10 years, repayment shall be made in 30 semi annual installments.
- However, the repayment of the principal amount/ interest and recoveries due from the Company will be advised by the Debt Management Wing of the Economic Affairs Division. The carrying amount include Rs. 193.33 million (2012: Rs. 152.41 million) in respect of foreign currency difference.
- 6.5 GoP through Power Holding Private Limited (PHPL) entered into a syndicated Term Finance Agreement on 22 February 2012 with syndicate of banks led by Habib Bank Limited for financing of Rs. 136 billion. The loan is for a period of five years with a grace period of two years and carries markup at the rate of three months' KIBOR+2% p.a. and secured by way of a guarantee by GoP, lien on collection account of electricity distribution companies (DISCOs) and assignment of receivables. Originally PHPL planned to re-lent the loan to DISCO's through multi-partite agreement between Lenders, DISCOs and PHPL with each DISCO jointly and severally liable in-case of default by any DISCOs. Management of DISCOs objected to this arrangement and based on observations by DISCOs the proposed mechanism of loan was revised in a joint meeting held at Ministry of Water and Power on 14 May 2012 whereby a bilateral agreement was proposed to be signed between each DISCO and PHPL with DISCOs severally liable. Board of Directors of the Company accorded its approval in its meeting held on 29 May 2012. In May 2012 CPPA issued an advise to the Company with the amount of Rs. 39.472 billion representing the facility allocated to the Company. The draft of the relending agreement between the Company and PHPL has been received. Subsequently, during a joint meeting held at LESCO Head Office on 27th August, 2012, it was agreed among DISCOs that the relending agreement will be effective from the date it is signed by the respective DISCOs and the same was communicated to Ministry of Water & Power vide LESCO Legal Director letter # 1-DP/12/53 dated August 28, 2012.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

7. STAFF RETIREMENT BENEFITS

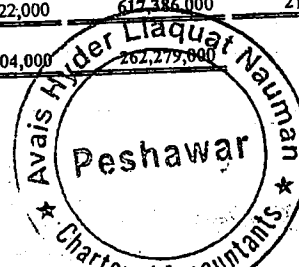
Four types of defined benefit plans are offered by the Company namely, pension, medical, free electricity and compensated absences.

	Pension obligations		Medical benefits		Free electricity		Compensated absences		Total	
	2013 Rupees	2012 Rupees	2013 Rupees	2012 Rupees	2013 Rupees	2012 Rupees	2013 Rupees	2012 Rupees	2013 Rupees	2012 Rupees
7.1 Reconciliation of payable to defined benefit plan:										
Present value of defined benefit obligation	10,134,718,879	14,944,181,465	591,833,268	430,413,268	1,319,090,625	1,609,803,626	794,610,000	794,610,000	12,840,252,772	17,779,008,359
Unrecognized actuarial losses/ (gains)	-	(6,595,862,586)	-	118,208,000	-	(551,598,000)	-	-	-	(7,029,252,586)
	10,134,718,879	8,348,318,879	591,833,268	548,621,268	1,319,090,625	1,058,205,626	794,610,000	794,610,000	12,840,252,772	10,749,755,773
7.2 Amount recognized in balance sheet is as follows:										
Net liability at beginning of the year	8,348,318,879	7,483,384,465	548,621,268	504,653,096	1,058,205,626	928,773,545	794,610,000	317,625,000	10,749,755,773	9,234,436,106
Charge for the year	2,833,531,000	1,733,432,414	57,511,000	53,553,172	306,056,646	160,943,181	-	499,272,487	3,197,098,646	2,447,201,254
Benefits paid during the year	(1,047,131,000)	(868,498,000)	(14,299,000)	(9,585,000)	(45,171,647)	(31,511,100)	-	(22,287,487)	(1,106,601,647)	(931,881,587)
	10,134,718,879	8,348,318,879	591,833,268	548,621,268	1,319,090,625	1,058,205,626	794,610,000	794,610,000	12,840,252,772	10,749,755,773
7.3 Salaries, wages and benefits include the following in respect of defined benefits plans:										
Current service cost	296,156,000	222,108,414	10,512,000	9,190,000	51,702,000	27,448,000	-	499,272,487	358,370,000	758,018,901
Interest cost	1,943,153,000	1,314,320,000	56,092,000	53,366,172	210,576,646	131,509,181	-	-	2,209,821,646	1,499,195,353
Actuarial losses recognized	594,222,000	197,004,000	(9,093,000)	(9,003,000)	43,778,000	1,986,000	-	-	628,907,000	189,987,000
	2,833,531,000	1,733,432,414	57,511,000	53,553,172	306,056,646	160,943,181	-	499,272,487	3,197,098,646	2,447,201,254

7.4 Five years data of present value of defined benefit obligations and experience adjustments therein is as follows:

	Present value of defined benefit obligations				Experience adjustment on obligation		
	Pension obligations Rupees	Medical benefits Rupees	Free electricity Rupees	Compensated absences Rupees	Pension obligations Rupees	Free electricity Rupees	Compensated absences Rupees
2013	10,134,718,879	591,833,268	1,319,090,625	794,610,000	6,001,640,586	(109,115,000)	507,820,000
2012	14,944,181,465	430,413,268	1,609,803,626	794,610,000	(7,703,148,586)	97,180,000	(663,156,000)
2011	6,573,103,000	474,622,000	819,201,000	317,625,000	-	-	-
2010	6,573,103,000	474,622,000	819,201,000	317,625,000	(2,539,887,000)	(128,576,000)	(27,967,000)
2009	4,936,996,000	470,422,000	617,386,000	210,952,000	-	-	-
	2,239,309,000	66,604,000	262,279,000	-	-	-	-

7.5 Expected expense for next year - 2014



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

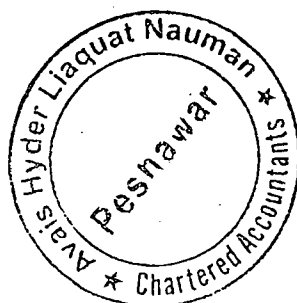
8. DEFERRED CREDIT	Note	2013 Rupees	2012 Rupees
Balance brought forward		19,641,355,008	15,986,377,493
Additions during the year		1,423,262,447	3,654,977,515
		<u>21,064,617,455</u>	<u>19,641,355,008</u>
Amortization			
- Balance brought forward		(4,863,461,385)	(4,176,013,960)
- For the year		(737,261,611)	(687,447,425)
		<u>(5,600,722,996)</u>	<u>(4,863,461,385)</u>
		<u>15,463,894,459</u>	<u>14,777,893,623</u>

9. TRADE AND OTHER PAYABLES

Creditors			
Associated undertakings - unsecured	9.1	196,962,525,548	199,411,044,400
Others		838,433,886	924,756,414
		<u>197,800,959,434</u>	<u>200,335,800,814</u>
Receipt against deposit work		8,131,715,193	6,280,530,689
Electricity duty payable		332,303,911	229,250,820
Withholding tax		110,103,014	138,632,735
TV License fee payable		81,695,844	76,296,254
Realized Neelum Jhelum surcharge		121,085,362	199,087,855
Realized equalization surcharge payable		966,018,092	331,302,490
GST payable		46,199,589	-
Employees shares in fund		1,548,047	-
Accrued liabilities		218,005,732	314,468,271
Retention money - contractors / suppliers		135,889,864	156,303,942
Capital contribution awaiting connections		375,845,080	421,111,716
Unrealized electricity duty		454,847,340	414,698,421
Unrealized income tax		193,555,648	169,421,019
Unrealized TV license fee		346,560,171	266,207,682
Unrealized Neelum Jhelum surcharge		552,440,131	430,920,060
Unrealized equalization surcharge payable		276,902,222	963,404,771
Unrealized general sales tax		1,357,830,875	1,357,852,095
Short term consumers' security deposits	9.4	1,896,512,260	1,734,911,695
Others		2,947,477	4,579,878
		<u>213,402,965,287</u>	<u>213,824,781,207</u>

9.1 Creditors - associated undertakings

Central Power Purchase Agency	196,405,728,166	198,862,505,096
Multan Electric Power Company Limited	465,691,054	466,423,998
Faisalabad Electric Supply Company Limited	44,375,202	36,919,441
Lahore Electric Supply Company Limited	3,022,443	4,185,971
Pakistan Electric Power Company Limited	39,262,020	41,009,894
CE (RE) Lahore	4,446,663	-
	<u>196,962,525,548</u>	<u>199,411,044,400</u>



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

9.2 TESCO currently does not hold the license to act as an electricity distribution company and therefore electricity utilized by TESCO from CPPA is supplied through network of the Company. This arrangement is in accordance with the directions of NEPRA and confirmed vide its letter no. NEPRA/TRF-45/7549 dated 21 November 2006 and ratified by NTDC vide its letter no. CEO/NTDC/PESCO 5317-20 dated 23 January 2007. Since electricity is primarily supplied by CPPA to the Company, the cost of electricity invoiced by CPPA to the Company is allocated on the basis of actual units transmitted to TESCO through the Company's network. Cost of electricity utilized and corresponding obligation towards CPPA is recorded by TESCO in its books of account which is evident from the latest available audited financial statements of TESCO. In-addition, payment against utilization of units is also made directly by TESCO to CPPA. Although CPPA raises invoices to the Company however since the Company only acts as a conduit and a facilitator under the arrangement and is neither liable to pay to CPPA or recover from TESCO, the Company has not recorded obligation towards CPPA against cost of electricity transmitted to TESCO and corresponding receivable from TESCO of Rs. 153 billion to appropriately reflect the economic substance of this arrangement.

9.3 These represent security deposits received from consumers at the time of electricity connection and are refundable / adjustable on disconnection of electricity supply.

	Note	2013 Rupees	2012 Rupees
10. ACCRUED MARKUP		457,205,312	-
Opening Balance			
For the year:			
Asian Development Bank - Trench I		147,869,982	454,108,029
Asian Development Bank - Trench II		47,957,154	101,723
Earthquake Reconstruction and Rehabilitation Authority		38,487,117	2,995,560
		234,314,253	457,205,312
		<u>691,519,565</u>	<u>457,205,312</u>

11. CONTINGENCIES AND COMMITMENTS

11.1 Income tax contingencies

11.1.1 Taxation Authorities amended the assessments of the Company for the tax years from 2003 to 2006 by creating a demand of Rs. 31.653 million on applicability of Section 113 of the Income Tax Ordinance, 2001 on receipts other than sale of electricity. The Company's appeal against the demand was decided in favor of RTO Peshawar by the Commissioner Income Tax / Wealth Tax (Appeals-II). The Company has filed an appeal against the order of Commissioner Income Tax / Wealth Tax (Appeals-II), which is pending adjudication at Appellate Tribunal Inland Revenue, Peshawar.

11.1.2 Taxation Authorities amended the assessment of the Company for the tax year 2007 on various issues by creating a demand of Rs. 3.9 million. The Company's appeal against the demand was decided in favor of RTO Peshawar by the Commissioner Income Tax / Wealth Tax (Appeals-II). The Company has filed an appeal against the order of Commissioner Income Tax / Wealth Tax (Appeals-II), which is pending adjudication at Appellate Tribunal Inland Revenue, Peshawar.

11.1.3 Taxation Authority has issued a notice for the recovery of tax deducted amounting to Rs. 12.08 million under section 235 of the Ordinance. The Company has appealed against the decision made in favor of RTO Peshawar by Deputy Commissioner Inland Revenue Enforcement and Compliance-XIX, Peshawar to the Commissioner Appeals which is pending.

11.2 Other contingencies

11.2.1 Inland letters of credit as at 30 June 2013 are of Rs. 913.468 million (2012: Rs. 1,624 million).

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

12. Property, plant and equipment

Operating fixed assets
Capital work in progress

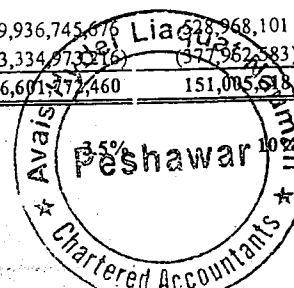
Note	2013 Rupees	2012 Rupees
12.1	29,730,322,814	28,249,165,466
12.2	10,171,499,564	6,882,440,642
	<u>39,901,822,378</u>	<u>35,131,606,108</u>

12.1 Statement of operating fixed assets as of 30 June 2013 is as follows:

	Freehold land	Leasehold land	Building	Distribution equipment	Vehicles	Computer and ancillary equipment	Furniture and fixtures	Other plant and equipment	Total
	RUPEES								
Cost	295,843,401	878,400	1,536,406,796	39,936,745,676	528,968,101	101,049,236	25,755,952	131,801,935	42,557,449,497
Accumulated depreciation	-	-	(391,830,298)	(13,334,973,214)	(377,962,583)	(69,471,504)	(21,850,396)	(112,196,035)	(14,308,284,030)
NBV as at 30 June 2012	295,843,401	878,400	1,144,576,498	26,601,772,462	151,005,518	31,577,732	3,905,556	19,605,900	28,249,165,467
Additions during the year	32,836,142	-	351,294,917	2,562,699,574	57,627,088	17,500,036	879,010	13,788,035	3,036,724,802
Depreciation charge for the year	-	-	(37,345,036)	(1,473,063,888)	(30,720,974)	(7,307,034)	(831,544)	(6,298,979)	(1,555,567,455)
Net book value As at 30 June 2013	328,679,543	878,400	1,458,526,379	27,691,408,148	177,911,632	41,870,734	3,953,022	27,094,956	29,730,322,814
Cost	328,679,543	878,400	1,887,701,713	42,499,445,250	586,595,189	118,649,272	26,634,962	145,589,970	45,594,174,299
Accumulated depreciation	-	-	(429,175,334)	(14,808,037,102)	(408,683,557)	(76,778,538)	(22,681,940)	(118,495,014)	(15,863,851,485)
Net book value As at 30 June 2013	328,679,543	878,400	1,458,526,379	27,691,408,148	177,911,632	41,870,734	3,953,022	27,094,956	29,730,322,814
Depreciation rate / number of years			2%	3.5%	10%	10%	10%	10%	

Statement of operating fixed assets as of 30 June 2012 is as follows:

	RUPEES								
Cost	294,515,142	878,400	1,503,912,923	33,916,152,688	418,401,159	85,995,794	25,083,955	125,056,057	36,369,996,118
Accumulated depreciation	-	-	(361,509,930)	(11,948,185,203)	(350,233,501)	(63,807,374)	(20,788,896)	(106,552,600)	(12,851,077,504)
NBV as at 30 June 2011	294,515,142	878,400	1,142,402,993	21,967,967,485	68,167,658	22,188,420	4,295,059	18,503,457	23,518,918,614
Additions during the year	1,328,259	-	32,493,873	6,020,592,988	110,566,942	15,053,442	671,997	6,745,878	6,187,453,379
Depreciation charge for the year	-	-	(30,320,368)	(1,386,788,013)	(27,729,082)	(5,664,130)	(1,061,501)	(5,643,433)	(1,457,206,527)
NBV as at 30 June 2012	1,328,259	-	1,144,576,498	(7,314,380,228)	(267,395,641)	(54,418,062)	(21,178,400)	12,860,024	(8,120,830,652)
Cost	295,843,401	878,400	1,536,406,796	39,936,745,676	528,968,101	101,049,236	25,755,952	131,801,935	42,557,449,497
Accumulated depreciation	-	-	(391,830,298)	(13,334,973,214)	(377,962,583)	(69,471,504)	(21,850,397)	(112,196,033)	(14,308,284,031)
NBV as at 30 June 2012	295,843,401	878,400	1,144,576,498	26,601,772,462	151,005,518	31,577,732	3,905,555	19,605,902	28,249,165,466
Depreciation rate / number of years			2%	3.5%	10%	10%	10%	10%	



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

12.1.1 The title of land and buildings amounting to Rs. 45.78 million and Rs. 72.34 million respectively transferred from associated undertakings is not in the name of the Company.

12.2 CAPITAL WORK IN PROGRESS

Civil works
Distribution equipment

Note	2013 Rupees	2012 Rupees
	124,403,375	349,884,428
	10,047,096,189	6,532,556,214
	10,171,499,564	6,882,440,642

12.2.1 This includes borrowing cost capitalized during the year amounting to Rs. 195.83 million (2012: Rs. 155.23 million).

13. LONG TERM LOANS - considered good

House building / purchase of plots
Vehicles

Current maturity of long term loans

Note	2013 Rupees	2012 Rupees
	165,128,800	195,653,738
	7,144,679	10,984,846
	172,273,479	206,638,584
	(46,013,633)	(45,307,532)
16	126,259,846	161,331,052

13.1 This represents long term loans made to employees. House building and plot loans are repayable in 10 years, car and motor-cycle loans in 5 years and bicycle loans in 5 years. Markup is charged on these loans at the same rate as that payable on employees balances in General Provident Fund. Loans are secured by mortgage of immovable property and hypothecation of vehicles. These loans have not been carried at their fair value pursuant to the requirements of IAS 39, "Financial Instruments: Recognition and Measurement", since the management believes that related financial impact will not be material.

14. STORES, SPARE PARTS AND LOOSE TOOLS

Stores

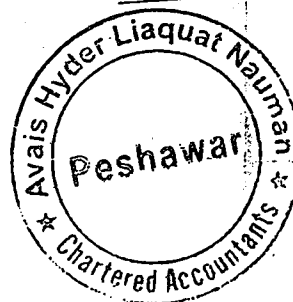
Note	2013 Rupees	2012 Rupees
	3,292,834,212	3,036,976,810
	3,292,834,212	3,036,976,810

15. TRADE DEBTS

Sale of electricity
Government levies and other charges
Secured and considered good
Considered doubtful

Provision for doubtful debts

Note	2013 Rupees	2012 Rupees
15.1 & 15.2	21,253,333,543	17,951,074,176
15.3	8,339,183,017	6,814,983,134
	29,592,516,560	24,766,057,310
	35,034,189,937	28,754,555,729
	64,626,706,497	53,520,613,039
	(35,034,189,937)	(28,754,555,729)
	29,592,516,560	24,766,057,310



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

- 15.1 Trade debts are secured to the extent of corresponding consumers' security deposits against electricity connection.
- 15.2 This includes Rs. 6.295 billion receivable from the Government of Azad Jammu and Kashmir (AJK) and represents the differential of the amount billed to AJK on tariff determined by National Electric Power Regulatory Authority (NEPRA) and tariff approved by the sub-committee constituted at the time of presentation given to Chief Executive of Pakistan in September 2002 on Raising of Mangla Dam. The tariff determined by the sub-committee was Rs. 2.32 per unit which was increased to Rs. 2.59 per unit subsequently. However the Company billed electricity supplied to AJK on the basis of tariff notified by GOP from time to time after determination by NEPRA. AJK has been settling its dues at tariff of Rs. 2.59/unit and contesting the applicability of tariff approved by NEPRA and notified by GOP by claiming that AJK does not fall under purview of NEPRA.

In spite of various efforts, the Company has not been able to recover the outstanding balance from AJK. However the management is pursuing the resolution of this matter on various forums and requested Ministry of Water and Power, GOP to convene meeting of all stake holders to resolve the issue. Total outstanding balance of Rs. 6,295 million comprises Rs. 4,108 million relating to previous years and Rs. 2,187 million recognized during the year against sale of electricity.

The management of the Company is however confident of favorable resolution of the matter and accordingly has not recognized impairment of Rs. 4,108 million against the receivable amount up to 30 June 2012 and has not adjusted receivable recognized during the year of Rs. 2,187 million against sale of electricity, which is the difference between tariff determined by sub-committee and notified by the GoP.

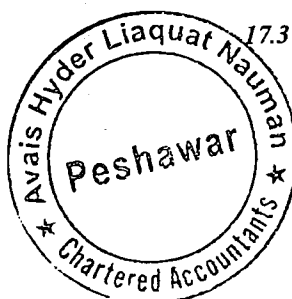
	Note	2013 Rupees	2012 Rupees
15.3 Trade debts - Government levies and other charges			
Electricity duty		454,847,340	414,698,421
Income tax receivable from customers		193,555,648	169,421,019
Sales tax		6,514,877,505	5,202,433,462
TV fee		346,560,171	266,207,682
Neelum Jhelum surcharge		552,440,131	430,920,060
Equalization surcharge		276,902,222	331,302,490
	15.3.1	<u>8,339,183,017</u>	<u>6,814,983,134</u>

- 15.3.1 Government levies and other charges recoverable from customers on behalf of the respective authorities from consumers and will be paid to respective authorities upon receipt of these dues from consumers except general sales tax which is paid on billing basis.

	Note	2013 Rupees	2012 Rupees
16. LOANS AND ADVANCES - considered good			
Current portion of long term loans - considered good	13	46,013,633	45,307,532
Advances to suppliers - considered good		371,327,157	310,271,396
Advances for expenses		4,020,170	5,865,775
		<u>421,360,961</u>	<u>361,444,703</u>

17. OTHER RECEIVABLES - considered good

Due from WAPDA and associated undertakings - net	17.1	27,864,890,927	26,620,824,226
Sales tax receivable - net	17.2	26,252,409,922	16,690,888,852
Current account		455,362,703	1,236,427,137
Pension receivable	17.3	1,532,330,284	1,136,454,089
Others		23,289,443	4,401,133
		<u>56,128,283,278</u>	<u>45,688,995,437</u>



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

		2013 Rupees	2012 Rupees
17.1 Due from WAPDA and associated undertakings	Note		
WAPDA		397,774,219	400,129,219
WAPDA Welfare Fund		80,007,410	78,436,882
National Transmission and Dispatch Company		428,600,040	413,100,500
Quetta Electric Supply Company Limited		14,571,798	9,413,257
Tribal Electric Supply Company Limited	17.1.1	26,807,004,573	25,609,934,168
Sukkur Electric Supply Company		218,761	56,776
Islamabad Electric Supply Company Limited		131,105,053	105,265,172
Gujranwala Electric Power Company Limited		466,551	353,476
Hyderabad Electric Supply Company Limited		1,821,185	1,635,079
Genco I, II, III, IV		3,321,337	2,499,697
	17.1.2	<u>27,864,890,927</u>	<u>26,620,824,226</u>

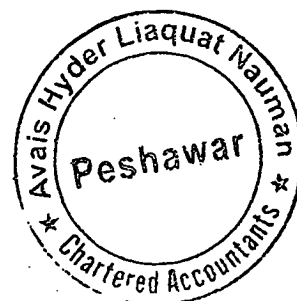
17.1.1 This represents receivable on account of wheeling charges, services provided and free electricity to TESCO employees. This includes Rs. 25,610 million relating to prior years. Due to shortage of funds, TESCO has not been able to repay the Company's dues. However, the management believes that since TESCO is a Government entity there is no likelihood of default by TESCO in paying its dues and further TESCO has confirmed the balance due to the Company. Further the Company has taken up the case with TESCO for early payment and has required TESCO to approach Ministry of Water and Power to settle the Company's dues.

17.1.2 Due from WAPDA and associated undertakings are unsecured and do not carry interest.

17.2 Sales tax receivable - net

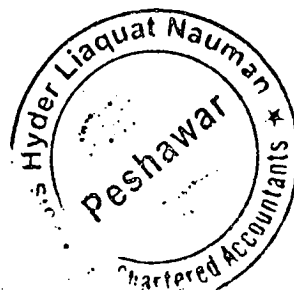
17.2.1 This represents amounts receivable from taxation authorities in respect of carry forward of excess input tax paid over output tax. The management of the Company believes that excess amounts of input sales tax paid are refundable on a lump sum basis or through monthly claims in the Company's sales tax returns.

17.2.2 Regional Tax Office (RTO), Peshawar has issued a show cause notice in relation to audit proceeding against the Company for the period from May 2008 to March 2009 by raising a sales tax demand on different issues aggregating to Rs. 3.38 billion. The company contested the show cause notice, consequent to which Additional Collector reduced the liability from Rs.3,383.92 million to 2,462.63 million and decided the case in favor of RTO Peshawar. The Company contested the decision of Additional Collector by filing an appeal with the Commissioner (Appeals) Inland Revenue Peshawar whose decision was in favor of the Company. Against the decision of Commissioner (Appeals) Inland Revenue, tax authorities filed an appeal which is pending adjudication. The Company also lodged a complaint with Federal Tax Ombudsman against the orders of Additional Collector RTC Peshawar, who decided the case in favor of the Company declaring that the case was based on discrimination. Federal Board of Revenue has filed appeal against the order of Federal Tax Ombudsman with President of Pakistan. The Company also has made a representation on the comments filed before President of Pakistan. Since the matter has been decided in the Company's favor in various appellate forums and by Federal Tax Ombudsman management of the Company believes that ultimate decision will be in favor of the Company and accordingly provision has not been made in the financial statements against amounts demanded by the taxation authorities.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

- 17.2.3 Regional Tax Office (RTO), Peshawar has issued a show cause notice in relation to audit proceeding against the Company for the period from April 2009 to April 2010 by raising a sales tax demand on different issues aggregating to Rs. 13.28 billion. The Company contested this show cause notice and consequent to which Assistant Commissioner reduced the liability from Rs. 13.28 billion to 7.85 billion by deciding the case in favor of RTO Peshawar. The Company contested the decision of Assistant Commissioner by filing an appeal with the Commissioner (Appeals) Inland Revenue, Peshawar who decided major issues of the case in favor of the Company by reducing the Company's liability from Rs. 7.85 billion to Rs. 602.5 million. Against the decision of Commissioner (Appeals) Inland Revenue, tax authorities also filed an appeal which is pending adjudication. Further, the Company also filed an appeal with Applet Tribunal Inland Revenue against the amount of Rs. 602.5 million not waived off. The Company has also lodged a complaint with Federal Tax Ombudsman against the orders of Assistant Commission RTO Peshawar, who decided the case in favor of the Company declaring that the case was based on discrimination. Federal Board of Revenue has filed appeal against the order of Federal Tax Ombudsman with President of Pakistan. The Company also has made a representation on the comments filed before President of Pakistan. Management of the Company believes that it has strong arguments against residual demand of Rs. 602.5 million and is confident that the matter will ultimately be decided in the favor of the Company and accordingly, provision has not been made in the financial statements against the amounts demanded by the taxation authorities.
- 17.2.4 Regional Tax Office (RTO), Peshawar had also issued three show cause notices to the Company on the issue of adjustment of sales tax collected from steel melter consumers against the accumulated credit sales tax balance of the Company, for the period from May 2008 to December 2010, January 2011 to June 2011 and July 2011 to December 2011 in which sales tax demands of Rs. 1.6 billion, Rs. 314 million and Rs. 344 million respectively were raised. The Company contested these show cause notices, however Deputy Commissioner decided the matter of demands of Rs. 1.6 billion, Rs. 344 million and Rs. 314 million in favor of RTO Peshawar. The Company filed appeal against the order of Deputy Commissioner with the Commissioner (Appeals) Inland Revenue, Peshawar who also decided the matter of Rs. 1.6 billion and Rs. 314 million in favor of RTO Peshawar, however matter of Rs. 344 million is still pending adjudication. RTO Peshawar has issued notices for recovery of these demands however the Company obtained stay order from Honorable Peshawar High Court, Peshawar and interim relief was granted. The management of the Company believes that since this is an industry wide issue and relates only to mode of adjustment of input tax, the ultimate outcome of the matter will not adversely affect the Company. Accordingly, provision has not been made in the financial statements against these demands.
- 17.2.5 A show cause notice has been issued to the company by RTO for recovery of Rs. 464 Million of adjustment in output tax collected from Steel Melter against the credit sale tax balance of the company for the period from January 2012 to June 2012 in which sale tax demands of Rs. 464 million was raised. The CIR decided the case against the Company. The company has appealed in ATIR, Peshawar against the decision of CIR, Peshawar. The Company believes that since this is an industry wide issue and relates only to mode of adjustment of input tax, therefore the outcome of the appeal will not adversely affect the Company. Accordingly, no provision has been made in the financial statements against the demands.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

	Notes	2013 Rupees	2012 Rupees
17.3 Receivable from associated undertakings on account of pension - unsecured, considered good			
WAPDA		1,224,531,962	840,858,759
Islamabad Electric Supply Company Limited		120,496,762	140,810,151
Pakistan Electric Power Company Limited		10,053,235	1,027,729
National Transmission and Dispatch Company Limited		98,110,273	74,521,821
Gujranwala Electric Power Company Limited		10,225,259	8,443,184
Faisalabad Electric Supply Company Limited		12,048,286	18,145,622
Lahore Electric Supply Company Limited		13,616,714	11,449,817
Multan Electric Power Company Limited		8,162,719	9,107,613
Hyderabad Electric Supply Company Limited		15,303,829	11,174,117
Quetta Electric Supply Company Limited		6,282,303	4,574,937
Tribal Area Electric Supply Company Limited		7,750,503	11,517,128
Genco I,II,III & IV		5,596,059	4,794,811
Karachi Electric Supply Company Limited		-	28,400
Sukkar Electric Power Company		13,652	-
Regional Representative Karachi		129,008	-
Power Information Technology Company		9,720	-
		<u>1,532,330,284</u>	<u>1,136,454,089</u>

18. RECEIVABLE FROM GOVERNMENT (Ministry of Finance)

This represents subsidy receivable from Ministry of Finance on account of tariff differential. Movement in this account during the year is as follows:

	Note	2013 Rupees	2012 Rupees
Opening balance as at 1 July		23,367,369,674	13,628,551,368
Tariff differential subsidy recognized during the year		36,825,685,625	25,225,433,818
Credit note received during the year from CPPA and adjusted against its payable balance		(44,093,337,000)	(15,486,615,512)
Closing balance as at 30 June	18.1	<u>16,099,718,299</u>	<u>23,367,369,674</u>

- 18.1** This includes subsidy claims withheld by Ministry of Water and Power (MOW&P) relating to years ending 30 June 2011 and 30 June 2012 aggregating to Rs. 1,102.67 million and Rs. 899.71 million respectively on account of distribution losses. MOWP has required the Company to provide justification for these claims. The management has provided justification and submitted the claims to MOW&P for verification and consequent acceptance. The management believes that the claims are legitimate and therefore remains hopeful of recoverability of these amounts.

	Note	2013 Rupees	2012 Rupees
19. CASH AND BANK BALANCES			
Cash in hand		1,676	789
Cash with banks in:			
Deposit accounts		4,172,276	378,156,913
Current accounts		625,244,485	1,487,416,169
		<u>629,418,437</u>	<u>1,865,573,871</u>

- 19.1** These carries interest rate 5 % to 9.70 % (2012: 5 % to 11.5%) per annum.

- 19.2** These include an amount of Rs. 264.79 million (2012: Rs. 837.59 million) kept in separate bank accounts relating to customers' and employees' security deposits.

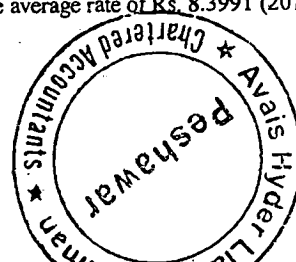
20. SALE OF ELECTRICITY

Sale of power to public and private consumers

<u>60,151,514,350</u>	<u>53,293,073,237</u>

- 20.1** This is net of sales tax amounting to Rs. 13,185 million (2012: Rs. 7,322 million).

- 20.2** Electricity Sold, total units 7,161.65 million (2012: 7,061.53 million) at the average rate of Rs. 8.3991 (2012: Rs. 7.5469) per unit.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

Notes	2013 Rupees	2012 Rupees
17.3 Receivable from associated undertakings on account of pension - unsecured, considered good	1,224,531,962	840,858,759
WAPDA	120,496,762	140,810,151
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Genco I,II,III & IV	-	28,400
Karachi Electric Supply Company Limited	13,652	-
Sukkar Electric Power Company	129,008	-
Regional Representative Karachi	9,720	-
Power Information Technology Company	1,532,330,284	1,136,454,089

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Note	2013 Rupees	2012 Rupees
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Tariff differential subsidy recognized during the year	36,825,685,625	25,225,433,818
Credit note received during the year from	(44,093,337,000)	(15,486,615,512)
CPPA and adjusted against its payable balance	16,099,718,299	23,367,369,674
Closing balance as at 30 June	18.1	

- 18.1 This includes subsidy claims withheld by Ministry of Water and Power (MOW&P) relating to years ending 30 June 2011 and 30 June 2012 aggregating to Rs. 1,102.67 million and Rs. 899.71 million respectively on account of distribution losses. MOWP has required the Company to provide justification for these claims. The management has provided justification and submitted the claims to MOW&P for verification and consequent acceptance. The management believes that the claims are legitimate and therefore remains hopeful of recoverability of these amounts.

19. CASH AND BANK BALANCES

Cash in hand

Cash with banks in:

Deposit accounts

Current accounts

Note	2013 Rupees	2012 Rupees
	1,676	789
	4,172,276	378,156,913
	625,244,485	1,487,416,169
	629,418,437	1,865,573,871

- 19.1 These carries interest rate 5 % to 9.70 % (2012: 5 % to 11.5%) per annum.

- 19.2 These include an amount of Rs. 264.79 million (2012: Rs. 837.59 million) kept in separate bank accounts relating to customers' and employees' security deposits.

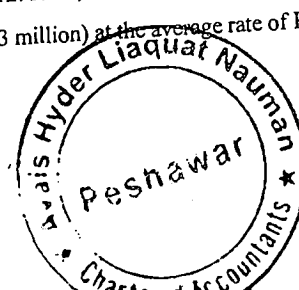
20. SALE OF ELECTRICITY

Sale of power to public and private consumers.

- 20.1 This is net of sales tax amounting to Rs. 13,185 million (2012: Rs. 7,322 million).

- 20.2 Electricity Sold, total units 7,161.65 million (2012: 7,061.53 million) at the average rate of Rs. 8.3991 (2012: Rs. 7.5469) per unit.

2013 Rupees	2012 Rupees
60,151,514,350	53,293,073,237



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

	Note	2013 Rupees	2012 Rupees
21. RENTAL AND SERVICE INCOME			
Meter / service rent		57,315,908	89,010,178
Reconnection fees		979,965	924,709
		<u>58,295,873</u>	<u>89,934,887</u>

22. COST OF ELECTRICITY

Central Power Purchase Agency	107,936,472,688	106,084,196,331
System charges	-	389,417,481
	<u>107,936,472,688</u>	<u>106,473,613,812</u>

22.1 Electricity purchases during the year have been invoiced by CPPA, units 12,538 million (2012: 13,137 million) at the average rate of Rs. 9.98 per KWH (2012: Rs. 9.70 per KWH) in which, 1,643.142 million (2012: 2,083 million) units of electricity purchased by TESCO amounting to Rs. 16,949.015 million (2012: 20,846 million) has also been invoiced by CPPA to the Company, which has been excluded from the above cost and the corresponding liability has been transferred to TESCO. The difference in total units received and the total units billed has been fully adjusted in the above cost.

22.2 Tariff charged by Central Power Purchase Agency was determined by National Electric Power Regulatory Authority (NEPRA) and notified by the Government of Pakistan in the Gazette of Pakistan effective from 30 September 2011.

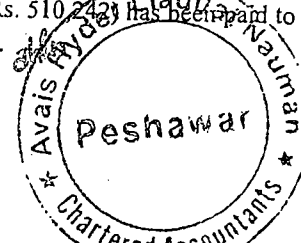
	Note	2013 Rupees	2012 Rupees
23. OTHER OPERATING COST EXCLUDING DEPRECIATION			
Salaries, wages and other benefits		10,108,089,843	7,949,888,925
Repairs and maintenance		520,541,776	480,217,789
Rent, rates and taxes		58,612,819	66,219,070
Power, light and water		30,997,647	24,128,865
Postage and telephone		17,667,976	16,339,822
Office supplies and other expenses		54,932,159	53,398,326
Travelling and transportation		287,513,304	249,667,427
Insurance expense		12,036,645	5,306,000
Electricity bill collection charges		152,578,022	142,778,022
Legal and professional charges		12,093,332	15,766,271
Management fees and charges	23.1	24,661,359	18,640,626
Auditor's remuneration		895,000	800,000
NEPRA fee and charges		14,630,929	12,928,082
Advertisement and publicity		2,346,692	179,765,100
Provision for doubtful debts		6,316,489,802	15,276,391,887
Overheads charged by CPPA		-	87,291,717
Write-off long term advance		1,546,597	-
Miscellaneous expenses		15,327,357	10,972,309
		<u>17,630,961,257</u>	<u>24,590,500,238</u>

23.1 Management fee and other charges are charged / allocated to the Company by WAPDA on the basis of mutual understanding between the Company and WAPDA.

Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

24. OTHER INCOME	Note	2013 Rupees	2012 Rupees
Profit on bank deposits		92,123,337	175,165,878
Sale of scrap		32,733,618	53,649,464
Late payment surcharge		1,386,009,048	1,074,496,535
Wheeling charges from TESCO	24.1	1,157,100,295	1,323,554,129
Liabilities written back	24.2	-	3,635,152,256
Miscellaneous		557,187,479	436,313,102
		<u>3,225,153,777</u>	<u>6,698,331,364</u>
24.1 This represent the amount charged to TESCO for the use of Company's transmission system/lines for electricity purchased from CPPA.			
24.2 This represent reversal of system charges of MEPCO and FESCO amounting to Rs. 1,832 million and Rs. 1,803 million respectively relating to period from January 2006 to June 2010. NEPRA in its tariff determination of the Company for the year 2011-2012 has declared that MEPCO and FESCO cannot claim these costs from the Company as these charges to the extent from January 2006 to June 2010 are time barred. Since these costs are no more payable to MEPCO and FESCO, these have been reversed in these financial statements.			
25. FINANCIAL (INCOME)/ EXPENSES	Note	2013 Rupees	2012 Rupees
Mark up on TFC PHPL Loan		4,825,836,369	-
Mark up on ADB-ERRA		38,487,117	-
Bank charges		12,845,323	16,491,509
Exchange difference - net		41,021,295	(13,278,100)
		<u>4,918,190,104</u>	<u>3,213,409</u>
26. TAXATION			
Income tax	26.1	-	-
26.1 Relationship between current tax and accounting profit			
Accounting loss before taxation		(31,043,280,008)	(46,530,313,255)
Applicable tax rate		35%	35%
Tax on accounting loss		(10,865,148,003)	(16,285,609,639)
Tax effect of permanent differences		(12,888,990,060)	(8,828,901,836)
Deferred tax asset not recognized		23,754,138,063	25,114,511,475
		-	-
27. CHIEF EXECUTIVE'S REMUNERATION			
Managerial remuneration- Lumpsum package @ Rs. 550,000/month		6,600,000	989,250
Utility allowance		-	133,748
Other allowance		-	998,693
		<u>6,600,000</u>	<u>2,121,691</u>

In addition, Chief Executive is also provided with free transport, accommodation, residential telephone and medical facilities. Further, meeting fee amounting to Rs. 275,000 (2012: Rs. 510,242) has been paid to the directors for attending meetings of the Board of Directors of the Company.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

28. Financial risk management

The Company has exposure to the following risks from its use of financial instruments:

- Credit risk
- Liquidity risk
- Market risk

This note presents information about the company's exposure to each of the above risks, the Company's objectives policies and processes for measuring and managing risk and management of capital. Further quantitative disclosures are included throughout these financial statements.

Risk management framework

The Board of Directors has overall responsibility for the establishment and oversight of the Company's risk management framework. The Board is responsible for developing and monitoring the Company's risk management policies.

The Company's risk management policies are established to identify and analyze the risks faced by the Company, to set appropriate risk limits and controls, and to monitor risks and adherence to limits. Risk management policies and systems are reviewed regularly to reflect changes in market conditions and the Company's activities. The Company, through its training and management standards and procedures, aims to develop a disciplined and constructive control environment in which all employees understand their roles and obligations.

The Company's Board oversees how management monitors compliance with the company's risk management policies and procedures and reviews the adequacy of the risk management framework in relation to the risks faced by the Company. The Board is assisted in its oversight role by Internal Audit. Internal Audit undertakes both regular and ad hoc reviews of risk management controls and procedures, the results of which are reported to the Board.

28.1 Credit risk

Credit risk is the risk of financial loss to the Company if a consumer or counterparty to a financial instrument fails to meet its contractual obligations. The Company is exposed to credit risk to the extent of loans, deposits and advances, trade debts, interest accrued, other receivables and bank balances. The Company deals with regular and permanent consumers who normally make payments on time. The Company controls its credit risk by continuous monitoring of its receivables. The management believes that there is no credit risk involved in respect of receivables from the Government of Pakistan.

28.1.1 Exposure to credit risk

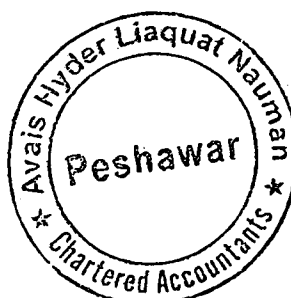
The carrying amount of financial assets represents the maximum credit exposure. The maximum exposure to credit risk at the reporting date is as follows:

	2013 Rupees	2012 Rupees
Loans, deposits and advances	547,620,807	522,775,755
Trade debts	29,592,516,560	24,766,057,310
Interest accrued	5,676,717	35,417,400
Other receivables	29,420,510,654	27,761,679,448
Bank balances	629,416,761	1,865,573,082
	<u>60,195,741,499</u>	<u>54,951,502,995</u>

Geographically there is no concentration of credit risk as the company operates in the same geographical area.

28.1.1.1 The maximum exposure to credit risk for trade receivables at the reporting date by type of sector is as follows:

	2013 Rupees	2012 Rupees
Government sector	8,339,183,017	6,550,272,336
Private sector	21,253,333,543	18,215,784,974
	<u>29,592,516,560</u>	<u>24,766,057,310</u>



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

28.1.1.2 The maximum exposure to credit risk for trade receivables at the reporting date by type of product was:

	2013 Rupees	2012 Rupees
Electricity consumers	29,592,516,560	24,766,057,310

Electricity consumers

Trade debts are secured to the extent of corresponding consumers' security deposits against electricity connection. Loans to employees are secured against mortgage of house / plot and hypothecation on vehicles for which loans were sanctioned. The Company has arrangements with all the financial institutions for collection of bills from consumers. The Company has issued standing instructions to all these financial institutions to transfer funds in the main account. At the end of the day the Company has funds lying in the bank accounts of financial institutions with high credit ratings. The Company assesses the credit quality of the counter parties as satisfactory. The Company does not hold any collateral as security against any of its financial assets other than trade debts and loan to employees.

28.1.2 Impairment losses

The aging of trade receivables at the reporting date was:

	Gross 2013 - Rupees	Impairment 2013 - Rupees	Gross 2012 - Rupees	Impairment 2012 - Rupees
Not past due	4,570,263,966	-	4,472,609,889	-
Past due up to 1 year	5,372,322,006	89,244,428	5,275,409,739	310,283,610
Past due between:				
- 1 to 3 years	8,788,323,591	643,952,794	7,359,746,060	616,965,177
Over 3 years	45,895,796,934	34,300,992,715	36,412,847,351	27,827,306,942
	64,626,706,497	35,034,189,937	53,520,613,039	28,754,555,729

28.1.2.1 The movement in the allowance for impairment in respect of trade debts during the year was as follows:

	2013 Rupees	2012 Rupees
Balance at 1 July	28,754,555,729	13,481,707,49
Provision charge	6,316,489,802	15,276,391,88
Trade debts written off	(36,855,594)	(3,543,65)
Balance at 30 June	35,034,189,937	28,754,555,72

28.1.3 Allowances for impairment

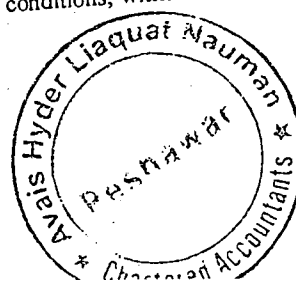
Based on past experience, the management believes that no impairment allowance is necessary in respect of trade debts against which impairment allowance has not been created. Trade debts are due from regular and permanent customers: mainly include government agencies and the Company does not expect these customers to fail to meet their obligations.

28.1.4 Write-off policy

The allowance account in respect of trade debts is used to record impairment losses unless the Company is satisfied the recovery of the amount owing is possible. At that point the amount considered irrecoverable is written off against financial asset directly.

28.2 Liquidity risk

Liquidity risk is the risk that the Company will not be able to meet its financial obligations as they fall due. Company's approach to managing liquidity is to ensure, as far as possible, that it will always have sufficient liquid meet its liabilities when due, under both normal and stressed conditions, without incurring unacceptable losses or ri damage to the Company's reputation.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

28.2.1 The maturity profile of the Company's financial liabilities based on the contractual amounts is as follows:

	Long term loans including markup		Trade and other payables	
	Carrying amount	Contractual cash flows	Carrying amount	Contractual cash flows
2013 - Rupees				
Maturity up to one year	929,336,204	1,087,880,630	211,935,031,398	(211,935,031,398)
Maturity between:				
- 1 to 2 years	158,544,426	434,808,088	-	-
- 2 to 3 years	158,544,426	407,855,535	-	-
- 3 to 4 years	158,544,426	380,902,982	-	-
- 4 to 5 years	158,544,426	353,950,430	-	-
Maturity over five years	2,590,602,487	2,512,077,333	-	-
	<u>4,154,116,395</u>	<u>5,177,474,998</u>	<u>211,935,031,398</u>	<u>(211,935,031,398)</u>
2012 - Rupees				
Maturity up to one year	790,321,547	1,012,096,468	212,328,296,377	(212,328,296,377)
Maturity between:				
- 1 to 2 years	148,123,511	426,500,130	-	-
- 2 to 3 years	148,123,511	400,062,565	-	-
- 3 to 4 years	148,123,511	373,625,000	-	-
- 4 to 5 years	148,123,511	347,187,435	-	-
Maturity over five years	1,862,574,468	2,512,077,333	-	-
	<u>3,245,390,059</u>	<u>5,071,548,931</u>	<u>212,328,296,377</u>	<u>(212,328,296,377)</u>

28.2.2 The contractual cash flows relating to the loan related financial liabilities have been determined on the basis of mark-up rates effective as at 30 June. The rates of mark-up have been disclosed in note 6 to these financial statements.

28.3 Market risk

Market risk is the risk that changes in market prices, such as foreign exchange rates, interest rates and equity prices will affect the company's income or the value of its holdings of financial instruments. The objective of market risk management is to manage and control market risk exposures within acceptable parameters, while optimizing the return. The Company is exposed to currency risk and interest rate risk only.

28.3.1 Exposure to currency risk

The Company is not exposed to any currency risk

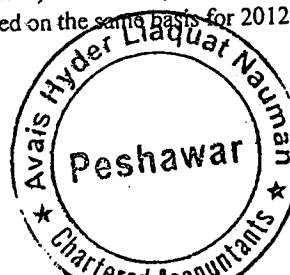
	2013		2012	
	Rupees	US Dollars	Rupees	US Dollars
Long term loans	807,238,366	8,103,932	766,217,071	8,103,932
Accrued mark-up	38,487,117	422,935	2,995,559	31,683
Total exposure	<u>845,725,483</u>	<u>8,526,867</u>	<u>769,212,630</u>	<u>8,135,615</u>

The following significant exchange rates applied during the year:

	Average rates		Balance sheet date rate	
	2013	2012	2013	2012
US Dollars	97.09	90.50	99.61	94.57

28.3.1.1 Sensitivity analysis

A 10 percent strengthening of the Rupee against US Dollar at 30 June would have increased equity and profit and loss account before tax by Rs. 84.57 million (2012: Rs. 76.92 million). This analysis assumes that all other variables, in particular interest rates, remain constant. The analysis is performed on the same basis for 2012.



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

10 percent weakening of the Rupees against US Dollar at 30 June would have had the equal but opposite effect on the above currencies to the amounts shown above, on the basis that all other variables remain constant.

28.3.2 Interest rate risk

The interest rate risk is the risk that the fair value of future cash flows of a financial instrument will fluctuate because of changes in the market interest rates. Majority of the interest rate exposure arises from long term loans. At the balance sheet date, the interest rate profile of the Company's interest bearing financial instrument is:

	Carrying amount	
	2013 Rupees	2012 Rupees
Fixed rate instruments		
Financial assets		
Long term loans	172,273,479	206,638,584
Bank balances	4,172,276	378,156,913
	<u>176,445,755</u>	<u>584,795,497</u>
Financial liabilities		
Long term loans	<u>43,025,586,911</u>	<u>2,788,184,747</u>

The Company have no variable rate financial instruments.

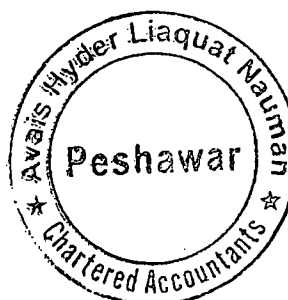
28.4 Capital management

The Company's objective when managing capital is to safeguard the Company's ability to continue as a going concern so that it can continue to provide returns to shareholders and benefits to other stakeholders and to maintain a strong capital base to support the sustained development of its businesses. The Company manages its capital structure which comprises capital and reserves by monitoring return on net assets and makes adjustments to it in the light of changes in economic conditions. In order to maintain or adjust the capital structure, the Company may adjust the amount of dividend to shareholders, appropriation of amounts to capital reserves or / and issue new shares.

28.5 Fair value of financial assets and liabilities

(i) The fair values of financial assets and liabilities, together with the carrying amounts shown in the balance sheet, are as follows:

	2013 - Rupees		2012 - Rupees	
	Carrying value	Fair value	Carrying value	Fair value
Financial assets				
Long term loans	126,259,846	126,259,846	161,331,052	161,331,052
Long term deposits	-	-	-	-
Trade debts	29,592,516,560	29,592,516,560	24,766,057,310	24,766,057,310
Loans and advances	421,360,961	421,360,961	361,444,703	361,444,703
Interest accrued	5,676,717	5,676,717	35,417,400	35,417,400
Other receivables	29,875,873,356	29,875,873,356	28,998,106,585	28,998,106,585
Bank balances	629,418,437	629,418,437	1,865,573,871	1,865,573,871
Financial liabilities				
Long term loans	43,025,586,911	43,025,586,911	2,788,184,747	2,788,184,747
Trade and other payables	211,935,031,398	211,935,031,398	212,328,296,377	212,328,296,377
Accrued markup	691,519,565	691,519,565	457,205,312	457,205,312



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

(ii) **Determination of fair values**

A number of the company's accounting policies and disclosures require the determination of fair value, for both financial and non - financial assets and liabilities. Fair values have been determined for measurement and / or disclosure purposes based on the following methods:

Non - derivative financial assets

The fair value of non derivative financial assets is estimated as the present value of future cash flows, discounted at the market rate of interest at the reporting date. This fair value is determined for disclosure purpose.

Non - derivative financial liabilities

Fair value, which is determined for disclosure purposes, is calculated based on the present value of future principal and interest cash flows, discounted at the market rate of interest at the reporting date.

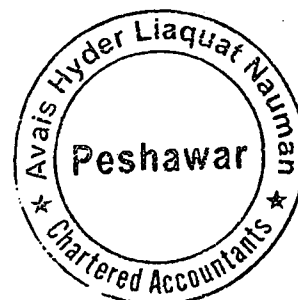
29. TRANSACTIONS WITH RELATED PARTIES

WAPDA holds 99.99% shares of the Company, therefore all electricity generation and distribution undertakings of WAPDA are related parties of the company. Other related parties comprise of associated companies, directors, key management personnel, Government of Pakistan and Government owned entities.

Transactions with Government of Pakistan and Government owned entities are not disclosed as the management is of the opinion that it is impracticable to disclose such transactions due to the nature of the Company's operations.

Balances with related parties have been disclosed in notes 6, 9, 17 and 18 to the financial statements. Transactions with electricity generation and distribution undertakings of WAPDA, other than remuneration and benefits to Chief Executive as disclosed in note 28 to the financial statements, are as follows:

	2013 Rupees	2012 Rupees
Free electricity supplied by the Company	75,487,748	58,060,485
Free electricity supplied to the Company	11,117,624	7,449,048
Services provided by the Company (mainly include cash remitted to CPPA)	53,273,835,987	45,373,931,994
Services provided to the Company	371,521,393	317,285,816
Electricity purchased by the Company	107,936,472,688	106,084,196,331
Management fee	24,661,359	18,640,626
Wheeling charges recognized as income	1,157,100,295	1,323,554,129
Relent loan received during the year	40,196,380,869	747,176,915
Markup expense during the year	234,314,253	271,077,254
Balance of accrued markup	691,519,565	457,205,312
Trade receivable balance from Government and related departments	8,339,183,017	6,550,272,336
Subsidy received during the year	44,093,337,000	15,486,615,512
Subsidy claimed during the year	36,825,685,625	25,225,433,818



Peshawar Electric Supply Company Limited
Notes to the Financial Statements
For the year ended 30 June 2013

30. **BENAZIR EMPLOYEE STOCK OPTION SCHEME**

On August 14, 2009, the Government of Pakistan (GOP) launched Benazir Employees' Stock Option Scheme (the Scheme) for employees of certain State Owned Enterprises (SOEs) and non-State Owned Enterprises, where GOP holds significant investments (non-SOEs). The scheme is applicable to permanent and contractual employees who were in employment of these entities on the date of launch of the scheme, subject to completion of five years vesting period by all contractual employees and by permanent employees in certain instances.

The Scheme provides for a cash payment to employees on retirement or termination based on the price of shares of respective entities. To administer this scheme, GOP shall transfer 12 % of its investments in such SOEs and non-SOEs to a Trust Fund to be created for this purpose by each of such entities. The eligible employees would be allotted units by each Trust Fund in proportion to their respective length of service and on retirement or termination such employees would be entitled to receive such amounts from Trust Funds in exchange for the surrendered units as would be determined based on market price for listed entities or breakup value for non-listed entities. The shares relating to the surrendered units would be transferred back to GOP.

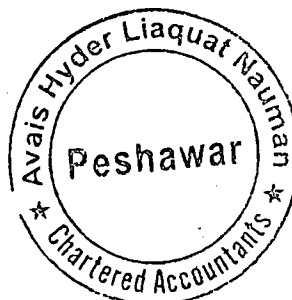
The Scheme also provides that 50% of dividend related to shares transferred to the respective Trust Fund would be distributed amongst the unit-holder employees. The balance 50% dividend would be transferred by the respective Trust Fund to the Central Revolving Fund managed by the Privatization Commission of Pakistan for payment to employees against surrendered units. The deficit, if any, in Trust Funds to meet the re-purchase commitment would be met by GOP.

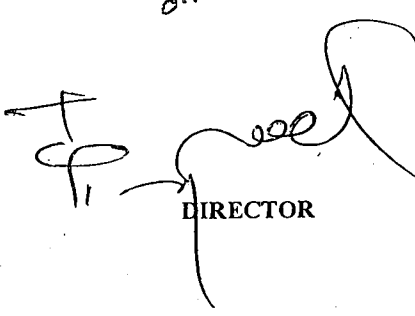
The IFRS 2 "Share Based Payments" will be implemented once the shares are issued against "deposits for shares"

31. **DATE OF APPROVAL**

These financial statements were approved by the Board of Directors in their meeting held on _____.


CHIEF EXECUTIVE




DIRECTOR

Category	Sales	Sale Mix	Applicable Rate		Billed Amount		Subsidy Amount	
			Fixed Charges	Variable Charges	Fixed Charges	Variable Charges	Fixed Charges	Variable Charges
	(MkWh)	(%age)	(Rs/kWh)	(Rs/kWh)	Rs. Min	Rs. Min	Rs. Min	Rs. Min
Residential - A1								
UPTO-50 Units per month	249	3.28		2.41	-	601	-	470
1-100	681	8.96		5.29	-	3,599	-	15,437
101-200	1,411	18.57		4.87	-	6,870	-	3,129
201-300	750	9.87		8.78	-	6,585	-	3,230
301-700 Units	680	8.95		14.48	-	9,843	-	1,106
ABOVE 700 Units	324	4.26		16.46	-	5,333	-	318
A-1b (03) T Peak	45	0.59		17.84	0	795	-	73
A-1b (03) T Off-Peak	157	2.07		12.11		1,901	-	289
Temp. domestic E-1 i (55)	0	0.00		16.76	-	3	-	1
TOTAL DOMESTIC	4,297	56.54			0	35,530	-	24,053
Commercial - A2								
Commercial Tariff (04)	231	3.03	-	18.07	(19)	4,167	-	363
A-2b (05)	12	0.16	400	16.63	21	199	-	16
A-2c(06) T Peak	79	1.03	395	15.31	704	1,202	-	126
A-2c (06) T Off-Peak	329	4.33		13.28		4,365	-	517
Temp. coml E-1ii (56)	4	0.05		16.87	-	65	-	9
TOTAL COMMERCIAL	654	8.80			705	9,998	-	1,031
Industrial								
B-1 (07)	28	0.37	-	14.48	-	413	-	43
B-1b (09) T Peak	30	0.39		13.89		411	-	45
B-1b (09) T Off Peak	145	1.91		12.83		1,865	-	225
B-2a(10)	6	0.09	399	15.17	13	98	-	10
B-2b(12) T Peak	67	0.88	398	14.14	929	951	-	99
B-2b(12) T Off Peak	428	5.64		13.12		5,617	-	662
B-3(14) T Peak	61	0.80	381	13.81	794	838	-	82
B-3(14) T Off Peak	699	9.20		12.39		8,661	-	1,015
B-4(17) T Peak	64	0.84	360	14.09	471	900	-	93
B-4(17) T Off Peak	491	6.46		12.99		6,377	-	736
E-2(58) Temp	0	0.00		-		-	-	0
TOTAL INDUSTRIAL	2,020	26.58			2,210	26,130	-	3,009
Bulk Supply								
C-1a (19)	0	0.00	-	70.93	(19)	24	-	1
C-1b (25)	50	0.66	400	13.88	47	698	-	68
C-1c (26) T Peak	17	0.22	379	12.37	73	208	-	22
C-1c (26) T Off Peak	43	0.57		14.60		633	-	74
C-2a (28)	30	0.39	380	14.48	38	432	-	41
C-2b (29) T Peak	22	0.29	324	12.12	99	269	-	29
C-2b (29) T Off Peak	85	1.12		13.84		1,183	-	149
C-3b (38) T Peak	4	0.05	360	9.30	23	34	-	4
C-3b (38) T Off Peak	12	0.16		14.62		177	-	24
TOTAL BULK SUPPLY	264	3.47			260	3,659	-	411
Agricultural T-Wells - Tariff D								
D-1a (46)	6	0.07	-	15.50	-	88	-	17
D-1b (45) T Peak	1	0.01	-	12.18	1	9	-	2
D-1b (45) T Off-Peak	5	0.06	-	12.12	7	57	-	18
D-2 (49,52)	23	0.31	-	13.14	42	309	22	107
D-2 (47,48) T Peak	11	0.15	0	25.32	0	285	0	104
D-2 (47,48) T Off-Peak	47	0.62		8.99		421	94	164
TOTAL AGRICULTURAL TWELL	93	1.22			51	1,166	116	411
Public Light PVT G (72,73)	14	0.19	-	12.46	0	177	-	4
Residential colonies H (76,79)	2	0.03	-	14.85	-	35	-	-
AJK Tariff K-1 (35)	1	0.01			2	21	-	2
AJK Tariff K-1 (36) T Peak	35	0.46	362	15.91	281	559	-	62
AJK Tariff K-1 (36) T Off Peak	219	2.89		12.72		2,792	-	314
Total AJK	255	3.36			283	3,372	-	378
Company Total	7,599	100			3,695	80,070	116	29,297

PESHAWAR ELECTRIC POWER COMPANY

Direct Input of Proposed Tariff

ANNEX - A

Back to Index

FY 2015

TARIFF CATEGORIES		Sales kWh	Monthly Billing Demand (MW)	CoS Rates		Proposed Tariff		Revenue on Proposed Tariff (PKR)	Adjusted * Cost of Service (PKR)	Cross Subsidy - (Under) / Over Recovery (PKR)	Over/ (Under) Recover
				Fixed Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)	Fixed * Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)				
A1 (a)	Residential - A1										
i	Up to 50 Units	263,248,740		2,530	10.51		4.47	1,176,721,868	4,649,784,276	(3,473,062,408)	25%
ii	01-100 Units	719,086,202		2,530	10.51		13.98	10,052,825,103	12,701,279,085	(2,648,453,982)	79%
iii	101-300 Units	2,282,045,695		2,530	10.51		18.45	42,096,896,940	40,307,961,941	1,788,934,999	104%
iv	301-700 Units	718,132,936		2,530	10.51		20.02	14,377,021,374	12,684,441,466	1,692,579,908	113%
v	Above 700 Units	342,100,577		2,530	10.51		21.25	7,269,637,267	6,042,550,803	1,227,086,464	120%
A1 (b)	Time of Use (TOU) - Peak	47,063,101		2,473	10.29		21.25	1,000,090,903	3,957,133,691	(492,127,828)	88%
	Time of Use (TOU) - Off-Peak	165,764,288			10.29		14.87	2,464,914,960			
	Total Residential - A1	4,537,441,539	-					78,438,108,416	80,343,151,262	(1,905,042,846)	98%
A2	Commercial - A2										
A2 (a)	Commercial - For peak load requirement up to 5 kW	243,543,168		2,530	10.51		21.25	5,175,292,327	4,301,723,134	873,569,193	120%
A2 (b)	Regular	12,628,579	35.21	2,473	10.29	400	16.77	380,781,268	234,805,187	145,976,081	162%
A2 (c)	Time of Use (TOU) - Peak	82,937,245	157.50	2,473	10.29	400	21.25	2,518,416,447	7,996,217,868	(316,051,263)	96%
	Time of Use (TOU) - Off-Peak	347,125,095			10.29		14.87	5,161,750,158			
	Total Commercial - A2	686,234,086	192.71					13,236,240,200	12,532,746,189	703,494,010	106%
B1	Industrial B										
B1 (a)	B1	30,086,335	-	2,530	10.51		16.21	487,699,484	531,417,417	(43,717,934)	92%
B1 (b)	B1 - TOU (Peak)	31,250,118	-	2,473	10.29		21.25	664,065,011	3,436,317,897	(488,724,668)	86%
	B1 - TOU (Off-peak)	153,566,121			10.29		14.87	2,283,528,218			
B2 (a)	B2	6,852,339	74.79	2,473	10.29	400	15.65	466,239,104	127,406,634	338,832,470	366%
B2 (b)	B2 - TOU (Peak)	70,989,550	156.46	2,473	10.29	400	21.25	2,259,527,936	9,728,659,886	(843,682,660)	91%
	B2 - TOU (Off-peak)	452,249,098			10.29		14.65	6,625,449,290			
B3	B3 - TOU (Peak)	64,068,104	109.43	1,951	9.00	380	21.25	1,860,447,259	9,291,804,220	3,301,476,629	136%
	B3 - TOU (Off-peak)	738,159,119			9.00		14.54	10,732,833,590			
B4	B4 - TOU (Peak)	67,415,531	99.77	1,366	7.43	360	21.25	1,863,579,955	5,758,491,659	3,582,051,309	162%
	B4 - TOU (Off-peak)	518,513,385			7.43		14.42	7,476,963,013			
	Total Industrial B	2,133,149,700	440.45					34,720,332,862	28,874,097,714	5,846,235,148	120%
C1	Bulk C										
C1 (a)	C1(a) - up to 5 kW	364,347	-	2,530	10.51		16.77	6,110,097	6,435,489	(325,392)	95%
C1 (b)	C1(b) - exceeding 5 kW	53,077,416	34.79	2,473	10.29	400	16.21	1,027,384,921	986,876,895	40,508,026	104%
C1 (c)	Time of Use (TOU) - Peak	17,795,206	6.04	2,473	10.29	400	21.25	407,148,118	1,182,771,596	(94,308,947)	92%
	Time of Use (TOU) - Off-Peak	45,818,059			10.29		14.87	681,314,531			
C2 (a)	C2 Supply at 11 kV	31,537,653	1.67	1,951	9.00	380	15.99	511,887,067	365,285,154	146,601,913	140%
C2 (b)	Time of Use (TOU) - Peak	23,387,396	13.16	1,951	9.00	380	21.25	556,982,258	1,316,553,442	563,030,541	143%
	Time of Use (TOU) - Off-Peak	90,279,981			9.00		14.65	1,322,601,725			
C3 (b)	Time of Use (TOU) - Peak	3,820,829	18.28	1,366	7.43	360	21.25	160,179,592	163,212,195	182,876,995	212%
	Time of Use (TOU) - Off-Peak	12,786,080			7.43		14.54	185,909,599			
	Total Single Point Supply - C	278,866,966	73.94					4,859,517,908	4,021,134,771	838,383,137	121%
D1	Agriculture Tube Wells- Tariff D										
D1 (a)	D1 Scarp	5,987,961	-	2,473	10.29		16.21	97,064,854	111,335,124	(14,270,270)	87%
D2 **	D2 Agricultural Tube-wells **	24,799,876	44.17	2,473	10.29	200	15.65	494,118,061	461,108,063	33,009,998	107%
D1 (b)	Time of Use (TOU) - Peak	12,661,638	33.75	2,473	10.29	200	21.25	350,059,812	1,246,010,869	(105,660,798)	92%
	Time of Use (TOU) - Off-Peak	54,352,838			10.29		14.54	790,290,259			
	Total Agriculture - D	97,802,313	77.92					1,731,532,986	1,818,454,056	(86,921,070)	95%
E-1(i)	Temporary Supply - E										
E-1(ii)	Temporary E-1 (i)	218,608	-	2,530	10.51		21.25	4,645,422	3,861,293	86,847,873	120%
E-1(iii)	Temporary E-1 (ii)	4,050,059	-	2,530	10.51		21.25	86,063,744	71,536,519	15,061,099	120%
E-2	Temporary E-2	32,935	-	2,530	10.51		16.21	533,874	581,731	91,195,183	92%
	Total Temporary - E	4,301,602	-					91,243,040	75,979,543	15,263,497	120%
G	Public Lighting - Tariff G										
	Public Lighting G	14,970,960	-	2,473	10.29	-	15.65	234,295,517	278,357,446	(44,061,929)	84%
	Total Public Lighting G	14,970,960	-					234,295,517	278,357,446	(44,061,929)	84%
H	Residential Colonies attached to Industries										
	Residential Colonies H	2,514,521	-	1,951	9.00	-	15.65	39,352,259	29,124,467	10,227,792	135%
	Total Residential Colonies H	2,514,521	-					39,352,259	29,124,467	10,227,792	135%
K	Special Contracts - K										
	AJK - Regular	801,077	9.03	1,951	9.00	360	15.65	51,536,740	9,278,485	42,258,254	555%
	AJK - Time of Use (TOU) Peak	37,123,428	182.87	1,951	9.00	360	21.25	1,578,872,696	3,114,736,356	1,910,910,242	161%
	AJK - Time of Use (TOU) Off-Peak	231,793,806			9.00		14.87	3,446,773,902			
	Total Special Contracts - K	269,718,312	191.90					5,077,183,337	3,124,014,841	1,953,168,496	163%
	Sub Total	8,025,000,000	976.91					138,427,806,525	131,097,060,290	7,330,746,235	106%

87

PESHAWAR ELECTRIC POWER COMPANY

Direct Input of Proposed Tariff

[Back to Index](#)

FY 2016-17

TARIFF CATEGORIES		Sales (kWh)	Monthly Billing Demand (MW)	COS Rates		Proposed Tariff		Revenue on Proposed Tariff (PKR)	Adjusted * Cost of Service (PKR)	Cross Subsidy - (Under) / Over Recovery (PKR)	Over/ (Under) Recovery
				Fixed Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)	Fixed Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)				
A1 (a)	Residential - A1										
i	Up to 50 Units	273,680,279		2,527	10.45		4.39	1,201,456,424	4,739,821,735	(3,538,365,311)	25%
ii	01-100 Units	747,580,833		2,527	10.45		13.71	10,249,333,217	12,947,224,022	(2,697,890,805)	79%
iii	101-300 Units	2,372,474,422		2,527	10.45		18.09	42,908,572,394	41,088,476,964	1,820,095,430	104%
iv	301-700 Units	746,589,792		2,527	10.45		19.63	14,655,557,623	12,930,060,362	1,725,497,261	113%
A1(b)	Time of Use (TOU) - Peak	48,928,032		2,470	10.23		20.83	1,019,170,900	4,028,376,532	(496,592,075)	88%
	Time of Use (TOU) - Off-Peak	172,332,891			10.23		14.58	2,512,613,556			
	Total Residential - A1	4,717,242,961	-					79,955,033,432	81,893,517,119	(1,938,483,688)	98%
A2 (a)	Commercial - A2										
	Commercial - For peak load requirement up to 5 kW	253,193,851		2,527	10.45		20.83	5,274,027,914	4,385,020,809	889,007,105	120%
A2 (b)	Regular	13,129,001	35.21	2,470	10.23	400	16.45	384,972,068	239,032,537	145,939,531	161%
A2 (c)	Time of Use (TOU) - Peak	86,223,730	157.50	2,470	10.23	400	20.83	2,552,040,291	8,140,178,957	(326,503,424)	96%
	Time of Use (TOU) - Off-Peak	360,880,332			10.23		14.58	5,261,635,242			
	Total Commercial - A2	713,426,914	192.71					13,472,675,514	12,764,232,303	708,443,211	106%
B1(a)	Industrial B										
B1(b)	B1	31,278,541	-	2,527	10.45		15.90	497,328,798	541,707,674	(44,378,876)	92%
	B1 - TOU (Peak)	32,488,441		2,470	10.23		20.83	676,734,218	3,498,184,154	(493,733,138)	86%
	B1 - TOU (Off-peak)	159,651,358			10.23		14.58	2,327,716,797			
B2 (a)	B2	7,123,871	74.79	2,470	10.23	400	15.35	468,351,418	129,700,418	338,651,000	361%
B2 (b)	B2 - TOU (Peak)	73,802,594		2,470	10.23	400	20.83	2,288,308,028	9,903,811,250	(862,451,552)	91%
	B2 - TOU (Off-peak)	470,169,997	156.46		10.23		14.36	6,753,051,669			
	B3	66,606,878	109.43	1,960	8.99	380	20.83	1,886,421,307	9,578,483,963	3,246,592,877	134%
	B3 - TOU (Peak)	767,409,536			8.99		14.25	10,938,655,532			
	B3 - TOU (Off-peak)	70,086,950	99.77	1,381	7.50	360	20.83	1,890,911,094	5,991,268,000	3,524,108,918	159%
	B4 - TOU (Off-peak)	539,060,084			7.50		14.14	7,624,465,824			
	Total Industrial B	2,217,678,249	440.45					35,351,944,686	29,643,155,459	5,708,789,228	119%
C1(a)	Bulk C										
C1(b)	C1(a) - up to 5 kW	378,785	-	2,527	10.45		16.45	6,231,005	6,560,104	(329,099)	95%
C1(c)	C1(b) - exceeding 5 kW	55,180,671	34.79	2,470	10.23	400	15.90	1,044,372,671	1,004,644,279	39,728,392	104%
	Time of Use (TOU) - Peak	18,500,361		2,470	10.23	400	20.83	414,362,528	1,204,065,799	(95,204,616)	92%
	Time of Use (TOU) - Off-Peak	47,633,653	6.04		10.23		14.58	694,498,656			
C2(a)	C2 Supply at 11 kV	32,787,369	1.67	1,960	8.99	380	15.68	521,705,947	376,555,285	145,150,662	139%
C2(b)	Time of Use (TOU) - Peak	24,314,149		1,960	8.99	380	20.83	566,463,814	1,357,173,024	557,083,499	141%
	Time of Use (TOU) - Off-Peak	93,857,431	13.16		8.99		14.36	1,347,792,708			
C3(b)	Time of Use (TOU) - Peak	3,972,234		1,381	7.50	360	20.83	161,728,606	169,809,746	181,340,449	207%
	Time of Use (TOU) - Off-Peak	13,292,743	18.28		7.50		14.25	189,421,588			
	Total Single Point Supply - C	289,917,395	73.94					4,946,577,524	4,118,808,237	827,769,287	120%
D1(a)	Agriculture Tube Wells- Tariff D										
D2 **	O1 Scarp	6,225,241	-	2,470	10.23		15.90	98,981,338	113,339,562	(14,358,225)	87%
	O2 Agricultural Tube-wells **	25,782,600	44.17	2,470	10.23	200	15.35	501,762,912	469,409,690	32,353,222	107%
D1(b)	Time of Use (TOU) - Peak	13,163,370	33.75	2,470	10.23	200	20.83	355,193,006	1,268,443,610	(108,031,093)	91%
	Time of Use (TOU) - Off-Peak	56,506,632			10.23		14.25	805,219,511			
	Total Agriculture - D	101,677,844	77.92					1,761,156,766	1,851,192,862	(90,036,096)	95%
E-1(i)	Temporary Supply - E										
E-1(ii)	Temporary E-1 (i)	227,271	-	2,527	10.45		20.83	4,734,049	3,936,062	88,503,677	120%
E-2	Temporary E-1 (ii)	4,210,547		2,527	10.45		20.83	87,705,691	72,921,737	15,328,368	120%
	Temporary E-2	34,240	-	2,527	10.45		15.90	544,415	592,995	92,935,574	92%
	Total Temporary - E	4,472,057	-					92,984,155	77,450,795	15,533,359	120%
G	Public Lighting - Tariff G										
	Public Lighting G	15,564,201	-	2,470	10.23		15.35	238,910,490	283,368,895	(44,458,405)	84%
	Total Public Lighting G	15,564,201	-					238,910,490	283,368,895	(44,458,405)	84%
H	Residential Colonies attached to Industries										
	Residential Colonies H	2,614,162	-	1,960	8.99		15.35	40,127,390	30,023,043	10,104,347	134%
	Total Residential Colonies H	2,614,162	-					40,127,390	30,023,043	10,104,347	134%
K	Special Contracts - K										
	AJK - Regular	832,821	9.03	1,960	8.99	360	15.35	51,783,681	9,564,754	42,218,927	541%
	AJK - Time of Use (TOU) Peak	38,594,488		1,960	8.99	360	20.83	1,593,923,019	3,210,835,219	1,896,560,262	159%
	AJK - Time of Use (TOU) Off-Peak	240,978,907	182.87		8.99		14.58	3,513,472,462			
	Total Special Contracts - K	280,406,215	191.90					5,159,179,162	3,220,399,973	1,938,779,189	160%
	Sub Total	8,343,000,000	976.91					141,018,589,118	133,882,148,686	7,136,440,433	105%

88

PESHAWAR ELECTRIC POWER COMPANY

Direct Input of Proposed Tariff

FY 2017-1

[Back to Index](#)

TARIFF CATEGORIES		Sales kWh	Monthly Billing Demand (MW)	CoS Rates		Proposed Tariff		Revenue on Proposed Tariff (PKR)	Adjusted * Cost of Service (PKR)	Cross Subsidy : (Under) / Over Recovery (PKR)	Over/ (Under) Recovery
				Fixed Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)	Fixed Charge (Rs/kW/ M)	Variable Charge (Rs/kWh)				
A1 (a)	Residential - A1										
	i Up to 50 Units	287,129,747		2,570	10.48		4.36	1,251,885,697	4,921,769,325	(3,669,883,628)	25%
	ii 01-100 Units	784,319,193		2,570	10.48		13.63	10,690,270,601	13,444,229,258	(2,753,958,657)	80%
	iii 101-300 Units	2,489,064,917		2,570	10.48		17.99	44,778,277,857	42,665,740,785	2,112,537,072	105%
	iv 301-700 Units	783,279,450		2,570	10.48		19.52	15,289,614,865	13,426,406,741	1,863,208,125	114%
	v Above 700 Units	373,134,748		2,570	10.48		20.72	7,731,351,979	6,396,004,511	1,335,347,468	121%
A1 (b)	Time of Use (TOU) - Peak	51,332,502		2,513	10.26		20.72	1,063,609,441	4,178,796,321	(493,560,112)	88%
	Time of Use (TOU) - Off-Peak	180,801,846			10.26		14.50	2,621,626,767			
Total Residential - A1		4,949,062,403	-					83,426,637,207	85,032,946,940	(1,606,309,733)	98%
Commercial - A2											
A2 (a)	Commercial - For peak load requirement up to 5 kW	265,636,555		2,570	10.48		20.72	5,503,989,420	4,553,348,658	950,640,762	121%
A2 (b)	Regular	13,774,200	35.21	2,513	10.26	400	16.35	394,208,170	247,958,033	146,250,137	159%
A2 (c)	Time of Use (TOU) - Peak	90,461,022	157.50	2,513	10.26	400	20.72	2,630,352,376	8,444,133,635	(323,862,715)	96%
	Time of Use (TOU) - Off-Peak	378,615,072			10.26		14.50	5,489,918,544			
Total Commercial - A2		748,486,849	192.71					14,018,468,509	13,245,440,326	773,028,184	106%
Industrial B											
B1 (a)	B1	32,815,662	-	2,570	10.48		15.81	518,815,616	562,502,215	(43,686,599)	92%
B1 (b)	B1 - TOU (Peak)	34,085,020		2,513	10.26		20.72	706,241,614	3,628,806,531	(493,856,909)	86%
	B1 - TOU (Off-peak)	167,497,104			10.26		14.50	2,428,708,008			
B2 (a)	B2	7,473,959	74.79	2,513	10.26	400	15.26	473,052,614	134,543,434	338,509,180	352%
	B2 - TOU (Peak)	77,429,474	156.46	2,513	10.26	400	20.72	2,355,338,701	10,273,620,051	(874,306,368)	91%
B2 (b)	B2 - TOU (Off-peak)	493,275,559			10.26		14.28	7,043,974,983			
	B3 - TOU (Peak)	69,880,139	109.43	2,030	9.19	380	20.72	1,946,916,520	10,193,677,332	3,161,822,731	131%
B3	B3 - TOU (Off-peak)	805,122,339			9.19		14.17	11,408,583,544			
	B4 - TOU (Peak)	73,531,233	99.77	1,437	7.75	360	20.72	1,954,567,068	6,431,981,573	3,474,234,101	154%
B4	B4 - TOU (Off-peak)	565,551,110			7.75		14.06	7,951,648,607			
Total Industrial B		2,326,661,599	440.45					36,787,847,275	31,225,131,137	5,562,716,138	118%
Bulk C											
C1 (a)	C1(a) - up to 5 kW	397,399	-	2,570	10.48		16.35	6,497,474	6,811,925	(314,451)	95%
C1 (b)	C1(b) - exceeding 5 kW	57,892,415	34.79	2,513	10.26	400	15.81	1,082,279,081	1,042,157,754	40,121,327	104%
C1 (c)	Time of Use (TOU) - Peak	19,409,525	6.04	2,513	10.26	400	20.72	431,165,358	1,249,025,684	(93,229,887)	93%
	Time of Use (TOU) - Off-Peak	49,974,513			10.26		14.50	724,630,439			
C2 (a)	C2 Supply at 11 kV	34,398,639	1.67	2,030	9.19	380	15.59	543,874,782	400,740,153	143,134,629	136%
C2 (b)	Time of Use (TOU) - Peak	25,509,019	13.16	2,030	9.19	380	20.72	588,546,974	1,444,339,624	550,357,037	138%
	Time of Use (TOU) - Off-Peak	98,469,866			9.19		14.28	1,406,149,686			
C3 (b)	Time of Use (TOU) - Peak	4,167,441	18.28	1,437	7.75	360	20.72	165,336,355	182,300,830	180,650,175	199%
	Time of Use (TOU) - Off-Peak	13,945,988			7.75		14.17	197,614,650			
Total Single Point Supply - C		304,164,805	73.94					5,146,094,798	4,325,375,969	820,718,829	119%
Agriculture Tube Wells- Tariff D											
D1 (a)	D1 Scarp	6,531,168	-	2,513	10.26		15.81	103,257,766	117,571,661	(14,313,895)	88%
D2 **	D2 Agricultural Tube-wells **	27,049,634	44.17	2,513	10.26	200	15.26	518,777,415	486,937,465	31,839,949	107%
D1 (b)	Time of Use (TOU) - Peak	13,810,258	33.75	2,513	10.26	200	20.72	367,148,546	1,315,807,351	(108,611,086)	92%
	Time of Use (TOU) - Off-Peak	59,283,537			10.26		14.17	840,047,719			
Total Agriculture - D		106,674,597	77.92					1,829,231,446	1,920,316,478	(91,085,032)	95%
Temporary Supply - E											
E-1 (i)	Temporary E-1 (i)	238,439	-	2,570	10.48		20.72	4,940,456	4,087,148	92,383,204	121%
E-1 (ii)	Temporary E-1 (ii)	4,417,466	-	2,570	10.48		20.72	91,529,896	75,720,990	16,376,848	121%
E-2	Temporary E-2	35,923	-	2,570	10.48		15.81	567,943	615,766	96,990,471	92%
Total Temporary - E		4,691,828						97,038,294	80,423,904	16,614,391	121%
Public Lighting - Tariff G											
G	Public Lighting G	16,329,073	-	2,513	10.26	-	15.26	249,181,654	293,949,908	(44,768,254)	85%
Total Public Lighting G		16,329,073	-					249,181,654	293,949,908	(44,768,254)	85%
Residential Colonies attached to Industries											
H	Residential Colonies H	2,742,630	-	2,030	9.19	-	15.26	41,852,534	31,951,321	9,901,213	131%
Total Residential Colonies H		2,742,630	-					41,852,534	31,951,321	9,901,213	131%
Special Contracts - K											
K	AJK - Regular	873,748	9.03	2,030	9.19	360	15.26	52,333,274	10,179,063	42,154,212	514%
	AJK - Time of Use (TOU) Peak	40,491,136	182.87	2,030	9.19	360	20.72	1,628,976,178	3,417,056,216	1,877,829,276	155%
	AJK - Time of Use (TOU) Off-Peak	252,821,332			9.19		14.50	3,665,909,314			
Total Special Contracts - K		294,186,216	191.90					5,347,218,766	3,427,235,279	1,919,983,488	156%
Sub Total		8,753,000,000	976.91					146,943,570,484	139,582,771,261	7,360,799,222	105%

PESHAWAR ELECTRIC POWER COMPANY

Direct Input of Proposed Tariff

[Back to Index](#)

FY 2018-1

TARIFF CATEGORIES		Units (KWh)	Monthly Billing Demand (MW)	COS Rates		Proposed Tariff		Revenue on Proposed Tariff (PKR)	Adjusted Cost of Service (PKR)	Cross Subsidy (Under) / Over Recovery (PKR)	Over/ (Under) Recovery
				Fixed Charge (Rs/KW/M)	Variable Charge (Rs/KWh)	Fixed Charge (Rs/KW/M)	Variable Charge (Rs/KWh)				
A1 (a)	Residential - A1										
	i Up to 50 Units	298,053,340		2,656	10.53		4.38	1,305,473,627	5,114,470,779	(3,808,997,152)	26%
	ii 01-100 Units	814,157,910		2,656	10.53		13.68	11,137,680,211	13,970,609,579	(2,832,929,368)	80%
	iii 101-300 Units	2,583,759,150		2,656	10.53		18.05	46,642,020,167	44,336,227,498	2,305,792,669	105%
	iv 301-700 Units	813,078,611		2,656	10.53		19.58	15,920,079,206	13,952,089,259	1,967,989,947	114%
v	Above 700 Units	387,330,323		2,656	10.53		20.79	8,052,597,422	6,646,426,520	1,406,170,902	121%
	A1(b) Time of Use (TOU) - Peak	53,285,401		2,598	10.31		20.79	1,107,803,483	4,341,869,403	(503,317,711)	88%
	Time of Use (TOU) - Off-Peak	187,680,289			10.31		14.55	2,730,748,210			
	Total Residential - A1	5,137,345,024	-					86,896,402,326	88,361,693,039	(1,465,290,712)	98%
A2 (a)	Commercial - A2										
	Commercial - For peak load requirement up to 5 kW	275,742,458		2,656	10.53		20.79	5,732,685,711	4,731,625,380	1,001,060,331	121%
	A2 (b) Regular	14,298,227	35.21	2,598	10.31	400	16.41	403,633,906	257,634,331	145,999,574	157%
	A2 (c) Time of Use (TOU) - Peak	93,902,530	157.50	2,598	10.31	400	20.79	2,708,233,601	8,773,656,970	(346,994,863)	96%
	Time of Use (TOU) - Off-Peak	393,019,141			10.31		14.55	5,718,428,507			
	Total Commercial - A2	776,962,357	192.71					14,562,981,724	13,762,916,682	800,065,042	106%
B1(a)	Industrial B										
	B1	34,064,104	-	2,656	10.53		15.86	540,256,694	584,525,798	(44,269,103)	92%
	B1(b) B1 - TOU (Peak)	35,381,754	-	2,598	10.31		20.79	735,586,663	3,770,416,847	(505,030,699)	87%
	B1 - TOU (Off-peak)	173,869,380	-		10.31		14.55	2,529,799,485			
	B2 (a) B2	7,758,299	74.79	2,598	10.31	400	15.32	477,857,141	139,793,849	338,063,293	342%
	B2 (b) B2 - TOU (Peak)	80,375,209	156.46	2,598	10.31	400	20.79	2,422,000,587	10,674,537,148	(914,977,808)	91%
	B2 - TOU (Off-peak)	512,041,783			10.31		14.33	7,337,558,754			
	B3 B3 - TOU (Peak)	72,538,666	109.43	2,111	9.32	380	20.79	2,007,078,905	10,705,445,339	3,186,034,018	130%
	B3 - TOU (Off-peak)	835,752,493			9.32		14.22	11,884,400,452			
	B4 B4 - TOU (Peak)	76,328,663	99.77	1,509	7.99	360	20.79	2,017,872,814	6,857,027,401	3,444,360,677	150%
	B4 - TOU (Off-peak)	587,066,993			7.99		14.11	8,283,515,264			
	Total Industrial B	2,415,177,344	440.45					38,235,926,760	32,731,746,382	5,504,180,378	117%
C1 (a)	Bulk C										
	C1(a) - up to 5 kW	412,518	-	2,656	10.53		16.41	6,769,415	7,078,631	(309,216)	96%
	C1 (b) C1(b) - exceeding 5 kW	60,094,880	34.79	2,598	10.31	400	15.86	1,120,104,793	1,082,826,852	37,277,941	103%
	C1 (c) Time of Use (TOU) - Peak	20,147,943		2,598	10.31	400	20.79	447,875,733	1,297,767,583	(95,099,712)	93%
	Time of Use (TOU) - Off-Peak	51,875,748	6.04		10.31		14.55	754,792,138			
	C2 (a) C2 Supply at 11 kV	35,707,304	1.67	2,111	9.32	380	15.64	566,062,238	420,859,093	145,203,145	135%
	C2 (b) Time of Use (TOU) - Peak	26,479,487		2,111	9.32	380	20.79	610,508,627	1,516,851,906	558,412,909	137%
	Time of Use (TOU) - Off-Peak	102,216,063	13.16		9.32		14.33	1,464,756,188			
	C3 (b) Time of Use (TOU) - Peak	4,325,988	18.28	1,509	7.99	360	20.79	168,924,258	194,347,849	180,432,958	193%
	Time of Use (TOU) - Off-Peak	14,476,551			7.99		14.22	205,856,549			
	Total Single Point Supply - C	315,736,481	73.94					5,345,649,940	4,519,731,915	825,918,025	118%
D1 (a)	Agriculture Tube Wells- Tariff D										
	D1 Scarp	6,779,640	-	2,598	10.31		15.86	107,525,097	122,159,770	(14,634,673)	88%
	D2 ** D2 Agricultural Tube-wells **	28,078,713	44.17	2,598	10.31	200	15.32	536,165,883	505,939,682	30,226,200	106%
	D1 (b) Time of Use (TOU) - Peak	14,335,657	33.75	2,598	10.31	200	20.79	379,038,305	1,367,155,334	(113,033,504)	92%
	Time of Use (TOU) - Off-Peak	61,538,926			10.31		14.22	875,083,524			
	Total Agriculture - D	110,732,936	77.92					1,897,812,809	1,995,254,786	(97,441,977)	95%
E-1(i)	Temporary Supply - E										
	Temporary E-1 (i)	247,510	-	2,656	10.53		20.79	5,145,737	4,247,172	96,231,620	121%
	Temporary E-1 (ii)	4,585,525	-	2,656	10.53		20.79	95,333,055	78,685,685	17,238,784	121%
	E-2 Temporary E-2	37,290	-	2,656	10.53		15.86	591,414	639,875	101,021,745	92%
	Total Temporary - E	4,870,324	-					101,070,206	83,572,731	17,497,474	121%
G	Public Lighting - Tariff G										
	Public Lighting G	16,950,298	-	2,598	10.31	-	15.32	259,678,563	305,420,990	(45,742,427)	85%
	Total Public Lighting G	16,950,298	-					259,678,563	305,420,990	(45,742,427)	85%
H	Residential Colonies attached to Industries										
	Residential Colonies H	2,846,971	-	2,111	9.32	-	15.32	43,615,594	33,555,420	10,060,174	130%
	Total Residential Colonies H	2,846,971	-					43,615,594	33,555,420	10,060,174	130%
K	Special Contracts - K										
	AJK - Regular	906,989	9.03	2,111	9.32	360	15.32	52,894,951	10,690,097	42,204,854	495%
	AJK - Time of Use (TOU) Peak	42,031,585		2,111	9.32	360	20.79	1,663,836,488	3,588,607,658	1,893,726,346	153%
	AJK - Time of Use (TOU) Off-Peak	262,439,692	182.87		9.32		14.55	3,818,497,516			
	Total Special Contracts - K	305,378,266	191.90					5,535,228,955	3,599,297,755	1,935,931,199	154%
	Sub Total	9,086,000,000	976.91					152,878,366,876	145,393,189,700	7,485,177,176	105%

PESHAWAR ELECTRIC SUPPLY COMPANY

Direct Input of Proposed Tariff

[Back to Index](#)

FY 2019-20

TARIFF CATEGORIES	Sales kWh	Monthly Billing Demand (MW)	Cost Rates		Proposed Tariff		Revenue on Proposed Tariff		Revenue on Proposed Tariff (PKR)	Adjusted Cost of Service (PKR)	Cross Subsidy (Under) / Over Recovery (PKR)	Over/ (Under) Recovery %
			Fixed Charge (Rs/kW/M)	Variable Charge (Rs/kWh)	Fixed Charge (Rs/kW/M)	Variable Charge (Rs/kWh)	Fixed Charge (PKR)	Variable Charge (PKR)				
A1 (a) Residential - A1												
i Up to 50 Units	307,631,985		2,749	10.55		4.40	-	1,353,580,735	1,353,580,735	5,289,169,348	(3,935,588,613)	26%
ii 01-100 Units	840,322,791		2,749	10.55		13.75	-	11,554,438,380	11,554,438,380	14,447,813,499	(2,893,375,119)	80%
iii 101-300 Units	2,666,794,332		2,749	10.55		18.15	-	48,412,984,310	48,412,984,310	45,850,651,149	2,562,333,161	106%
iv 301-700 Units	839,208,806		2,749	10.55		19.70	-	16,534,931,113	16,534,931,113	14,428,660,567	2,106,270,546	115%
v Above 700 Units	399,778,095		2,749	10.55		20.91	-	8,359,359,969	8,359,359,969	6,873,453,177	1,485,906,792	122%
A1(b) Time of Use (TOU) - Peak	54,997,853		2,689	10.33		20.91	-	1,150,005,098	1,150,005,098	4,492,047,593	(508,038,316)	89%
Time of Use (TOU) - Off-Peak	193,711,837			10.33		14.63	-	2,834,004,180	2,834,004,180			
Total Residential - A1	5,302,445,700	-					-	90,199,303,785	90,199,303,785	91,381,795,334	(1,182,491,549)	99%
Commercial - A2												
A2 (a) Commercial - For peak load requirement up to 5 kW	284,604,091		2,749	10.55		20.91	-	5,951,071,553	5,951,071,553	4,893,246,830	1,057,824,723	122%
A2 (b) Regular	14,757,734	35.21	2,689	10.33	400	16.50	169,000,000	243,502,615	412,502,615	266,545,483	145,957,131	155%
A2 (c) Time of Use (TOU) - Peak	96,920,309		2,689	10.33	400	20.91	756,000,000	2,026,603,660	2,783,603,660	9,077,123,472	(359,864,164)	96%
Time of Use (TOU) - Off-Peak	405,649,737	157.50		10.33		14.63	-	5,934,655,648	5,934,655,648			
Total Commercial - A2	801,931,871	192.71					925,000,000	14,155,833,476	15,080,833,476	14,236,915,786	843,917,690	106%
Industrial B												
B1(a) B1	35,158,834	-	2,749	10.55		15.95	-	560,783,410	560,783,410	604,491,856	(43,708,446)	93%
B1(b) 81 - TOU (Peak)	36,518,830		2,689	10.33		20.91	-	763,608,732	763,608,732	3,900,829,424	(511,763,578)	87%
81 - TOU (Off-peak)	179,457,082			10.33		14.63	-	2,625,457,114	2,625,457,114			
B2 (a) B2	8,007,630	74.79	2,689	10.33	400	15.40	359,000,000	123,317,506	482,317,506	144,629,090	337,688,416	333%
B2 (b) 82 - TOU (Peak)	82,958,255		2,689	10.33	400	20.91	751,000,000	1,734,657,115	2,485,657,115	11,043,751,999	(940,332,620)	91%
82 - TOU (Off-peak)	528,497,451	156.46		10.33		14.41	-	7,617,762,265	7,617,762,265			
B3 83 - TOU (Peak)	74,869,867	109.43		9.48	380	20.91	499,000,040	1,565,528,913	2,064,528,913	11,232,736,984	3,170,584,963	128%
83 - TOU (Off-peak)	862,611,367			9.48		14.30	-	12,338,792,993	12,338,792,993			
B4 84 - TOU (Peak)	78,781,664		1,588	8.23	360	20.91	430,999,920	1,647,324,590	2,078,324,510	7,269,246,828	3,407,277,912	147%
84 - TOU (Off-peak)	605,933,772	99.77		8.23		14.19	-	8,598,200,230	8,598,200,230			
Total Industrial B	2,492,794,753	440.45					2,039,999,960	37,575,432,867	39,615,432,827	34,195,686,180	5,419,746,647	116%
Bulk C												
C1 (a) C1(a) - up to 5 kW	425,775	-	2,749	10.55		16.50	-	7,025,286	7,025,286	7,320,421	(295,135)	96%
C1 (b) C1(b) - exceeding 5 kW	62,026,170	34.79	2,689	10.33	400	15.95	167,000,000	989,317,415	1,156,317,415	1,120,280,069	36,037,346	103%
C1 (c) Time of Use (TOU) - Peak	20,795,444		2,689	10.33	400	20.91	29,000,000	434,832,744	463,832,744	1,342,655,249	(95,489,913)	93%
Time of Use (TOU) - Off-Peak	53,542,858	6.04		10.33		14.63	-	783,332,592	783,332,592			
C2 (a) C2 Supply at 11 kV	36,854,843	1.67	2,210	9.48	380	15.73	7,600,000	579,726,673	587,326,673	441,588,309	145,738,364	133%
C2 (b) Time of Use (TOU) - Peak	27,330,467		2,210	9.48	380	20.91	60,000,100	571,480,071	631,480,171	1,591,563,729	560,186,100	135%
Time of Use (TOU) - Off-Peak	105,501,017	13.16		9.48		14.41	-	1,520,269,658	1,520,269,658			
C3 (b) Time of Use (TOU) - Peak	4,465,013		1,588	8.23	360	20.91	78,986,977	93,163,429	172,350,406	206,031,332	179,986,651	187%
Time of Use (TOU) - Off-Peak	14,941,789	18.28		8.23		14.30	-	213,667,577	213,667,577			
Total Single Point Supply - C	325,883,416	73.94					342,587,077	5,193,015,444	5,535,602,521	4,709,439,109	826,163,412	118%
Agriculture Tube Wells - Tariff D												
O1 (a) O1 Scarp	6,997,520		2,689	10.33		15.95	-	111,610,446	111,610,446	126,385,077	(14,774,631)	88%
O2 ** O2 Agricultural Tube-wells **	28,981,089	44.17	2,689	10.33	700	15.40	106,000,000	446,308,763	552,308,763	523,439,312	28,869,451	106%
O1 (b) Time of Use (TOU) - Peak	14,796,367		2,689	10.33	200	20.91	81,000,000	309,392,032	390,392,032	1,414,443,010	(115,763,255)	92%
Time of Use (TOU) - Off-Peak	63,516,624	33.75		10.33		14.30	-	908,287,723	908,287,723			
Total Agriculture - O	114,291,600	77.92					187,000,000	1,775,598,964	1,962,598,964	2,064,267,399	(101,668,435)	95%
Temporary Supply - E												
E-1 (i) Temporary E-1 (i)	255,465	-	2,749	10.55		20.91	-	5,341,763	5,341,763	4,392,245	99,914,272	122%
E-1 (ii) Temporary E-1 (ii)	4,732,891	-	2,749	10.55		20.91	-	98,964,754	98,964,754	81,373,407	18,205,231	122%
E-2 Temporary E-2	38,488	-	2,749	10.55		15.95	-	613,884	613,884	661,732	104,872,554	93%
Total Temporary - E	5,026,844	-					-	104,920,401	104,920,401	86,427,384	18,493,017	121%
Public Lighting - Tariff G												
G Public Lighting G	17,495,036	-	2,689	10.33		15.40	-	269,423,548	269,423,548	315,985,005	(46,561,457)	85%
Total Public Lighting G	17,495,036	-					-	269,423,548	269,423,548	315,985,005	(46,561,457)	85%
Residential Colonies attached to Industries												
H Residential Colonies H	2,938,465	-	2,210	9.48		15.40	-	45,252,361	45,252,361	35,208,176	10,044,185	129%
Total Residential Colonies H	2,938,465	-					-	45,252,361	45,252,361	35,208,176	10,044,185	129%
Special Contracts - K												
K AJK - Regular	936,137	9.03	2,210	9.48	360	15.40	38,999,880	14,420,976	53,420,856	11,216,633	42,204,223	476%
AJK - Time of Use (TOU) Off-Peak	270,873,809	182.87		9.48		14.63	-	3,964,110,794	3,964,110,794			
Total Special Contracts - K	315,192,315	191.90					828,999,720	4,485,504,001	5,714,503,721	3,776,579,463	1,937,924,258	151%
Sub Total	9,378,000,000	976.91					4,323,586,757	154,204,284,847	158,527,871,604	150,802,303,835	7,725,567,769	105%

DISTRIBUTION COMPANY INTEGRATED INVESTMENT PLAN (DIIP)-PESCO

This Business Plan /
DIIP entails Goals
and Objectives and
Initiatives that will
help PESCO achieve
them and has been
prepared with
extensive cross-
functional
discussions,
coordination and
teamwork.

Contents

Section -I	
Executive Summary	
Section -II	
The Company's - Baseline	
Section -III	i
Forecasts for Next Five Years	i
Section -IV	i
Next Five Years Goals and Objectives.....	i
Section -V	i
Projects and Programs	i
Section -VI.....	ii
Costs and Financing Plan	ii
Section - VII	ii
Benefits and Financial Analysis	ii
Section - VIII.....	ii
Section - IX.....	iii
Investment Plan Implementation	iii
Section - X	iii
Implementation, Monitoring Plan and Reporting.....	iii
Section - XI.....	iii
Environmental and Social Assessment	iii
<i>Section -I</i>	<i>1</i>
<i>Executive Summary</i>	<i>1</i>
<i>Section -II</i>	<i>3</i>
<i>The Company's – Baseline.....</i>	<i>3</i>
<i>Section -III</i>	<i>19</i>
<i>Forecasts for Next Five Years</i>	<i>19</i>
<i>Section -IV</i>	<i>22</i>
<i>Next Five Years Goals and Objectives.....</i>	<i>22</i>
<i>Section -V</i>	<i>29</i>
<i>Projects and Programs – Scope.....</i>	<i>29</i>
<i>Section -VI.....</i>	<i>68</i>
<i>Costs and Financing Plan</i>	<i>68</i>
DIIP 39 Costing of Commercial Improvement Plan.....	79

Section -I

Executive Summary

i. Introduction

Peshawar Electric Supply Company (PESCO), incorporated as a Public Limited Company on 23rd April 1998, is responsible for the delivery of electricity to over 2.9 million consumers of all civil districts of Khyber Pukhtunkhwa (KPK), Pakistan as set out in PESCO's Distribution License no. 07/DL/2002, granted by NEPRA under the NEPRA Act on April 04, 2002, as a result of the restructuring of WAPDA's Power Wing, PESCO assumed its official operations and is since then being headed by a Chief Executive Officer (CEO). PESCO pays a power purchase price (in Rs/kWh) for the electricity it procures from the Central Power Purchasing Agency (CPPA) or from other sources on behalf of the CPPA which would include the generation and transmission charges regulated by NEPRA. The major objectives of the company include ensuring uninterrupted and stable power supply to all its customers along with state of the art customer care as well as establishing and operating reliable electricity distribution networks.

Currently, PESCO has 17,053 active employees, employed in eight directorates and is responsible for distributing electricity to approximately 2.9 million consumers. The consumer mix comprises approximately 88 % domestic consumers (2.6 million) including residential consumers in both urban and rural areas, 10% commercial consumers (298 million) including business consumers such as markets, plazas, and offices in both urban and rural areas, 1% industrial consumers (0.03 million) consisting of large and small industrial loads, 0.03% bulk consumers (878) consisting primarily of large societal consumers like housing societies, 0.8% agricultural consumers (0.023 million) including tube wells in rural areas, and 0.04% other consumers (1,074). The sales mix consists of 54% domestic, 9% commercial, 29% industrial, 6% bulk, 1.5% agricultural, and 0.5% other consumers.

ii. Purpose and Goal of Investment Plan

The Integrated Investment Plan¹ entails PESCO's vision, mission, core values, stakeholders' needs, general indicators, sales and consumer forecasts, power supply issues with limitations, human resources and organizational development, financial projections, regulatory requirements including quality of service, subsidies and legal restrictions affecting timely collection of delinquent payments, performance indices with initiatives and risk assessment and will serve as a central reference document for integrated cross-functional planning that will help PESCO make informed decisions based on priorities.

The goal of the Investment Plan/Business Plan is to create a document which will be used by the CEO and senior managers of PESCO to focus its activities and energies for the next five years in making PESCO a financially viable company by improving the regulation and governance of the entity, introducing new technologies including upgrade of existing technology and machinery and improving human resources in line with best practices worldwide. This plan will also be utilized by the Strategic Planning Committee to the Board for regular monitoring, to ensure that company achieves its stated objectives.

¹ The term Investment Plan or Business Plan will be used interchangeably throughout this document, as NEPRA names the Business Plan as the Investment Plan

This Investment Plan covers a five year period from FY 2016 to FY 2020, encompassing the following areas:

- Defining the activities and resources available to PESCO through the incorporation agreements and laws relating to it
- Identifying projections of power demand, power resources and population served expected in the time period from 2016-2020
- Illustrating the strategic objectives for 2016-2020, aligned with optimally achievable scenario as defined by the regulator, which designated coordinators prepared to accomplish the strategic goals in the five year timeframe of the Investment Plan
- The best and optimally achievable scenarios to demonstrate what is required and what can be achieved keeping in view the resources constraints and realities on ground
- Projecting the financial impact on PESCO's bottom-line of implementing the project plans

iii. Major Planning Situation

The following challenges faced by PESCO require integrated cross functional planning:

- Technical challenges and technological advances that require PESCO to upgrade the network, including metering to receive and measure continuous and reliable flow of power
- Operational challenges to maintain continuous flow of reliable power to the customers and meet their expectations in demand dominated, load-shedding driven regime
- Institutional challenges faced while developing the capacity of PESCO
- Smooth power evacuation, especially related to variable renewables being integrated in the network
- Compliance with applicable laws and regulations
- Social responsibility to conserve energy and social up-lift

iv. Company's Investment Plan

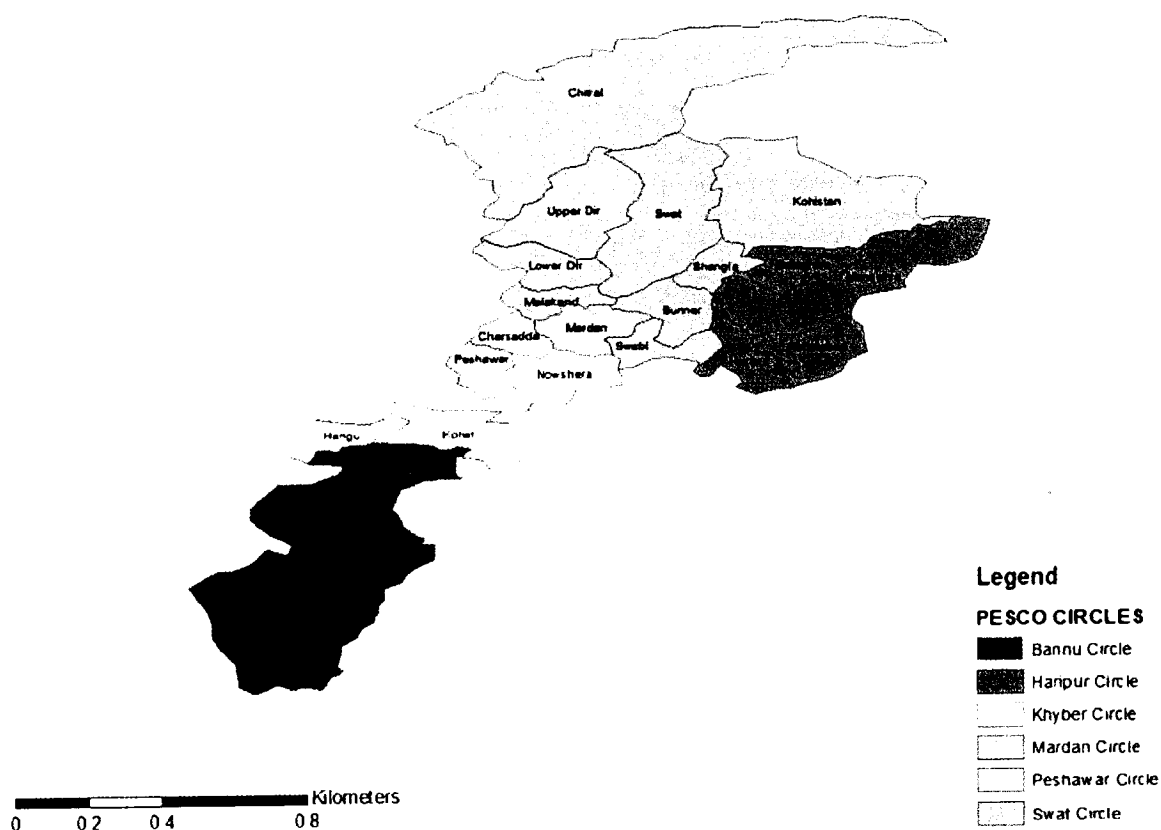
The five year Investment Plan (FY 2016-20) is intended to be used by PESCO managers and the Strategic Planning Committee of the Board of Directors as a reference guide to the upgradation and operations of PESCO, taking into consideration the activities projected to occur in the next five years. Although the Investment Plan is based on a five year window, it will be a living document and will be updated to reflect changes in requirements.

As per regulatory requirement specified in DIIP formats, two scenarios have been worked out, Best Case Scenario (if implemented, the company will achieve NEPRA standards in five years, comes with a higher cost) and Optimally Achievable Scenario (based on what company can fund, procure and implement realistically, comes with less cost, but compromise on the performance). The Multi Year Tariff (MYT) of PESCO will be based on

as a result of restructuring of WAPDA's Power Wing after the enforcement of NEPRA Regulation of Generation, Transmission and Distribution of Electric Power Act (XL of 1997). PESCO's Distribution License No. 07/DL/2002 was issued by NEPRA on April 04, 2002 for the sale of power.

■ Geographic Coverage

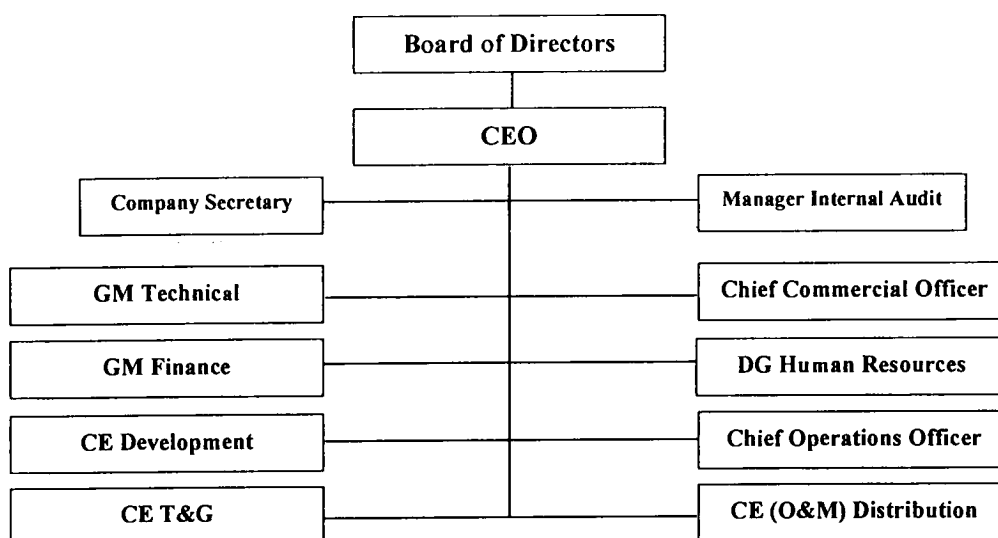
The network facilities of Peshawar Area Electricity Board (PAEB) of WAPDA were transferred to PESCO after its incorporation. PESCO's service area comprises of all the civil districts of KPK, spanning a total service area of 74,521 sq.km and 2,956,567 consumers.



■ Company's Structure, Human Resources and Corporate Governance

The following organogram explains the management hierarchy of PESCO.

Its Board of Directors is responsible for overall policy making, decision making and guiding the authority. The day-to-day affairs of the company are run by its eight Executive Directors who are responsible for their respective functions, under the overall control of the Chief Executive Officer.



- **Statistical & Financial Information**, including Purchases and Sales of Electricity, losses, and revenue billing and collection depicting the company's financial health is tabulated below:

Description	Units	2011-12	2012-13	2013-14	2014-15
Units Received	MkWh	11029.9	10892.1	11232.6	11657.3
Units Sold	MkWh	7061.5	7161.7	7471.3	7596.7
T & D Losses.	%	36	34.2	33.5	34.8
Revenue Billed	M.Rs.	64354.3	71749.2	82921.4	105932.8
Revenue Collected	M.Rs.	53079.7	60699.7	71537.2	93258.3
O & M Cost	M.Rs.	7492	11327	11110	13233
Repair & Maintenance	M.Rs.	425	521	767	717
Salaries/Pensions	M.Rs.	6346	10108	9630	11591
Travelling Expenses	M.Rs.	117	148	163	174
Vehicle Expenses	M.Rs.	122	139	149	181
Other Expenses	M.Rs.	482	411	402	570

- **General level of Investments:** PESCO has made the following investments excluding consumer contribution in different projects:

Description	(Mln Rs.)	
	2013-14	2014-15
Development of Power	227	200
Energy Loss Reduction	632	608
STG	1034	708
Total	1903	1516

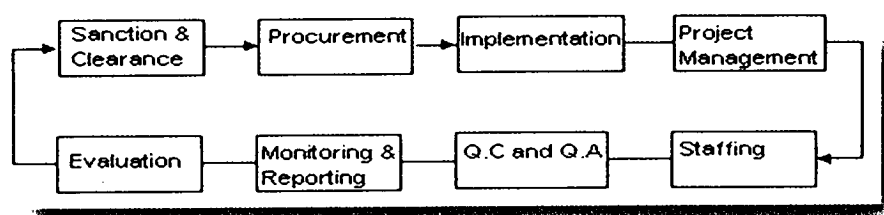
▪ Existing Project Design and Implementation System of DISCO

The project design and implementation system of PESCO is based on the resource allocation (the anticipated amount of material required and obtained for the execution of the project), resource leveling (the required amount of resources to be provided at a proper time e.g, at the start of a phase, more work force and less material may be required as compared to the growth or maturity stage) and resource scheduling/loading (the amount of resources required during the specified phase of the project).

PESCO has the required capability, personnel and expertise to implement and execute a project. It has well established, functioning departments that are capable of handling projects of similar nature and magnitude. Some of these departments are as under:

- Engineering
- Material Management
- Finance
- Commercial

Project implementation is summarized in the form of a flow chart as below:



Further, to align its planning department with current and future needs of the business, PESCO is restructuring its overall planning function.

▪ Existing Operation System of DISCO

The existing administrative layout of PESCO operation system is given below:

Description	Circles	Divisions	Subdivisions	R.O Office
Distribution	6	34	149	34

Each Distribution division has one revenue /customer service office. The distribution circles, divisions, customer services offices and subdivisions deal with all types of customers of the company. The Grid System Operation (GSO) circle, divisions and subdivisions take care of and maintain the power supply through 132kV and 66kV systems comprising of the transmission lines and grid stations while the Grid System Construction (GSC) executes 66kV and 132kV grid station and transmission lines works. The Metering and Testing (M&T) section takes care of the installation, maintenance and testing of energy meters of all types. The Construction Section undertakes the

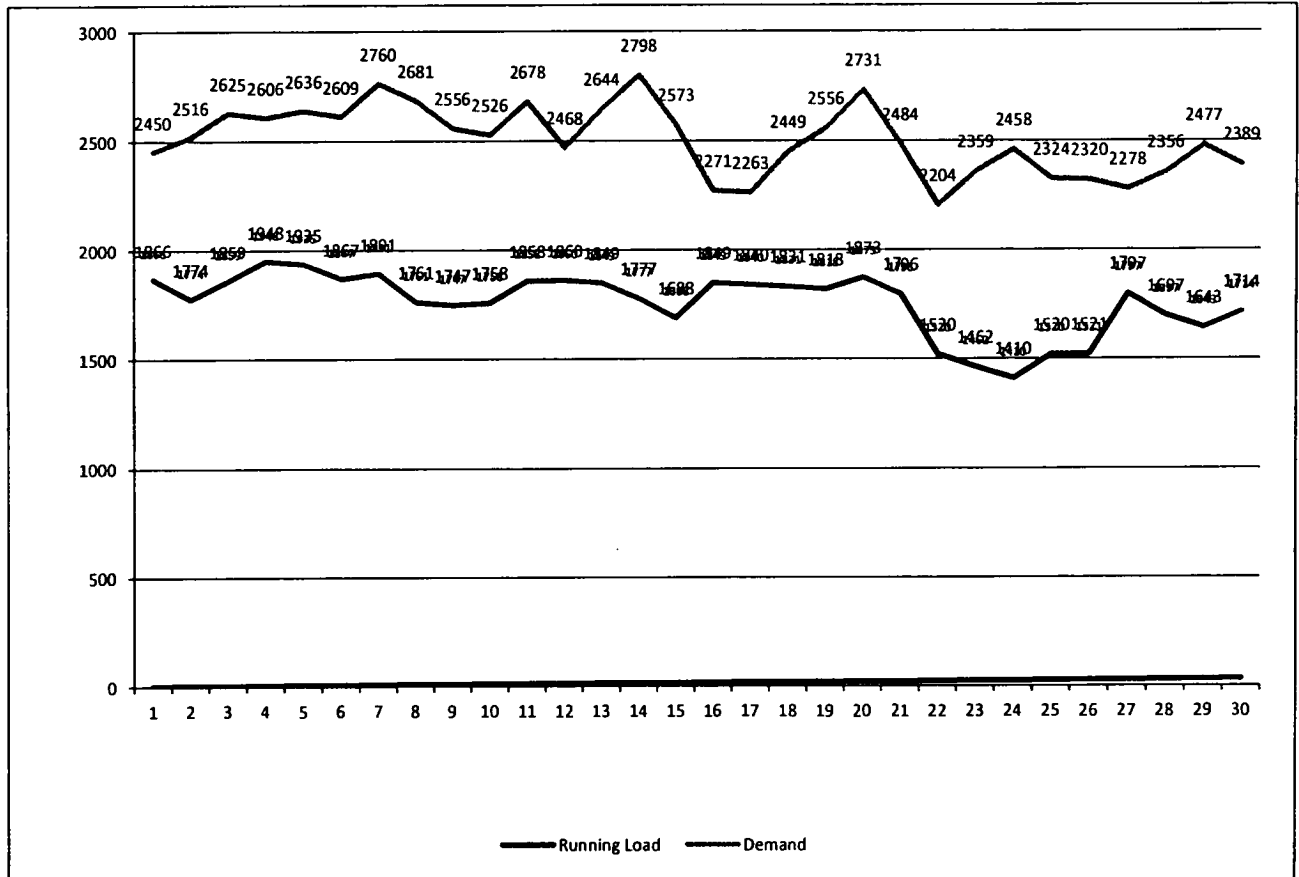
implementation and execution of investment programs of 11kV and LT (0.4 kV), System Augmentation Program (ELR and DOP), deposit works and village electrification.

ii. Power Demand and Supply

▪ Daily Load Demand

Below is the graphical representation of load fed below and computed demand, the difference is the load-shedding:

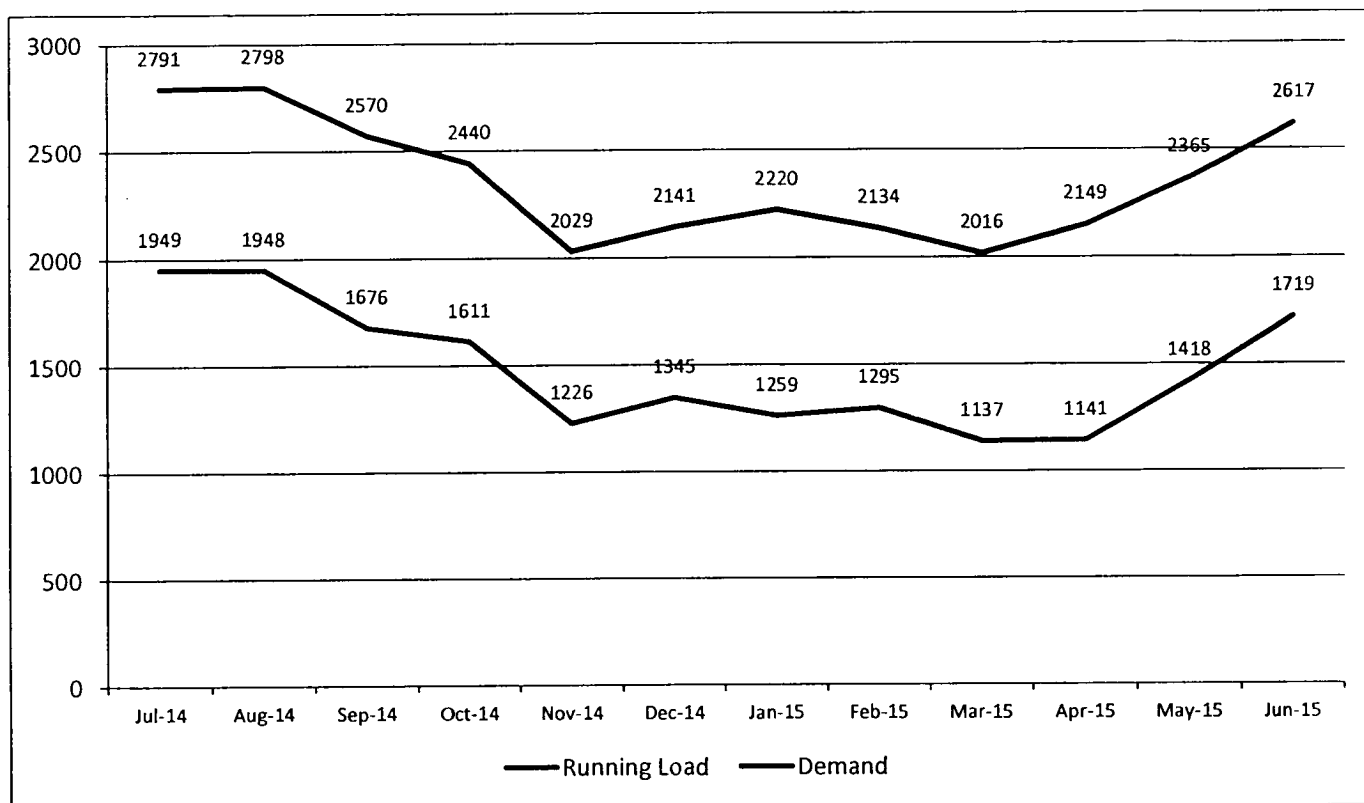
PESCO DAILY LOAD PROFILE-AUGUST 2014 (PEAK DAY)



- **Seasonal Load Profile**

Below is the graphical representation of load fed below and computed demand, the difference is the load-shedding:

PESCO MONTHLY LOAD PROFILE-2014-15



iii. Secondary Transmission and Distribution Network Condition:

PESCO has a 67 grid stations of 132 kv, 17 grid stations of 66 kv and 6 grid stations of 33 kv, thus making a total of 90 grid stations. The details by grid stations are placed at Appendix-xxx. PESCO serves 2.9 million customers through 843 number of distribution feeders with a total length of 33,506 km of HT Lines and 43,957 km of LT Lines. The total number of distribution transformer in PESCO is 58458.

The total T&D losses are provided under the section commercial management. However, the segregate of Technical and non-technical losses is not available. The T&D losses with technical and non-technical segregate can be calculated using the following two approaches. Simulation through SLDs² will require at least one year through a third party consultant to complete. Simulation through GIS³ will require at-least two to three more years to first map

² Hiring a third party consultant, getting the Single Line Diagram (SLDs) updated and then simulating the network requires at-least a year's time

³ The GIS mapping of HT and LT network takes a lot of time as these DISCOs have the network length in thousands of Km and hundreds and thousands of network assets that are mapped during GIS mapping

the whole system and then simulate in SynerGEE and PSS/E. The T loss calculations will be done through outsourcing and will be completed in FY 2016.

The distribution transformers loading data of grid stations is placed at Annexure-1. Directions have been passed to field formations to collect the data of the distribution transformers loading for the month of that will be completed in 2016.

Main equipment status (power transformers, transmission lines, distribution lines and distribution transformers) is provided above. However, the status of other equipment including breakers, isolators, CTs and PTs at grid stations is in process and will be provided in 2016.

iv. Financial Management:

The accounting systems and the corresponding back-office operations of PESCO are legacy based which are not only unable to meet the growing needs of the company but also incapable of providing timely information required for senior management to make effective decisions or properly monitor and control utility operations. The ERP is being implemented under USAID Power Distribution Program, however all the current processes are manually run. PESCO's cost/revenue centers are dispersed geographically, adding to the delay in reporting. The number and type of financial transactions are complex and diverse, and the data required managing these transactions quite voluminous.

The system of inventory / material management requires significant manual effort and does not provide real time valuation and status of the inventory. The inventory of PESCO, despite of real time updating, is updated periodically for its valuation, thus, weakening the overall internal control system which in turn does not provide timely information for the project costing or project management. The inventory at warehouse is maintained manually on Microsoft Excel without any use of inventory coding.

Lack of automation in financial system and its manual integration with billing system results in working capital difficulties for PESCO and delay follow up with banks for cash-in-transit by respective customer service offices.

The PESCO requirement for Operating and Maintenance expenses for the Financial Year 2014-15 was Rs. 13,233 million. The brief head-wise detail is provided in the table below:

S. No.	Expense Head	O&M Expense Requirement (Rs. Million)
1	Salaries and Benefits	11,591
2	Repair and Maintenance	717
3	Travelling Expenses	174
4	Vehicle Expenses	181
5	Other Expenses	570
	Total	13,233

v. HR Management

PESCO Existing Strength

Sr. No.	Particulars	Sanctioned	Working	Vacant
1	BPS-20	10	9	1
2	BPS-19	30	25	5
3	BPS-18	124	108	16
4	BPS-17	363	235	128
Grand Total		527	377	150

As on July, 2015

Sr	Posts	BPS	Strength	Working	Vacant
1	A/C Officer	16	34	33	1
2	Asstt: Secretary	16	1	--	1
3	Audit Officer	16	30	31	-1
4	Computer Operator	16	65	32	33
5	Computer Teacher	16	1	1	--
6	D A O	16	88	83	5
7	DM-A	16	9	3	6
8	Land Acq:Collector	16	1	1	--
9	Sr. Superintendent	16	3	3	--
10	Steno Grade-I	16	33	31	2
11	Supervisor (DC)	16	50	30	20
12	Supervisor (DE)	16	45	43	2
13	T.G.Teacher	16	13	14	-1
14	Tehsildar	16	7	1	6
15	Admn: Off:/Jr: Sup:	15	12	10	2
16	Commercial Supdt:	15	34	31	3
17	Data Coder	15	65	57	8
18	Data Entry Operator	15	54	35	19
19	Foreman	15	30	15	15
20	L.S-I	15	644	379	265
21	Librarian	15	1	--	1
22	P.T.I	15	1	1	--
23	Security Inspector	15	13	7	6
24	Account Assistant	14	237	120	117

Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

25	Assistant / H.C.	14	74	76	-2
26	Assistant BCS	14	25	--	25
27	Assistant DCS	14	25	--	25
28	Audit Asssistant	14	89	57	32
29	Cashier	14	29	--	29
30	Commercial Asstt:	14	718	509	209
31	P.S.I / A.P.P.	14	1	--	1
32	PC Operator	14	47	--	47
33	Steno Grade-II	14	118	14	104
34	Stock Verifier	14	3	2	1
35	Store Sys: Sup:	14	14	2	12
36	Transport Supervisor	14	1	1	--
37	DM-B	13	52	31	21
38	Jr.Instructor	13	8	--	8
39	LFM-I	13	3	10	-7
40	SSO-I	13	146	96	50
41	Test Inspector	13	20	15	5
42	A.D.M	12	17	22	-5
43	Section Supervisor	12	100	9	91
44	Sr.Store Keeper	12	22	16	6
45	A.F.M	11	47	41	6
46	Cable Jointer	11	3	3	--
47	Care Taker	11	2	1	1
48	Junior Store Keeper	11	29	21	8
49	L.S-II	11	480	359	121
50	Lab Assistant	11	33	12	21
51	LFM-II	11	3	49	-46
52	MRS-I	11	37	28	9
53	SSO-II	11	183	172	11
54	Sub Engineer	11	17	24	-7
55	Test Asstt;	11	20	22	-2
56	Work Supervisor	11	8	--	8
57	Winder	10	--	4	-4
58	Electrician-I	9	1	1	--
59	Fitter Line Man	9	4	2	2
60	Fitter-I	9	28	26	2
61	Khatib/Imam	9	4	2	2
62	L.M.I	9	1,494	1,544	-50
63	MRS-II	9	125	113	12
64	Senior Clerk	9	464	442	22
65	Security Sergeant	8	133	78	55

Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

66	Auditor	7	97	--	97
67	Driver	7	702	476	226
68	Electrician-II	7	7	4	3
69	Fitter-II	7	75	44	31
70	Gate Clerk	7	16	11	5
71	J.Clerk W/S:	7	518	368	150
72	J/Clerk Coml:	7	102	28	74
73	Jr.Clerk A/C	7	14	2	12
74	L.M-II	7	1,599	1,475	124
75	Legal Clerk	7	29	--	29
76	Machine Attendant	7	20	8	12
77	Meter Mechanic	7	26	25	1
78	Meter Reader	7	1,912	1,580	332
79	Moulder	7	4	--	4
80	P/Fitter	7	4	--	4
81	Qanoongo	7	1	1	--
82	SSA	7	111	93	18
83	Stock Clerk	7	31	7	24
84	Surveyor	7	13	--	13
85	TCC	7	290	101	189
86	Tracer	7	97	34	63
87	Security Guard	6	1,177	643	534
88	ALM	5	4,619	4,357	262
89	ASSA	5	384	292	92
90	ASSA Maint	5	1	12	-11
91	Bill Distributor	5	977	567	410
92	Blacksmith	5	21	6	15
93	Carpenter	5	5	3	2
94	Electrician	5	8	3	5
95	Helper	5	2	4	-2
96	Helper Pipe Fitter	5	2	--	2
97	Helper(P&I)	5	10	9	1
98	Khadim/ Mozain	5	2	2	--
99	Mechanic	5	--	1	-1
100	Naib Court	5	1	--	1
101	Patwari	5	6	2	4
102	Plumber	5	2	--	2
103	T.W.O	5	27	8	19
104	Timekeeper	5	1	--	1
105	Turner	5	6	3	3
106	Welder	5	15	7	8

Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

107	Work Mistri	5	8	2	6
108	Daftari	4	37	6	31
109	H/Fitter	4	18	3	15
110	H/Molder	4	4	2	2
111	H/Turner	4	3	--	3
112	MATE	4	2	1	1
113	PPC Operator	4	4	3	1
114	Aya	3	1	1	--
115	Cleaner	3	110	45	65
116	Hamer Man	3	10	1	9
117	Helper Welder	3	4	--	4
118	Meter Helper	3	39	19	20
119	R/Lifter	3	2	1	1
120	Store Helper	3	109	36	73
121	Badraga	2	1	1	--
122	Barkandaz	2	3	3	--
123	Bearer	2	13	11	2
124	Beldar	2	2	--	2
125	Chowkidar	2	337	190	147
126	Cook	2	8	4	4
127	Khalasi	2	30	4	26
128	Khasadar	2	37	10	27
129	Labour	2	7	5	2
130	Mali	2	227	163	64
131	Marter Mat	2	6	1	5
132	Naib Qasid	2	744	507	237
133	Painter	2	1	1	--
134	R/House Helper	2	1	1	--
135	Store Cooly	2	18	6	12
136	Sweeper	2	408	111	297
137	Ehalmed	1	4	--	4
138	Library Attendant	1	1	1	--
139	Masson	1	2	--	2
	Total		21,233	16,080	5,153

PESCO regularly conducts training and capacity building of its employees largely through self-owned training facilities (CTCs and RTCs) and WAPDA Staff College. The trainings that are mandated by WAPDA for the Officers are conducted at the Staff College while the local training centers organize around fifteen to twenty regular training programs each year for PESCO employees. An average of 5,000 numbers of staff trained under various functional and skill based training programs each year. In the year 2014-15, a total of 4,773

(28% of total strength) employees were trained at the RTC and WAPDA Staff College. Meanwhile, the budgeted amount spend on these trainings was nearly Rs. 5 million.

PESCO has a total of five training facilities including one RTC and four CTCs to deliver trainings to the employees. Recently, USAID has upgraded the RTC and four CTCs of PESCO.

vi. IT-MIS

With assistance from USAID Power Distribution Program (PDP), the IT backbone of the business has significantly improved but still required further scaling.

The table below depicts the IT infrastructure being developed by PESCO by getting assistance from PDP:

Projects	Server	Desktop	Laptop	UPS	Printer	Scanner	LAN	WAN	Other Hardware	Software
ERP/CIS	8	413	39	415	133	32	778 nodes	46 links	-	Oracle covering Finance, HR and MM modules for ERP & Customer Care and Billing software for CIS
HHU	-	43	-	43	43	-	-	-	479 HHUs+ 60 RF enabled HHUs	HHU Software
CSC	2	4	-	6	-	-	-	-	-	CMS v 2.2
P&E	1	6	-	7	2	-	8 nodes	-	-	ArcGIS & SynerGEE
AMR	7	181	-	182	176	-	6 nodes	1 link ⁴	13,250 AMR meters	MDC Software
LDI ⁵	4	6	-	7	1	-	16 nodes	1 link ⁶	-	MDC Software
IT Lab at HQ	-	16	-	16	1	-	17 nodes	-	-	-
Intranet Portal Project	3	13	3	13	1	11	24 nodes	44 links	-	-
RTC Lab	1	25	3	2	1	-	26 nodes	-	-	-
Data Center	Racks, UPS, backup systems, fire safety, HVAC, biometric based security, video surveillance, backup generator etc.									
Total Quantity	23	707	45	691	358	43	875	92	N/A	-

⁴ PDC at PESCO HO is connected with WAPDA House NOC @ 2 Mbps

⁵ Servers for LDI and AMR are located at WAPDA House NOC.

⁶ AMI at PESCO HO is connected with WAPDA House NOC @ 2 Mbps

vii. Commercial Management

The commercial operations of PESCO were legacy based and did not offer much in terms of transparency, data accuracy, system efficiency and services to consumers. Therefore, there was a dire need to improve commercial procedures and bring them at par with best practices adopted by utilities worldwide. With the vision to improve the overall commercial operations at PESCO, USAID implemented an optimal fusion of activities that would be in order to revolutionize the business practices adopted by PESCO which took its commercial operations many steps further.

The old billing system of PESCO was characterized by manual and cumbersome processes, inadequate controls, insufficient commercial focus, limited transparency and a lack of reliable information. Therefore, CIS, which is the critical backbone of customer care and commercial operations, was implemented at selected circles of PESCO with the assistance of PDP.

As far as meter reading process is considered, the orthodox practice was recording the reading and calculating the consumption on customer records (Kalamzu card), transferring this data to the meter reading list, obtaining approval for the compiled readings by operating personnel and then entering the reading and the consumption into the computer which was a time consuming process leaving little or no time to verify suspect readings. Therefore, data manipulation and transcription errors were common causing the entire process to be highly inefficient with poor internal controls. In response to this, PESCO implemented the IMR initiative under which the process of meter reading was re-engineered and the role of the MIS directorate was increased to maintain registers electronically, eliminate redundancies and ensure better monitoring methods. The HHUs were implemented in two Circles of PESCO with help of USAID PDP.

PESCO through PDP's assistance has also implemented a large-scale high-end meter replacement program across its territory, with AMR (GSM/GPRS) meters for up to 12,500 high-end residential, agricultural, commercial and industrial customers having a sanctioned load of more than 20 kW to ensure improved commercial performance, increased revenue (by modernizing PESCO's meter reading) and commercial management processes by reducing losses and saving energy.

The following table illustrates the trend of units purchased from CPPA and subsequent billing to the consumers by PESCO:

(Units in GWh)

Description	2010-11	2011-12	2012-13	2013-14	2014-15
Units Received from CPPA	11,115	11,076	10,874	11,233	11,657
Units Billed to Customers	6,976	7,062	7,161	7,471	7,597
Units Lost	4,139	4,014	3,713	3,759	4,060
Losses (%)	37.2	36.0	34.2	33.5	34.8

The table below gives an illustration of the billing and collection pattern of PESCO:

(Revenue in Million Rs)

Description	2010-11	2011-12	2012-13	2013-14	2014-15
Revenue Billed to Customers	52428	64354	71749	82921	105933
Revenue Collected from Customers	43105	53080	60700	71537	93258
Revenue Collection (%)	82.2	82.5	84.6	86.3	88
AT & C Losses (%)	48.4	47.2	44.4	42.6	42.6

viii. Internal Control

▪ Investment Approval

The company has adopted WAPDA procedures and PEPCO approved book of Financial Powers for processing all types of expenditures. The above documents prescribe financial and administrative powers of various offices for different type of expenditures.

The investment program is categorized into three components: Development of Power, Rehabilitation / Energy Loss Reduction and Secondary Transmission Lines and Grid Stations and now been transformed into the Distribution Integrated Investment Plan (DIIP)/ Business Plan, which also covers other functional areas plans as well.

The Planning Department under supervision of CEO and Chief Engineer and in consultation with Operation, Finance and other Directorates prepared PC-1s for DOP, ELR, STG and RE. The PC-1s were submitted to Planning Division of GOP after approval of BOD/Authority for final approval from ECNEC and subsequently they were approved. The approved PC-1s are the basis of annual investment. Now DIIP will be utilized for getting regulatory approval first and then taking the desired course of approval, based on funding sources.

▪ Internal Audit

There are three types of audits conducted in PESCO Internal Audit, Govt. Audit and Audit by a chartered company. Each has different scope and objectives. The internal audit processes of PESCO are governed by the legacy systems which have missed the mark to adequately identify non-compliance with existing procedures such as:

- Units consumed but consumer not billed
- Damaged or slow meters
- Inaccurate meter reading
- Units billed to nonexistent consumers
- Failure to monitor accounts with payment arrangements

Under the co-sourcing arrangement, a co-sourcing partner was hired through PDP provided assistance to PESCO to implement a risk based audit approach as defined in the new internal audit manual for a period of one year. After a year, the performance of the audit function was evaluated and it was revealed that the internal audit function has significantly improved as the desired controls were established within the processes. The capacity and capability of the internal audit staff was also increased.

ix. **Legal and Contractual Framework**

The primary function of PESCO is to distribute electrical power to the residents and industries within its service area.

The important legal and regulatory documents, principal contracts, and laws under which PESCO must operate are:

- The Companies Ordinance 1984
- PESCO Memorandum of Association
- PESCO Articles of Association
- Distribution License 2002
- NEPRA Performance Standard 2005
- Income Tax Ordinance 2001

The Companies Ordinance of 1984 encompasses all the rules and regulations for businesses registered with Security Exchange Commission of Pakistan (SECP). The Ordinance provides legal protection to the businesses, with the SECP keeping a close check on financial and corporate entities to ensure the stakeholders' interest. According to the Ordinance, PESCO has to follow the Memorandum of Association and Articles of Association.

According to its Memorandum of Association, in April 1998, PESCO was incorporated as a Limited Liability Company with the right to acquire properties and grid stations of WAPDA with the sole purpose of carrying on and expanding the business and supplying electricity to the areas formerly supplied by the Peshawar Area Electricity Board (AEB). Similarly, the Companies Ordinance of 1984 provides a framework of rules and regulations to PESCO, known as its Articles of Association, which cause PESCO to be classified as a Public Limited business and therefore subject to the laws which apply to such corporations.

In April 2002, NEPRA granted a distribution license to PESCO as per section 21 of the Regulation of Generation, Transmission and Distribution of Electric Power Act, 1997. According to it, PESCO can engage in distribution services and make sales of power to consumers in the Service Territory and the Concession Territory subject to and in accordance with the terms and conditions of the license.

NEPRA also prescribes separate performance standards for generation, transmission and distribution of safe, efficient and reliable electric power to all the consumers.

Additionally, the taxation system is defined by the Income Tax Ordinance of 2001 (Annex IV). Like all DISCOs, PESCO has to comply with this Ordinance and file the following returns:

- Annual income tax return
- Monthly sales tax return
- Statement of deductions and calculations
- Monthly withholding tax
- Quarterly advance tax

The following deductions are made by PESCO and are duly submitted to the Government of Pakistan:

- Sales tax
- Withholding tax on sales tax
- Withholding tax on goods
- Withholding tax on sales

Section -III

Forecasts for Next Five Years

Through Power Market Survey (PMS), PESCO prepares the forecast ten years. The forecasts for the period of FY2016 to FY2020 are tabulated in this section. Additionally, the generation plan is prepared centrally by NTDC that is also attached.

i. Consumer Growth by Category

DIIP 1 – Consumer Growth by Category

(Nos in Million)

Circle	Domestic	Commercial	Industrial	T/ Well	Others	Total
2015-16	0.2747	0.0316	0.0033	0.0025	0.0001	0.3122
2016-17	0.2592	0.0298	0.0031	0.0023	0.0001	0.2945
2017-18	0.2462	0.0283	0.0030	0.0022	0.0001	0.2798
2018-19	0.2359	0.0271	0.0028	0.0021	0.0001	0.2680
2019-20	0.2255	0.0259	-0.0027	0.0020	0.0001	0.2562

ii. Energy and Demand Forecasts

DIIP 2 – Energy and Demand Forecasts

Category-wise Energy Sales (GWh) – Including Load Shedding

Description	2016	2017	2018	2019	2020
Domestic	6595	7004	7426	7862	8313
Commercial	1121	1220	1327	1441	1564
Public Light	19	20	21	21	22
Small Industries	339	382	430	483	542
M&L Industries	3364	3811	4279	4767	5278
Tube Well	153	168	184	200	217
TOTAL	11592	12606	13666	14775	15935
Growth %	9.1	8.7	8.4	8.1	7.9

Category-wise Energy Sales (GWh) – Excluding Load Shedding

Description	2016	2017	2018	2019	2020
Domestic	5175	5538	5914	6301	6702
Commercial	874	986	1044	1138	1240
Public Light	15	15	16	17	17
Small Industries	265	301	340	384	432
M&L Industries	2749	3177	3624	4091	4580
Tube Well	121	133	147	161	176
TOTAL	9198	10120	11084	12092	13146
Growth %	10.6	10	9.5	9.1	8.7

Category-wise Demand (MW) – Including Load Shedding

Description	2016	2017	2018	2019	2020
Domestic	1337	1409	1483	1559	1638
Commercial	264	286	311	336	364
Public Light	5	5	5	5	6
Small Industries	29	32	36	41	46
M&L Industries	686	712	739	767	797
Tube Well	8	8	9	10	11
TOTAL	2134	2248	2368	2493	2624
Growth %	5.4	5.4	5.3	5.3	5.2

Category-wise Demand (MW) –Excluding Load Shedding

Description	2016	2017	2018	2019	2020
Domestic	883	936	990	1046	1104
Commercial	174	189	206	224	243
Public Light	3	3	3	4	4
Small Industries	19	22	24	27	31
M&L Industries	447	464	482	500	520
Tube Well	5	6	6	7	8
TOTAL	1404	1485	1570	1658	1751
Growth %	5.9	5.8	5.7	5.6	5.6

iii. **Generation Forecast and Power Acquisition Program**

Apart from aggressive generation additional plan out-side PESCO's territory, widespread variable renewable generation (Solar Power) influx in is also planned in PESCO's territory, along with coal based conventional power plants coming on bar in next five years.

iv. **Other Changes Including Technological Advances**

With the assistance from USAID PDP PESCO has introduced technology to improve its financial, commercial and overall business management, which need to be sustained and scaled-up. Therefore, preparing and implementing DIIP is extremely important.

v. **Analysis**

As depicted above, the power demand of the customers is growing rapidly, and extensive generation is being added. With overloaded transmission and distribution system, if proper plan like DIIP is not approved, implemented, monitored and closed in-time, then the customers will not get relieve and the whole generation investments can go down the drain.

Section -IV

Next Five Years Goals and Objectives

i. Goals and Objectives Matrix

The goals are long term targets and objectives are medium term targets. The objectives defined by PESCO are SMART i.e. Specific, Measurable, Attainable, Realistic and Timely. The target setting has been done keeping in view what can be **achieved optimally** in next five years. Table below (DIIP4) lists the goals and objectives for next five year for the company, are prepared by extensive discussions and coordination within PESCO and the signed-off goals and objectives from initial exercise are placed at Annex-2

DIIP 4 - Goals and Objectives Matrix

Strategic Goals	Strategic Objectives	Coordinating Directorate (s)	Leading Directorate	Target Measurement	Measurement FY 2015	Five Year Objective FY16 to FY2020					Project Manager	Supporting Plan
						FY2016	FY2017	FY2018	FY2019	FY2020		
1.0 Improve Operational Efficiency	1.1.a Reduce technical and commercial losses to 15% (8% technical and 7% commercial): - Improved HT/LT Ratio - Improved power factor - Improved voltage profile - Reduce average length of HT feeders - AT&C based Investments - Single phase transformers piloting to hard areas w/o LT - ABC expansion (conversion of bare LT with HT)	P&E, PD Const, PD GSC, MM, Fin, Comm, Ops, MIS	Technical	% age of kWh	Above 30%	30%	28%	26%	25%	23%	GM Technical, CE P&E and team	DIIP- Transmission and Distribution Plan

Strategic Goals	Strategic Objectives	Coordinati ng Directorate (s)	Leading Directorate	Target Measurem ent	Measurement FY 2015	Five Year Objective FY16 to FY2020					Project Manager	Supporting Plan
						FY2016	FY2017	FY2018	FY2019	FY2020		
1.0 Improve Operational Efficiency	1.1.b Reduce Commercial Losses	CSD, MIS and Ops	CSD	% of KWh	This is progressive decrease by % of the commercial loss. Therefore, 1% commercial loss will be reduced	0.2%	0.2%	0.2%	0.1%	0.3%	CSD and his team	DIIP- Commercial Improvement Plan (CIP)
	1.2 Improve SAIDI/SAIFI To meet specified regulatory performance standards	Ops, T&G, O&M Dist, CSD, Technical	O&M Dist	Hours/Numbers	Over Specified limits of NEPRA					To comply with NEPRA's specified standards		
	1.3 Improve collections to 100%	CSD, Ops, MIS, O&M Dist	CSD	%age billed amount excluding subsidy		83%	88%	91%	93%	95%		
	1.4 Eliminate fatal & non-fatal accidents	Ops, HR, O&M Dist, MM, HR, Dev, T&G	Operations	No of accidents	In double figures per year	Substantial Reduction	Eliminate	Eliminate	Eliminate	Eliminate	DD Safety	DIIP-Linemen Safety Plan
2.0 Improve Customer Care and Service	2.1.1 "Soft area" Reduction in billing complaints to less than 1%	Ops, CSD, O&M Dist	CSD	%age of total consumers	More than 10%	Reduction	Reduction	Reduction	<1%	<1%	CSD and his team	DIIP- Commercial Improvement Plan (CIP)
	2.1.2 "Hard area" Reduction in billing complaints to less than 5%	Ops, CSD, O&M Dist	CSD	%age of total consumers	More than 10%	Reduction	Reduction	Reduction	<25%	<10%		
	2.2 Minimize New Connections installation duration	Ops, O&M Dist, CSD, MM,	CSD	No of days	NEPRA's guidelines not complied with			To comply with NEPRA's specified standards				
	2.3 Minimize Reconnection installation duration	Ops, O&M Dist, CSD, MM,	CSD	No of days	NEPRA's guidelines not complied with			To comply with NEPRA's specified standards				
	2.4 inimize the redressal time for supply complaints	Ops, MIS, CSD, O&M Dist	MIS	Hours	NEPRA's guidelines not complied with			To comply with NEPRA's specified standards				

Strategic Goals	Strategic Objectives	Coordinating Directorate (s)	Leading Directorate	Target Measurement	Measurement FY 2015	Five Year Objective FY16 to FY2020					Project Manager	Supporting Plan
						FY2016	FY2017	FY2018	FY2019	FY2020		
3.0 Improve PESCO's Infrastructure	3.1 Human-ware											
	3.1.1 Start Training & capacity building initiatives	HR & All	HR		Legacy training	TNA, Training plans, CPD					HRD and his team	Human Resource Improvement Plan (HRIP)
	3.1.2 Fulfill the basic requirement for needs to operate for field staff	HR , FIN, Ops, O&M Dist	HR		No comprehensive system in place	LM plan part of the overall DIIP						
	3.2 Orgaware											
	3.2.1 Org A&R review and implementation	HR & All	HR		Not fully implemented	Align org structure with business strategy					HRD and his team	Organizational Improvement Plan (OIP)
	3.2.2 Improve recruitment process	All	HR		Legacy Process	Needs improvement						
	3.2.3 Conduct yardstick study for Human Resource	All	HR		Yardstick study is obsolete	Yardstick Study to be updated						
	3.2.4 Implement Performance based management system	PR, HR	HR		Legacy system with no implementation	i) Upgrade and implement the existing accelerated promotion policy and ii) Increments based on performance ratings of PERs						
	3.2.5 Improvement in office facilities/work environment]	HR & All	HR		Limited/inadequate facilities	Needs improvement						

Strategic Goals	Strategic Objectives	Coordinating Directorate (s)	Leading Directorate	Target Measurement	Measurement FY 2015	Five Year Objective FY16 to FY2020					Project Manager	Supporting Plan
						FY2016	FY2017	FY2018	FY2019	FY2020		
3.0 Improve PESCO's Infrastructure	3.3 Technoware											
	3.3.1 AMI expansion	MIS, Ops, O&M Dist, CSD, P&E	CSD	% of Customers Covered with AMR	USAID Project/ Pilot by PESCO	Cover an 10% of total consumer base contributing to 20% revenue					CSD	Commercial Improvement Plan (CIP)
	3.3.2 Expand HHU and meter correction	MIS, Ops, O&M Dist, CSD, P&E	CSD	% of Customers Covered with HHUs	USAID Project/ Pilot by PESCO	"Soft area" 100% "Hard area" S-10%					CSD	Commercial Improvement Plan (CIP)
	3.3.3 Replace electro mechanical meters with static meters (100%)	Ops, O&M Dist, CSD, P&E	CSD	% of Customers Covered with Static Meters	USAID Project/ Pilot by PESCO	100% electronic meters					CSD	Commercial Improvement Plan (CIP)
	3.3.4 P&E expansion to GIS Mapping	P&E, MIS, Ops, O&M Dist	P&E		USAID Project	Fully implement in PESCO					P&E	IGTDP
	3.3.5 Conduct feasibility study for automation, introducing "SCADA" transmission and distribution	P&E, MIS, Ops, O&M Dist	P&E			Hire a consultant for FY 16					P&E	IGTDP
	3.3.6 Develop designs and standards dept. by end of 2015 and Integrated Power Planning Department	P&E	P&E		Department not functional	Functional design and standards department					P&E	IGTDP
	3.4 Inforware											
	3.4.1 Implement ERP & its rollout	All	FIN		PDP initiated ERP project	Extension of the IT network to support ERP in the remaining circles					FD	Financial Management Improvement Plan (FMIP)
	3.4.2 Implement CIS & its rollout	CSD, MIS	CSD		PDP initiated it in two circles	Extended to all circles					CSD	Commercial Improvement Plan (CIP)
	3.4.3 Expand intranet portal to PESCO	All	MIS		Deployment at H/Q level	Company Level Deployment					MIS	Communication Improvement Plan (CIP)
	3.4.4 Improve communications through email	All	MIS		Paper based communication	Promote e-communication culture					DG IT	Internal Comm. Improvement Plan (ICIP)

Strategic Goals	Strategic Objectives	Coordinating Directorate(s)	Leading Directorate	Target Measurement	Measurement FY 2015	Five Year Objective FY16 to FY2020					Project Manager	Supporting Plan
						FY2016	FY2017	FY2018	FY2019	FY2020		
4.0 Comply with applicable laws and regulations	4.1 Companies Ordinance 1984	FIN, Company Secretary	FIN		-	Study and Compliance Required					All	Create a Library, map all requirements and Make it part of Business Plan
	4.2 Code of Corporate Governance for Public Sector	FIN, Company Secretary	FIN		-							
	4.3 Income Tax Ordinance	Legal, FIN, CSD, MIS	FIN		-							
	4.4 Sales Tax Act	Legal, FIN, CSD, MIS	FIN		-							
	4.5 Electricity Act & rules	Legal, CSD	CSD		-							
	4.6 Theft Ordinance CPC	Ops, Legal	CSD		-							
	4.7 Industrial Relations	HR, Legal	HR		-							
	4.8 Other labor laws	HR, Legal	HR		-							
	4.9 PPRA Rules	Dev, P&E	P&E		-							
	4.10 Distribution License	Ops, T&G, P&E, Dev, CSD, FIN	FIN		-							
	4.11 NEPRA Act & Rules	All	FIN		-							
	4.12 Compliance with	Dev	Dev		-							
	4.13 Power Sale Agreement with CPPA	Legal, FIN, CSD, T&G	FIN		-							
5.0 Make PESCO a socially responsible corporate entity	5.3 Campaign for energy conservation	P&E, PR	PR	No of campaigns	Limited Campaigns	DISCOs wide					Communication Head	Stakeholders Communication Plan

In the above table the goals for PESCO are divided into five major categories (i) Improve operational efficiency (this includes technical (transmission and distribution systems operational efficiency⁷), financial, commercial, human resource, employee safety etc. (ii) Customers Services and Care, (iii) Improve DISCOs Infrastructure (with only top priority projects under the four heads defined that need highest of attention), (iv) Comply with applicable laws and regulations and (v) The initiatives that the DISCO may take to make it more socially responsible corporate entity.

⁷ NEPRA Performance Standards (Distribution) Rules, 2005 and Distribution Codes were consulted while preparing these objectives

ii. Rationale for Setting Goals and Objectives and the Planning Criteria for Proposed Investments

The goals and objectives that have been narrated under DIIP-4 were prepared after extensive discussions and coordination efforts within PESCO. These are the targets that PESCO has set and the projects / initiatives have been identified to meet these set targets. The resources requirements for the best case were far more than the capacity PESCO to fund and execute. Initiatives have been identified and prioritized under the optimally achievable scenario keeping in view, the following factors:

- a. The reliable dispersal of power, especially the power that will be injected within PESCO in next five years, including the variable renewables
- b. Funding availability as PESCO can arrange funding only up to Rs. 47120 million as required under the achievable scenario and not Rs.118220 million as required under best case
- c. Capacity to procure and execute is another constraint that has limited PESCO's capability to implement the achievable scope, not the larger scope envisaged under best scenario developed
- d. Meeting the technical parameters specified in the Grid Code, Distribution code performance standards and consumer service manual
- e. Loss reduction from above 30% in FY2015 to 24% in FY2020, the loss improvement potential saturates as the losses are further decreased and improving/maintaining collections
- f. Improving internal controls, faster information availability and quality of data through back-office automation
- g. Improving the competencies of the employees and their morale, through training capacity building and incentives
- h. Improving corporate brand image by improving internal and external communications
- i. Safety of line-staff is a key part of DIIP, includes special focus on LM safety
- j. Return on investment is also considered while planning and prioritizing the interventions
- k. Other objectives (social uplift e.g. village electrification) are part of the plan as well

Section -V

Projects and Programs – Scope

A. Secondary Transmission System

This section covers scope for the expansion and rehabilitation of secondary transmission network (132 kV and or 66 kV) of PESCO.

PESCO has prepared two Scenarios and the related scope. **Scenario-1** (the Best Case), that if implemented would have completely revamped the transmission network and enabled the DISCOs to achieve the NEPRA's specified Performance Standards Distribution and provision of the Distribution Code, specially the Distribution Planning Code issued by NEPRA.

The company has also prepared a **Scenario-2** (the Optimally Achievable Case) based on its procurement, execution and especially the ability to raised funding. The Multi Year Tariff (MYT) is based on based on the Optimally Achievable Case scope and costs.

The proposed sub Transmission Lines and Grid Stations works for DISCO also includes the scope for "Deposit Work" and these works are separately identified in the formats below:

▪ Load Flow Studies for Best Case and Optimally Achievable Cases

This section covers the load low flow peak-cases for of the five years (FY2016-20). The assumptions and results of these studies are discussed under this section and detailed plots are referred in the Annexures. Special situation, for instance, integration with Solar Power (large induction) over a specified period in PESCO has been paid special attention in the studies.

As per NEPRA's guidelines provided in the DIIP formats, PESCO has prepared two Scenarios and the related scope. **Scenario-1** (the Best Case), that if implemented will completely revamp the transmission network and enable the DISCOs to achieve the NEPRA's specified Performance Standards Distribution and provision of the Distribution Code, specially the Distribution Planning Code issued by NEPRA.

Further, the company has also prepared a **Scenario-2** (the Optimally Achievable Case) based on its procurement / execution capacity and availability / capacity to raise funding for the investments. Detailed system studies for the future years (based on two scenarios as defined above) have been carried out to determine the justification of the proposed sub-projects in PESCO area under five year DIIP and to assess their impact on the system transmission network.

The other objectives of the studies are identification of any reinforcements required with the proposed sub-projects in terms of new lines, new substations transformer addition/augmentation, reactive power compensation and switchgear addition/replacement at the substations, in addition to the already planned/under execution projects in PESCO. The benefits of the proposed sub-projects to the network of PESCO have also been determined through system studies and are discussed below.

Methodology of Analysis – Load Flow Studies

The methodology of system studies/analysis for both scenarios (best and achievable scenarios) is given as under:

- i. Under this DIIP, PESCO's network expansion plan including already planned/under-execution projects have been included
- ii. The proposed sub-projects to be implemented have been identified through load flow studies and identified separately
- iii. The complete system model of the National Grid has been simulated, i.e., system network of not only the PESCO but also of NTDC and the neighboring DISCOs have been simulated for the purpose of analysis
- iv. The assumptions on which the system studies are based have been mentioned with necessary details below
- v. Two type of analysis, i.e., load flow and short circuit, have been carried out and their results have been presented in the report
- vi. Load flow analysis has been carried out for the steady state normal system operating condition in order to:
 - Assess adequacy of the network to feed the proposed sub- projects
 - Determine any additional transmission reinforcement and/or reactive compensation requirement for the scope of work of sub-projects
 - Justification of proposed projects
 - Determine the benefits of the above proposed works at substations and transmission lines in terms of reduction in transmission losses, improvement in voltage profile, reduction in loading of transmission lines or transformers, spare capacity margin in the transmission system
- vii. Short circuit analysis has been carried out to compute 3-phase and 1-phase short circuit levels at the substations. A comparison between the computed short levels and short circuit rating of the installed switchgear equipment at the existing substations has also been made in the vicinity of the proposed sub-projects in order to assess whether any switchgear equipment is appropriate or will become under-rated after the commissioning of the proposed sub-project(s). Recommendations for under-rated switchgear have also been made where needed, which essentially is replacement, also made part of scope. The short circuit analysis are used from Tranche-III recently carried out
- viii. Conclusions and recommendations on the basis of technical analyses have been presented at the end

Assumptions – Load Flow Studies

The load flow studies are based on the following assumptions:

- i. Latest PMS load forecast, attached as Annexure 3. The diversified values of the peak projected loads on substations, existing and new, have been modeled as per latest PMS load forecast. The loads have been adjusted as per the ratio between PESCO Peak including load shedding and the algebraic sum of recorded individual peaks of the substations of PESCO. This diversified peak is modeled in the load flow cases for FY 2016 to FY 2020 that helps in identifying scope for transmission lines
- ii. The scope of substation is derived from their individual undiversified peaks separately in excel based models. This scope identified is then modeled in the load flow cases
- iii. Generation expansion plan utilized in the load flow studies is attached at Annex-4. All the existing as well as the proposed power plants, both in public and private sectors have been

assumed in operation in all the study scenarios as per their expected commissioning schedules

- iv. Latest PESCO's planned/on-going transmission expansion/re-enforcement projects, including substations (extension, augmentation, conversion, new), transmission lines have also been simulated in the studies as per their expected commissioning schedules

Study Criteria– Load Flow Studies

The load flow studies have been carried out keeping in view the following criteria in the PESCO's network:

Best Case

- Voltage Limits: $\pm 5\%$ under normal operating conditions
- Loading of transmission lines and transformers have been kept within 100% of their capacities under normal operating conditions.
- N-1 contingency analysis has been carried out and additional scope to meet that criteria is also simulated

Optimally Achievable Case

- Voltage Limits: $\pm 5\%$ under normal operating conditions
- Loading of transmission lines and transformers have been kept within 100% of their capacities under normal operating conditions.
- N-1 contingency analysis has not been carried out under this option as it would be require further reinforcement in PESCO's transmission network for which PESCO at this stage has no firm financing

Results of Load Flow Studies

Load flow studies have been carried out with already planned/on-going projects; and with & without proposed subprojects in 5 year plan to study their impact on the system network. The system scenarios of peak load conditions of years 2015 to 2020 have been simulated.

The year wise Single line diagram of the system showing voltage profile and MW/MVAR flows are Annexed- 5 for Best Case (FY2016 to Fy2020) and Annexure-5 for optimally achievable (FY2016 to Fy2020):

i. Year Wise Voltage Profile

It is evident from the study exhibits that voltage profile will improve and becomes within permissible limits.

ii. Year Wise Loading Position - For Grids refer to the Excel Sheet and for T/Lines refer to plots of Load Flow

Load flow studies have also been carried out for both Best and optimally achievable system scenario with the proposed rehabilitation in form of Conversions, 132 kV Capacitors and New transmission Lines and year wise loading position of Grid Stations and Transmission lines are attached (Annexure-1)

iii. Reduction In Transmission Losses

Year	MW		Units (MKWh)	
	Ideal	Realistic	Ideal	Realistic
2015-16	22.8	20.5	110.45	98.77
2016-17	19.8	15.5	95.92	74.68
2017-18	12.7	12.7	61.52	61.19
2018-19	12.8	12.8	60.01	61.67
2019-20	7	5	33.91	24.09

▪ **Expansion and Rehabilitation (Best Case) - Scope**

The scope of Work for Best Case is tabulated here under:

a. **Grid Stations (Best Case)**

DIIP 5 - Grid Stations (Best Case)

Sr. No	Description	Total No.	Total Capacity (MVA)	2015-16 (No)	2016-17 (No)	2017-18 (No)	2018-19 (No)	2019-20 (No)
1	New							
a	132 KV	38	1566	2	4	5	5	22
2	Conversion							
a	66 to 132 KV	8	286		1	1	2	4
b	33 to 132 KV	1	26		1			
3	Augmentation							
a	132 KV	9	117.5	1	0	2	2	4
b	66 KV							
4	Extension (Transformer)							
a	132 KV	8	237	1	4	1	2	0
b	66 KV	1	13	1				
5	Rehabilitation							
a	132 KV	2				2		
b	66 KV							

Year	Scope of Work					
	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Projects with Available Finances (Tr-III, Tr-IV) ADB						
New Grid		2				2
Conversion		2				2
T/Line (Total)		40				40
Augmentation	26					26
Extension		6	4			10
Spare Transformer		2				2
Capacitor						

b. Transmission Lines (Best Case)

i. New Line(Best Case)

DIIP 6 – Transmission Lines : New Line (Best Case)

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	451	30	99	87	80	155
2	132 KV SDT	414	78	18	74	55	189

ii. Rehabilitation/Reconductoring/Up-gradation (Best Case)

DIIP 7 – Transmission Lines: Rehabilitation/ Reconductoring / Up-gradation (Best Case)

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	3	-	-	2	1	-
2	132 KV SDT	159	-	23	-	16	120
3	132 KV Addl: CKT	76				56	20

iii. Reconductoring and Rerouting (Best Case)

DIIP 8 – Transmission Lines: Reconductoring and Rerouting (Best Case)

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	20	-	-	-	-	20
2	132 KV SDT	0	-	-	-	-	0

iv. Capacitor (Best Case)

DIIP 9 – Transmission Lines: Capacitors (Best Case)

Nil

▪ Expansion and Rehabilitation (Optimally Achievable Case) - Scope

The scope of Work for Achievable Case is tabulated here under:

a. Grid Stations (Optimally Achievable Case)

DIIP 10 - Grid Stations Optimally Achievable Case

Sr. No	Description	Total No.	Total Capacity (MVA)	2015-16 (No)	2016-17 (No)	2017-18 (No)	2018-19 (No)	2019-20 (No)
1	New							
a	132 KV	20	834	2	3	5	5	5
2	Conversion							
a	66 to 132 KV	8	286	1	0	1	2	4
b	33 to 132 KV	1	26		1			
3	Augmentation							
a	132 KV	9	117.5	1	0	2	2	4
b	66 KV			-				
4	Extension (Transformer)							
a	132 KV	7	211	3	2	0	2	0
b	66 KV	1	13	1				
5	Rehabilitation							
a	132 KV	2				2		
b	66 KV							

Year	Scope of Work					
	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Projects with Available Finances (Tr-III, Tr-IV) ADB						
New Grid	0	2	0	0	0	2
Conversion	0	2	0	0	0	2
T/Line (Total)	0	0	40	0	0	40
Augmentation	26	1	0	0	0	27
Extension	0	6	4	0	0	10
Capacitor						

b. Transmission Lines (Optimally Achievable Case)

i. New Line

DIIP 11 - Transmission Lines (Optimally Achievable): New Line

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	314	30	75	87	80	42
2	132 KV SDT	248	78	18	44	55	53

ii. Rehabilitation/Reconductoring/Up-gradation

DIIP 12 - Transmission Lines (Optimally Achievable): Rehabilitation/Reconductoring/Up-gradation

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	6	3		2	1	
2	132 KV SDT	156		20		16	120
3	132 KV Addl: Ckt	76				56	20

iii. Reconductoring and Rerouting

DIIP 13 - Transmission Lines (Optimally Achievable): Reconductoring and Rerouting

Sr. No.	Description	Total Length (km)	2015-16 (Km)	2016-17 (Km)	2017-18 (Km)	2018-19 (Km)	2019-20 (Km)
1	132 KV D/C	20					20
2	132 KV SDT	0					0

iv. Capacitors

DIIP 14 - Transmission Lines (Optimally Achievable): Capacitors

Nil

▪ Short Circuit Studies

Short circuit studies have been carried out for the scenario of year 2020 of entire network to compute maximum 3-phase and 1-phase fault levels. The computed fault levels have been compared with the short circuit rating of the installed switchgear equipment at the substations to identify any under-rated switchgear in the existing substation.

The maximum short circuit levels have been computed with the following assumptions under IEC 909 standard by setting:

- Transformers tap ratio to unity
- Line charging to zero
- Shunt elements to zero under in positive sequence
- Voltage at 1.1 p.u

As per above short circuit study results, following rating of switchgear is recommended while keeping margin for future network expansion:

- 40 kA for 132 kV
- 40 kA for 11 kV, especially for power transformers.

It has been found that the short circuit levels, as a result of the induction of the proposed subprojects, will not increase at the existing substations in their vicinity.

B. Plan for Expansion and Rehabilitation Distribution System – Scope

Under this section, the Expansion and Rehabilitation (two scenarios Best and Optimally Achievable) are presented and the Status of Study Based Distribution System Planning Based on GIS Mapping and the Rollout Plans are also discussed.

This section covers the expansion and rehabilitation of distribution network (11kV and below) of the distribution company.

PESCO has prepared two Scenarios and the related scope. **Scenario-1** (the Best Case), that if implemented will completely revamp the distribution network and enable the DISCOs to achieve the NEPRA's specified Performance Standards for Distribution and the provisions of the Distribution Code, especially the Distribution Planning Code issued by NEPRA.

PESCO has also prepared a **Scenario-2** (the Optimally Achievable Case) based on its procurement and execution capacity and will make the MYT rate case based on this scenario.

The proposed distribution works for PESCO also includes the scope for "Deposit Works" and "Village Electrification Works" and these works are separately identified in the formats below.

Below is the overall synopsis - HT/LT ratios of distribution system and length per feeder of 11 kV lines' comparison:

Existing HT/LT Ratios and length per feeder of 11 kV lines:

- Existing HT to LT Ratio = 1:1.5
- Existing average length of 11-KV feeder = 40 Km

After completion of **Best Case** of the 5 year plan (DIIP), the above parameters will be as under:

- HT to LT Ratio = 1.5:1
- Average length of 11-KV feeder = 20 Km

After completion of Optimally Achievable Case of the 5 year plan (DIIP), the above parameters will be as under:

- HT to LT Ratio = 1:1
- Average length of 11-KV feeder = 30 Km

Due to increased HT/LT ratio and decrease in HT average length per feeder, the technical loss of the distribution system will be decreased. This will further result in reduction of system outages making it more efficient and reliable.

▪ **Expansion and Rehabilitation (Best Case)**

The table DIIP 15 captures the complete scope under Best Case for distribution system:

DIIP 15 - Distribution System (Best Case)

Sr. No	Description	Unit	Quantities					
			2015-16	2016-17	2017-18	2018-19	2019-20	Total
Scope of Work for 11 kV and Below Expansion								
A.								
1	Expansion of HT Lines							
	Number of proposals	Nos	25	45	50	51	53	224
	Length of new HT line	Km	373	672	747	762	791	3345
	Reconductoring	Km	250	450	500	510	530	2240
2	Transformers							
	a. 25 KVA	Nos	2000	2650	2750	2850	3001	13251
	b. 50 KVA	Nos	1500	2088	2200	2350	2298	10436
	c. 100 KVA	Nos	200	300	340	367	380	1587
	d. 200 KVA	Nos	500	810	850	900	990	4050
	e. others KVA	Nos						
	Sub Total		4200	5848	6140	6467	6669	29324
3	11 KV Capacitors							
	a. Fixed 450 KVAR	Nos	25	45	50	51	53	224
	b. Fixed 900 KVAR	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. Others	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		25	45	50	51	53	224
4	11 KV Panel	Nos	25	45	50	51	53	224
5	11kV 500 MCM Cable	km	8	14	15	15	16	67
Scope of Work for LT Expansion								
B.								
1	New LT Lines							
	Number of proposals	Nos	4200	5848	6140	6467	6669	29324
	Length of new LT line (Total Wasp+ANT)	Km	2520	3509	3684	3880	4001	17594
2	LT Capacitors							
	a. Different KVARs	Nos	Nil	Nil	Nil	Nil	Nil	Nil
3	Other Equipment's and Material							
	a. Single Phase Meters	Nos	250000	240000	230000	220000	210000	1150000
	b. Three Phase Meters	Nos	61683	54112	49437	47706	45926	258864
	c. MDI	Nos	500	400	350	300	300	1850
	Sub Total		312183	294512	279787	268006	256226	1410714

Scope of Cost Deposit Work								
C.	Village Electrification							
	1 New HT Lines							
	Length of new HT line	Km	315.7	378.8	420.9	463	526.1	2104.6
	2 New LT Lines							
	Length of new LT line	Km	757.9	909.5	1010.5	1111.6	1263.2	5052.7
	3 Transformers							
	a. 25 KVA	Nos	261	313	348	383	435	1740
	b. 50 KVA	Nos	797	956	1062	1168	1328	5311
	c. 100 KVA	Nos	288	346	385	423	481	1923
	d. 200 KVA	Nos	27	33	37	40	46	183
	e. others KVA	Nos						
	Sub Total		1373	1648	1831	2014	2289	9156
D.	Independent Feeder							
	1 New HT Lines							
	Length of new HT line	Km	20	39	41	45	50	195
	2 New LT Lines							
	Length of new LT line	Km	Nil	Nil	Nil	Nil	Nil	Nil
	3 Transformers							
	a. 25 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	b. 50 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. 100 KVA	Nos	15	35	39	41	44	175
	d. 200 KVA	Nos	5	12	13	14	15	58
	e. others KVA	Nos						
	Sub Total		20	47	52	55	59	233
	4 11 KV Panel	Nos	10	22	24	26	28	110

Methodology

The distribution Voltage is 11 KV on HT and 0.4 KV on LT system. Estimation of material requirement is made on the basis of SDI. All aspects are considered while deciding the design and requirement of material e.g. requirement of new line for urban as well as for Rural area. For reconductoring of urban area's line as well as rural area are considered keeping in view the size of conductor as well. Different type of assemblies are selected which is used commonly and estimation for a specific assembly is made separately.

For economical and safety purpose, PC Poles will be utilized along with Steel structure for extension of HT/LT lines in the areas under electrification. The ratio of steel structures and PC'

poles will be maintained as 10:90. ACSR and AAC will be used for the purpose of current carrying from the Grid Station to the point of DS/utilization. 25 KVA, 50 KVA, 100 KVA, 200 KVA sizes of Distribution Transformers will be used. Span length of structures and P.C Poles has been worked out according to SDI so as to ensure adequate clearance, safety as well as avoiding obstruction in normal life.

Evaluation of Material Requirements

Scope of material requirements under the Distribution Expansion Project is calculated as per data collected upto 05/2015 and detailed in the following section.

The Expansion BOQs for different DOP measures have been developed as follows:

New 11 KV Switchgear (Control Panels)

11 KV panels to be added according to the following break-up:

Panels for express feeders to be built for	
Shifting/bifurcation of existing feeders	224 Nos

ACSR Conductors for new express line construction

It is estimated that 224-Nos feeders will require construction of express lines for their bifurcation. On the average 15 km of 3-phase HT line will be constructed per feeder based on historical construction data. The overall share of different ACSR conductors in the total of 3345 km of lines is estimated based on historical construction data and the segregate is given as below:

Km Line

Osprey	65.63%	3345 x 0.6563	2195 Km
Dog	33.48%	3345 x 0.3348	1120 Km
Rabbit	0.88%	3345 x 0.0088	<u>30 Km</u>
		Total	3345 Km

Calculation of Material for 11 KV System Rehabilitation

(i) 11 kV Line Re-conductoring

Estimated re-conductoring per feeder based on sample studies, works out to be = 10 Km

Estimated % share of different Conductors in re-conductoring:

Osprey	50%
Dog	40%
Rabbit	10%

Number of feeders for rehabilitation ~~224~~ 224 Nos.

Therefore, total re-conductoring length 224 x 10 2240 Km

The quantities of ACSR conductors required for re-conductoring are therefore:

Km Line

Osprey	50%	2240 x 0.500	1120 KM
Dog	40%	2240x 0.400	896 KM
Rabbit	10%	2240 x 0.10	<u>224 KM</u>
			Total 2240 KM

(ii) Capacitor Applications for Power Factor Improvement

The sample studies indicate that at an average, one capacitor bank of 450 kVAR is needed per feeder for improving the power factor to 95% from existing average power factor of 85% on the selected feeders. For 224 No. 11 kV feeders, requirement of capacitor banks of 450 kVA each will, therefore, be 224 Nos.

(iii) Augmentation of Over-loaded Transformers

The number of transformers required for replacement against overloading is worked out as follows:

Total MVA installed in PESCO = 4564

Total Numbers of Customers in PESCO = 2945123

Installed KVA Per One Customer = 1.57

Total MVA required for the network = 2186

50 % will be adjusted in DOP and 50 % in ELR.

Share of Transformers required for Augmentation

25 kVA	13251 Nos.
50 kVA	10436 Nos.
100 kVA	1587 Nos.
200 kVA	450 Nos.

Total: 29324 Nos.

(vi) New LT Lines

Each new transformer is estimated to have at least three LT circuits of (600 M). Based on this estimation, the LT line conductor is calculated as follows:

$$\text{Total LT line required: } \frac{600 \times 29324}{1000} = 17594 \text{ Km}$$

The final estimated conductor lengths are therefore:

New 3-φ LT line (Wasp)	4399 km
New 3-φ LT line (Ant)	13196 km

(vii) LT Line Reconductoring

The average LT line reconductoring per LT rehabilitation proposal is estimated based on historical as:

3-φ, Wasp conductor line		0.25 km
3-φ, Ant Conductor line		0.25 km
LT line reconductoring (3-φ, Wasp)	29324 x 0.25	7331 km
LT line reconductoring (3-φ, Ant)	29324 x 0.25	7331 km

(ix) Energy Meters

The requirement of energy meters for installation of new meters is estimated as per PMS data. Year wise installation of meters is estimated according to the increase in the growth rate for next five year.

Village Electrification:

- The estimation of scope of work in next five years is based on the historical data of the financial years 2011-12, 2012-13, 2013-14 & 2014-15
- The 25 KVA transformers are considered as 19 %, 50 KVA as 58%, 100 KVA as 21% and 200 KVA transformers are considered as 2 % of the total transformers
- HT conductor percentage is assumed as 5% Osprey, 15 % 'Dog' and 80 % 'Rabbit'
- LT conductor assumed to be 'Ant' as 20% and Wasp as 80%.

Dedicated 11-kv Feeders:

- The estimation of scope of work in next five years is based on the historical data of the financial years 2011-12, 2012-13, 2013-14 & 2014-15
- HT conductor percentage is assumed as 50 % 'Osprey', 30 % 'Dog' and 20 % 'Rabbit'

- 200 KVA transformers are considered as 40 % and 100 KVA transformers are considered as 60 % of the total transformers.

Scope of Work for 11 kV and Below Rehabilitation								
A.								
1	Rehabilitation of HT Lines							
	Number of proposals	Nos	25	45	50	51	53	224
	New Line	Km	373	672	747	762	791	3345
	Reconductoring	Km	250	450	500	510	530	2240
	Re-routing	Km	Nil	Nil	Nil	Nil	Nil	Nil
2	New Transformers							
	a. 25 KVA	Nos	2000	2650	2750	2850	3001	13251
	b. 50 KVA	Nos	1500	2088	2200	2350	2298	10436
	c. 100 KVA	Nos	200	300	340	367	380	1587
	d. 200 KVA	Nos	500	810	850	900	990	4050
	e. others KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		4200	5848	6140	6467	6669	29324
3	Installation of 11 kV Panels	Nos	25	45	50	51	53	224
4	11kV 500 MCM Cable	km	8	14	15	15	16	67
Scope of Work for LT Rehabilitation								
B.								
1	LT Lines Rehabilitation							
	New LT Line	Km	1050	1462	1535	1617	1667	7331
	Reconductoring of LT Line	Km	840	1170	1228	1293	1334	5865
2	Other Equipments and Material							
	a. Single Phase Meters	Nos	11000	48411	46211	44010	41810	191442
	b. Three Phase Meters	Nos	1000	5000	6000	6500	7000	25500
	Sub Total		12000	53411	52211	50510	48810	216942

The narrative, assumptions and details explaining the scope above are hereunder:

Methodology for Rehabilitation

The distribution Voltage is 11 KV on HT and 0.4 KV on LT system. Estimation of material requirement is made on the basis of SDI. All aspects are considered while deciding the design and requirement of material e.g. requirement of new line for urban as well as for Rural area. For reconductoring of urban area's line as well as rural area are considered keeping in view the size of conductor as well. Different type of assemblies are selected which is used commonly and estimation for a specific assembly is made separately.

For economical and safety purpose, PC Poles will be utilized along with Steel structure for extension of HT/LT lines in the areas under electrification. The ratio of steel structures and PC poles will be maintained as 10:90. ACSR and AAC will be used for the purpose of current carrying from the Grid Station to the point of DS/utilization. 25 KVA, 50 KVA, 100 KVA, 200 KVA sizes of Distribution Transformers will be used. Span length of structures and P.C Poles has been worked out according to SDI so as to ensure adequate clearance, safety as well as avoiding obstruction in normal life.

Evaluation of Material Requirements

Scope of material requirements under the Distribution Rehabilitation Project is calculated as per data collected upto 05/2015 and detailed in the following section.

The Expansion BOQs for different ELR measures have been developed as follows:

New 11 KV Switchgear (Control Panels)

11 KV panels to be added according to the following break-up:

Panels for express feeders to be built for Shifting/bifurcation of existing feeders	224 Nos

ACSR Conductors for new express line construction

It is estimated that 224-Nos feeders will require construction of express lines for their bifurcation. On the average 15 km of 3-phase HT line will be constructed per feeder based on historical construction data. The overall share of different ACSR conductors in the total of 3345 km of lines is estimated based on historical construction data and the segregate is given as below:

Km Line

Osprey	65.63%	3345 x 0.6563	2195 Km
Dog	33.48%	3345 x 0.3348	1120 Km
Rabbit	0.88%	3345 x 0.0088	<u>30 Km</u>
Total			3345 Km

Calculation of Material for 11 KV System Rehabilitation

(i) 11 kV Line Re-conductoring

Estimated re-conductoring per feeder based on sample studies, works out to be = 10 Km

Estimated % share of different Conductors in re-conductoring:

Osprey	50%
Dog	40%
Rabbit	10%

Number of feeders for rehabilitation 224 Nos.

Therefore, total re-conductoring length 224×10 2240 Km

The quantities of ACSR conductors required for re-conductoring are therefore:

Km Line

Osprey	50%	2240×0.500	1120 KM
Dog	40%	2240×0.400	896 KM
Rabbit	10%	2240×0.10	<u>224 KM</u>
			Total 2240 KM

(ii) Capacitor Applications for Power Factor Improvement

The sample studies indicate that at an average, one capacitor bank of 450 kVAR is needed per feeder for improving the power factor to 95% from existing average power factor of 85% on the selected feeders. For 224 No. 11 kV feeders, requirement of capacitor banks of 450 kVA each will, therefore, be 224 Nos.

(iii) Installation of New Transformers

The number of new transformers required for installation is worked out as follows:

Total MVA installed in PESCO = 4564

Total Numbers of Customers in PESCO = 2945123

Installed KVA Per One Customer = 1.57

Total MVA required for the network = 2186

50 % will be adjusted in DOP and 50 % in ELR.

Share of Transformers required for Augmentation

25 kVA	13251 Nos.
50 kVA	10436 Nos.
100 kVA	1587 Nos.
200 kVA	450 Nos.

Total: 29324 Nos.

(vi) New LT Lines

Each new transformer is estimated to have at least three LT circuits of (250 M). Based on this estimation, the LT line conductor is calculated as follows:

$$\text{Total LT line required: } \frac{250 \times 29324}{1000} = 7331 \text{ Km}$$

The final estimated conductor lengths are therefore:

New 3-φ LT line (Wasp)	2932 km
New 3-φ LT line (Ant)	4399 km

(vii) LT Line Reconductoring

The average LT line reconductoring per LT rehabilitation proposal is estimated based on historical as:

3-φ, Wasp conductor line		0.1 km
3-φ, Ant Conductor line		0.1 km
LT line reconductoring (3-φ, Wasp)	29324 x 0.1	2932 km
LT line reconductoring (3-φ, Ant)	29324 x 0.1	2932 km

(ix) Energy Meters

The requirement of energy meters for replacement of defective meters is estimated as per Historic data which is distributed year wise.

▪ **Expansion and Rehabilitation (Optimally Achievable Case) - Scope**

The table DIIP 16 captures the complete scope under Achievable Case for distribution system:

DIIP 16 - Distribution System (Optimally Achievable Case)

Sr. No	Description	Unit	Quantities					
			2015-16	2016-17	2017-18	2018-19	2019-20	Total
Scope of Work for 11 kV and Below Expansion								
A.								
1	New HT Lines							
	Number of proposals	Nos	20	29	37	53	60	199
	Length of new HT line	Km	299	433	552	791	896	2971
2	Transformers							
	a. 25 KVA	Nos	130	140	140	160	160	730
	b. 50 KVA	Nos	300	350	400	500	550	2100
	c. 100 KVA	Nos	240	260	300	367	400	1567
	d. 200 KVA	Nos	85	85	90	95	100	455
	e. others KVA	Nos						
	Sub Total		755	835	930	1122	1210	4852
3	11 KV Capacitors							
	a. Fixed 450 KVAR	Nos	20	29	37	53	60	199
	b. Fixed 900 KVAR	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. Others	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		20	29	37	53	60	199
4	11 KV Panel	Nos	20	29	37	53	60	199
5	11kV 500 MCM Cable	km	6	9	11	16	18	60
Scope of Work for LT Expansion								
B.								
1	New LT Lines							
	Number of proposals	Nos	755	835	930	1122	1210	4852
	Length of new LT line (Total Wasp+ANT)	Km	453	501	558	673	726	2911
2	LT Capacitors							
	a. Different KVARs	Nos	Nil	Nil	Nil	Nil	Nil	Nil
3	Other Equipments and Material							
	a. Single Phase Meters	Nos	13000	13500	14000	15000	15500	71000
	b. Three Phase Meters	Nos	450	500	550	600	650	2750
	c. MDI	Nos	150	200	250	250	300	1150
	Sub Total		13600	14200	14800	15850	16450	74900

								0
Scope of Cost Deposit Work								
C.	Village Electrification							
1	New HT Lines							
	Length of new HT line	Km	237	280	307	152	161	1137
2	New LT Lines							
	Length of new LT line	Km	230	290	322	162	180	1184
3	Transformers							
	a. 25 KVA	Nos	48	50	52	35	42	227
	b. 50 KVA	Nos	100	150	155	75	90	570
	c. 100 KVA	Nos	35	40	42	21	23	161
	d. 200 KVA	Nos	25	25	26	15	17	108
	e. others KVA	Nos						
	Sub Total		208	265	275	146	172	1066
D.	Independent Feeder							
1	New HT Lines							
	Length of new HT line	Km	20	39	41	39	38	177
2	New LT Lines							
	Length of new LT line	Km	Nil	Nil	Nil	Nil	Nil	Nil
3	Transformers							
	a. 25 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	b. 50 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. 100 KVA	Nos	15	35	39	35	35	159
	d. 200 KVA	Nos	5	12	13	13	13	56
	e. others KVA	Nos						
	Sub Total		20	47	52	48	48	215
4	11 KV Panel	Nos	10	22	24	23	23	102

Methodology

The distribution Voltage is 11 KV on HT and 0.4 KV on LT system. Estimation of material requirement is made on the basis of SDI. All aspects are considered while deciding the design and requirement of material e.g. requirement of new line for urban as well as for Rural area. For reconductoring of urban area's line as well as rural area are considered keeping in view the size of conductor as well. Different type of assemblies are selected which is used commonly and estimation for a specific assembly is made separately.

For economical and safety purpose, PC Poles will be utilized along with Steel structure for extension of HT/LT lines in the areas under electrification. The ratio of steel structures and PC poles will be maintained as 10:90. ACSR and AAC will be used for the purpose of current carrying from the Grid Station to the point of DS/utilization. 25 KVA, 50 KVA, 100 KVA, 200 KVA sizes of Distribution Transformers will be used. Span length of structures and P.C Poles has been worked out according to SDI so as to ensure adequate clearance, safety as well as avoiding obstruction in normal life.

Evaluation of Material Requirements

Scope of material requirements under the Distribution Expansion Project is calculated and detailed in the following section.

The Expansion BOQs for different DOP measures have been developed as follows:

New 11 KV Switchgear (Control Panels)

11 KV panels to be added according to the following break-up:

Panels for express feeders to be built for Shifting/bifurcation of existing feeders	199 Nos

ACSR Conductors for new express line construction

It is estimated that 199-Nos feeders will require construction of express lines for their bifurcation. On the average 15 km of 3-phase HT line will be constructed per feeder based on historical construction data. The overall share of different ACSR conductors in the total of 2971 km of lines is estimated based on historical construction data and the segregate is given as below:

Km Line

Osprey	65.63% 2971 x 0.6563	1950 Km
Dog	33.48% 2971 x 0.3348	995 Km
Rabbit	0.88% 2971 x 0.0088	<u>26 Km</u>
		Total 2971 Km

Calculation of Material for 11 KV System Rehabilitation

(i) 11 kV Line Re-conductoring

Estimated re-conductoring per feeder based on sample studies, works out to be = 10 Km

Estimated % share of different Conductors in re-conductoring:

Osprey	50%
Dog	40%
Rabbit	10%

Number of feeders for rehabilitation 199 Nos.

Therefore, total re-conductoring length 199 x 10 1990 Km

The quantities of ACSR conductors required for re-conductoring are therefore:

Km Line

Osprey	50%	1990 x 0.500	995 KM
Dog	40%	1990 x 0.400	796 KM
Rabbit	10%	1990 x 0.10	<u>199 KM</u>
			Total 1990 KM

(ii) Capacitor Applications for Power Factor Improvement

The sample studies indicate that at an average, one capacitor bank of 450 kVAR is needed per feeder for improving the power factor to 95% from existing average power factor of 85% on the selected feeders. For 199 No. 11 kV feeders, requirement of capacitor banks of 450 kVAR each will, therefore, be 199 Nos.

(iii) Augmentation of Over-loaded Transformers

The number of transformers required for replacement against overloading is worked out as follows:

Share of Transformers required for Augmentation

25 kVA	730	Nos.
50 kVA	2100	Nos.
100 kVA	1567	Nos.
200 kVA	455	Nos.

Total: 4852 Nos.

(vi) New LT Lines

Each new transformer is estimated to have at least three LT circuits of (600 M). Based on this estimation, the LT line conductor is calculated as follows:

Total LT line required: $600 \times 4852 = 2911 \text{ Km}$

1000

The final estimated conductor lengths are therefore:

New 3-φ LT line (Wasp)	728 km
New 3-φ LT line (Ant)	2183 km

(vii) LT Line Reconductoring

The average LT line reconductoring per LT rehabilitation proposal is estimated based on historical as:

3-φ, Wasp conductor line		0.25 km
3-φ, Ant Conductor line		0.25 km
LT line reconductoring (3-φ, Wasp)	4852 x 0.25	1213 km
LT line reconductoring (3-φ, Ant)	4852 x 0.25	1213 km

(ix) Energy Meters

The requirement of energy meters for installation of new meters is estimated as per our demand for each year.

Scope of Work for 11 kV and Below Rehabilitation		unit	2015-16	2016-17	2017-18	2018-19	2019-20	Total
A.								
1	Rehabilitation of HT Lines							
	Number of proposals	Nos	16	19	21	26	28	110
	Bifurcation	Nos	16	19	21	26	28	110
	Reconductoring	Km	160	190	210	260	280	1100
	Re-routing	Km	Nil	Nil	Nil	Nil	Nil	Nil
2	New Transformers							
	a. 25 KVA	Nos	110	120	120	130	140	620
	b. 50 KVA	Nos	250	300	320	343	360	1573
	c. 100 KVA	Nos	200	220	240	260	280	1200
	d. 200 KVA	Nos	70	80	80	85	80	395
	e. others KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		630	720	760	818	860	3788
3	Installation of 11 kV Panels	Nos	16	19	21	26	28	110
4	11kV 500 MCM Cable	km	5	6	6	8	8	33

Scope of Work for LT Rehabilitation								
B.								
1	LT Lines Rehabilitation							
	New LT Line	Km	126	144	152	164	172	758
	Reconductoring of LT Line	Km	95	108	114	123	129	568
2	Other Equipments and Material							
	a. Single Phase Meters	Nos	10000	11000	12000	13000	13500	59500
	b. Three Phase Meters	Nos	500	550	600	650	650	2950
	Sub Total		10500	11550	12600	13650	14150	62450

Methodology for Rehabilitation

The distribution Voltage is 11 KV on HT and 0.4 KV on LT system. Estimation of material requirement is made on the basis of SDI. All aspects are considered while deciding the design and requirement of material e.g. requirement of new line for urban as well as for Rural area. For reconductoring of urban area's line as well as rural area are considered keeping in view the size of conductor as well. Different type of assemblies are selected which is used commonly and estimation for a specific assembly is made separately.

For economical and safety purpose, PC Poles will be utilized along with Steel structure for extension of HT/LT lines in the areas under electrification. The ratio of steel structures and PC' poles will be maintained as 10:90. ACSR and AAC will be used for the purpose of current carrying from the Grid Station to the point of DS/utilization. 25 KVA, 50 KVA, 100 KVA, 200 KVA sizes of Distribution Transformers will be used. Span length of structures and P.C Poles has been worked out according to SDI so as to ensure adequate clearance, safety as well as avoiding obstruction in normal life.

Evaluation of Material Requirements

Scope of material requirements under the Distribution Rehabilitation Project is calculated and detailed in the following section.

The Expansion BOQs for different ELR measures have been developed as follows:

New 11 KV Switchgear (Control Panels)

11 KV panels to be added according to the following break-up:

Panels for express feeders to be built for	
Shifting/bifurcation of existing feeders	110 Nos

ACSR Conductors for new express line construction

It is estimated that 110-Nos feeders will require construction of express lines for their bifurcation. On the average 15 km of 3-phase HT line will be constructed per feeder based on historical construction data. The overall share of different ACSR conductors in the total of 1643 km of lines is estimated based on historical construction data and the segregate is given as below:

Km Line

Osprey	65.63%	1643×0.6563	1078 Km
Dog	33.48%	1643×0.3348	550 Km
Rabbit	0.88%	1643×0.0088	<u>15 Km</u>
		Total	1643 Km

Calculation of Material for 11 KV System Rehabilitation**(i) 11 kV Line Re-conductoring**

Estimated re-conductoring per feeder based on sample studies, works out to be = 10 Km

Estimated % share of different Conductors in re-conductoring:

Osprey	50%
Dog	40%
Rabbit	10%

Number of feeders for rehabilitation	110 Nos.
Therefore, total re-conductoring length 110×10	1100 Km

The quantities of ACSR conductors required for re-conductoring are therefore:

Km Line

Osprey	50%	1100×0.500	550 KM
Dog	40%	1100×0.400	440 KM
Rabbit	10%	1100×0.10	<u>110 KM</u>
		Total	1100 KM

(ii) Capacitor Applications for Power Factor Improvement

The sample studies indicate that at an average, one capacitor bank of 450 kVAR is needed per feeder for improving the power factor to 95% from existing average power factor of 85% on the selected feeders. For 110 No. 11 kV feeders, requirement of capacitor banks of 450 kVAR each will, therefore, be 110 Nos.

(iii) Installation of New Transformers

The number of new transformers required for installation is worked out as follows:

Share of Transformers required

25 kVA	620	Nos.
50 kVA	1573	Nos.
100 kVA	1200	Nos.
200 kVA	395	Nos.

Total: 3788 Nos.

(vi) New LT Lines

Each new transformer is estimated to have at least two LT circuits of (200 M). Based on this estimation, the LT line conductor is calculated as follows:

$$\text{Total LT line required: } \frac{200 \times 3788}{1000} = 758 \text{ Km}$$

The final estimated conductor lengths are therefore:

New 3-φ LT line (Wasp)	379 km
New 3-φ LT line (Ant)	379 km

(vii) LT Line Reconductoring

The average LT line reconductoring per LT rehabilitation proposal is estimated based on historical as:

3-φ, Wasp conductor line		0.05 km
3-φ, Ant Conductor line		0.1 km
LT line reconductoring (3-φ, Wasp)	3788 x 0.05	189 km
LT line reconductoring (3-φ, Ant)	3788 x 0.1	379 km

(ix) Energy Meters

The requirement of energy meters for replacement of defective meters is estimated as per Historic data which is distributed year wise.

▪ **Status of Study Based Distribution System Planning Based on GIS Mapping and the Transition Plan**

The status as per FY2014-15 on the mapping of HT and LT network and studies based on GIS mapped network on modern planning analysis tool(s) is provided in DIIP 17. Also, the plan to map the whole HT and LT network and subsequent conversion to planning based on GIS mapping using modern state of the art tools is given in table DIIP 17.

DIIP 17 - Study of Distribution System Planning Based on GIS Mapping and the Transition Plan

Sr. No.	Description	Unit	Quantities						
			2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
GIS Mapping									
1	HT Mapping								
	Number of 11 kV Feeders	Nos	327	513	50	90	100	103	1183
	Length of HT Lines mapped	Km	6065	33206	997	1794	1993	2053	46108
2	LT Mapping								
	Number of LT Lines	Nos	47	120	135	140	150	155	747
	Length of LT Lines mapped	Km	2742	7000	7875	8166	8750	9041	43574
3	Tools Required								
	GIS Mapping Software Licenses	Nos		20					
	Plotters	Nos		7					
	GPS devices	Nos		100					
	Computers	Nos		30					

Sr. No.	Description	Unit	Quantities						
			2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Study Based Planning using GIS Maps with Modern Planning Tools - Transition Plan									
1	Tools Required								
	Simulation Software Licenses	Nos		20					

PESCO is comprised of 843 number 11kV feeders having length of 43957 Km. PESCO is pioneer among the DISCO of Pakistan to start GIS activity of its distribution system and till 30th June 2015, 332 number 11 kV feeders have been digitized. PESCO has developed its resources with the help of USAID Power Distribution. Remaining feeders of PESCO will be completed

by PESCO at its own resources. However, digitization of LT network will be completed by out-sourcing.

After completion of HT network mapping and tendering process work, mapping of LT network will be started in FY 2017-18 and will be completed on 2018-19, whereas mapping of additional LT system will be carried out by PESCO resources.

In order to carry out GIS field survey and its updating, tools like GPS sets, computers, printers and SynerGEE licenses will be required.

C. Other Functional Improvement Plans:

i. Commercial Improvement Plan

This plan covers the commercial improvement activities including but not limited to metering (including AMRs), Hand Held Units based meter reading, improvement in billing systems, anti-theft initiatives, consumers database update, customers services improvement initiatives etc. The scope that what will be done in each of the five year under this business plan is provided here. The narrative shall is supported by justification.

DIIP 18 - Commercial Improvement Plan

Commercial Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	AMR Metering						
B	Electronic Metering						
C	New CIS system	350					350
D	HHUs for meter reading						
E	Consumer Census						
F	Anti-theft efforts						
G	IT infrastructure to support new initiatives						
F	Others etc...						
Total		350					350

The Integrated Commercial Improvement Plan (ICIP) broadly aims to demonstrate commercial loss reduction, improvement in revenues and improvement in customer services through process automation, transparency, accountability, and improved productivity in order to create a foundation for sustainable commercial operations. Additional goals and objectives include:

Please refer table DIIP-4 for complete mapping of ICIP with goals and objectives. Here are the highlights related to commercial interventions:

- Improving PESCO's operational efficiency through:
 - Reduced commercial losses by 1% progressively over the period of five years
 - Maintaining revenue recovery up to 100% in next five years
- Improving customer care and services:
 - Reducing complaints related to billings to less than 0.1%
 - Minimizing new connections installation duration to comply with NEPRA's requirements
 - Minimizing reconnection installation duration to comply with NEPRA's requirements
 - Maximizing the time between date of receipt of bill and due date (10 days)
- Improving PESCO's infrastructure:
 - Implementing CIS and its rollout to overcome billing errors and ensure more controls over billing through modern technology

Other related objectives:

- Streamlined procedure without compromising system of internal controls
- Re-direction of documents on an efficient path to reduce revenue cycle and process cycle time
- Faster complaint resolution and timely availability of accurate information for better decision making
- Increased accuracy of billing through reduction of human interface in commercial processes
- Increased efficiency, easy access and administration through an online complaint system

Problem Statement (Baseline-Defined)

The current commercial operations of DISCOs are legacy based and do not offer much in terms of transparency, data accuracy, system efficiency and services to consumers. Therefore, there is a dire need to improve commercial procedures and bring them at par or close to best practices adopted by utilities worldwide. The commercial cycle starts with meter readings (which is manual), billing (which is being done through a legacy billing system), collections and customers services, which also needs considerable improvements.

Response

As a result of comprehensive planning exercise, PESCO has identified some low cost and quick impact interventions that would transform the way PESCO operate commercially and would bring a paradigm shift in its commercial operations. The ICIP is an optimal fusion of all the activities that would be implemented through the course of five years to revolutionize the business practices adopted by PESCO and take its commercial operations further.

To improve the efficiency and accuracy of the consumer billing process, CIS will be scaled-up. PESCO has already completed one circles with USAID PDP's assistance. The updated consumer's database from the consumer census will be utilized to populate the CIS database i.e. through IMR. In addition, the data on electricity consumption, whether received from AMR meters or HHUs, will be processed through CIS. This will shorten the meter reading and billing cycle thus ensuring that cash flows hit the ledgers of the DISCO much sooner and with less effort. Further, in order to curb

potential theft and non-recovery, a surveillance unit will also be setup across the DISCOs that will be responsible to monitor incidents of theft and guard the revenues of the company. This cell will also enforce the nonpaying consumers to pay their outstanding dues. To achieve excellence in customer services, the Customer Service Centers (CSCs) will be upgraded in each subdivision. These centers will facilitate the consumers and improve the brand image of PESCO in the eyes of the consumers. In conjunction, a Customers Management System (CMS) will be launched all across PESCO, along with a toll free number where consumers can file their complaints.

All these integrated commercial efforts will create a synergized effect of improving the commercial performance of PESCO and making it a more profitable entity. Therefore, based on the return on investment offered, these projects have been chosen.

Customers Information System (CIS) Extension – Seven Remaining Circles

The operations of DISCOs are characterized by manual and cumbersome processes, inadequate controls, insufficient commercial focus, limited transparency and a lack of reliable information. As a result, operations are highly inefficient with substantial revenue leakages and poor customer orientation. Integrating and automating core commercial functions like meter reading and billing/collections will minimize the human element in commercial processes and lay the foundation for sustainable revenue cycle reforms.

Integrating and automating core commercial functions like meter reading and billing/collections that will minimize the human element in commercial processes and lay the foundation for sustainable revenue cycle reforms is being planned. From customer care and metering to billing, payments, credit and collections, these applications enable the customer experience and support all aspects of billing and revenue collections. Augmented with HHU meter reading devices, the CIS will generate accurate consumer bills and a one-window customer services facility will provide improved customer experience. This will result in improved operational efficiency, increased accuracy of bills, reduced process cycle time and more efficient customer services with a reduction in customer complaints.

Therefore, CIS, which is the critical backbone of customer care and commercial operations, is being implemented at PESCO with assistance from USAID PDP and Power Information Technology Company (PITC) at Peshawar Circle.

CIS is a web based application system. The required servers and allied hardware is being provided by PDP that has the capacity to cover the entire company's customers base. PDP-PITC developed the CIS application whereas Oracle license for database was purchased by PESCO. The CIS rollout comprises of numerous elements including the application software, database engine, computer hardware and networks (LANs and WANs), network installation and testing, data conversion from legacy system to a new system, data cleansing, pre-installation and on-the-job training, and operational support for a limited time. All these activities will be done by PESCO.

As the first implementation takes is completed in Peshawar Circle and one more Circle by PDP's assistance, the CIS will be progressively rolled out to other circles by PESCO, by FY2018, rolling covering 01 more circles in FY2016, 02 more in FY 2017 and 02 more in FY2018. PDP has

successfully established the partnership of PESCO and they have taken full ownership of developing and expanding the new billing system to other circles of PESCO.

ii. Financial Management Improvement Plan

PESCO is implementing ERP with USAID PDP's assistance. The costs for ERP implementation are already covered. Further USAID PDP has assisted PESCO to improve the internal audit function and audit and accounting manuals. Under this plan PESCO envisages to conduct specialized studies like Assets tagging and valuation. Provision for covering the bandwidth operational costs is also made under this DIIP for ERP. Further staffing required to scale ERP company-wide is part of the HR plan.

DIIP 19 - Financial Management Improvement Plan

Financial Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	ERP system implementation						
B	Revamping the Internal Audit	50					50
C	Other studies and models preparation						
G	IT infrastructure to support new initiatives						
F	Others etc...						
Total		50					50

1. Internal audit Capacity Building / Trainings: PESCO during 2015-16 has planned capacity building of its internal audit function to effectively discharge its functional as per new internal audit manual including automation etc.

iii. Human Resource Improvement Plan

This plan covers the HR improvement activities, revamping / addition of training facilities, training of employees through external facilities, conducting some studies, improving the working environment etc. Under this section scope that what will be done in each of the five year under of business plan is discussed. The narrative shall also be supported by the justification.

DIIP 20 - Human Resource Improvement Plan

HR Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	Revamping of Training Centers	65	57	67	52	39	280
B	Training of employees through external training institutions	79	79	79	79	79	395
C	Human Resource Information System Implementation	20	20	20	20	20	100
D	Conducting the yard stick study	10	10	10	10	10	50
E	IT infrastructure to support new initiatives	15	15	15	15	15	75
F	Improving the working environment	10	10	10	10	10	50
G	Others etc...						
Total		199	191	201	186	173	950

The Human Resource Improvement Plan (HRIP) broadly aims to increase the functional capacity of DISCO staff by providing the institutional model for technical and behavioral skills among the company's employees. It also aims to increase the productivity and quality of services provided both internally and externally, creating a foundation for sustainable HR operations. Additional goals and objectives include:

Human-ware:

- Improving PESCO's infrastructure:
 - Starting training and capacity building initiatives
 - Improving the recruitment process

- Fulfilling the basic requirement for needs to operate for field staff
- Improving communications with staff
- Identifying a turnaround group

Org-ware:

- Org A&R review and implementation
- Improving office facilities/work environment
- Conducting yardstick study for HR
- Conducting motivational campaigns
- Career planning
- Improving health and educational facilities for employees

Others:

- Streamlined HR procedure and system of internal controls.
- Increased efficiency and effectiveness of the departments.
- Increased knowledge and skills of staff in their functional areas

The current operations and budgets of DISCOs lack a focus towards the improvement of human resource functions and significantly neglect the skill development of employees which often times is a major contributing factor towards the poor overall performance of the organization. Therefore, there is a dire need to improve human resource functions and bring them at par with best practices adopted by utilities worldwide. As a result of DISCOs' operational audits, USAID Power Distribution Program (PDP) identified some interventions that would transform the way these DISCOs operate and bring a paradigm shift in their human resource functions. The HRIP is an optimal fusion of all the activities that would be implemented through the course of five years to revolutionize the business practices adopted by PESCO and ensure the development of its human capital.

The HRIP offers a holistic approach as it not only targets one of the main goals of the organization i.e. increased efficiency but also takes the employees' perspective into consideration through improved facilities/work environment. The HRIP starts with striking the heart of human resource development i.e. training and capacity building of the staff. For this purpose, PESCO will begin the process of adequately funding the proper training function by allocating training and development specific budget at two percent of the operating budget and increasing it by almost one percent per year. To be effective, the trainings must be a continuing process that steadily enhance the technical skills and reinforce safe working practices especially amongst the linemen.

All these efforts will create a synergized effect of improving the human resource functions of the DISCO and making it a more profitable entity.

Staffing Plan:

The staffing plan is an essential component of the HR plan. Appropriate staffing aligned with Business Strategy is a must to ensure smooth implementation of projects, operations, sustainability and achievement of goals. Below is the staffing plan related to IT, Planning, Strategic Planning, commercial, communications, transmission and distribution. The cost of this staffing is reflected in the operational costs as this plan is consistent between the two scenarios developed i.e. is the best and optimally achievable cases

DIIP 21- Staffing Plan aligned with Investment Plan

The staffing plan against existing sanctioned post including the staffing required for expansion related project has been taken by PESCO as part of the working of new hiring attached to PESCO tariff petition.

iv. **Communications Improvement Plan**

This plan covers the communications improvement activities including but not limited to improving the internal communication amongst employees and external communication with customers to improve image of the company etc. Under this section scope of work is provided to be done in each of the five years under this business plan.

DIIP 22- Communication improvement Plan

Communications Plan Items (Illustrations below)		FY-2015- 16	FY-2016- 17	FY-2017- 18	FY-2018-19	FY-2019- 20	Total
		Total	Total	Total	Total	Total	Total
A	Improving Internal Communications with Employees	45	45	45	45	45	225
B	Improving External Communications with Customers	10	10	10	10	10	50
C	Communication material	2	2	2	2	2	10
D	Others etc...						
Total		57	57	57	57	57	285

PESCO often receive negative coverage in the local media due to the absence of active communications and media strategy. Moreover, the basic functions of communications are undermined with little or no communications budget. The public relations department lacks the resources, manpower and expertise that prevent PESCO from achieving corporate communication standards and creating a positive image among their consumers. The Communications Improvement Plan (CIP) thus, offers a holistic approach because it not only emphasizes the importance of public awareness and image building initiatives for the DISCO but also the internal communication. A part from this, it also focuses on improving the internal communication among staff specially the officer cadre who are involved in the decision making and for the purpose, require immediate access to the information, when and where required.

This plan identified some low cost interventions that would transform the way PESCO operate their PR department. Frequent consumer awareness campaigns and regular interaction with consumers are few of the highly recommended activities targeting educated and well-informed consumers who

are bound to play their role in energy conservation and spread positive messages. In addition, PESCO will allocate a clearly defined budget and resources for consumer awareness activities. The CIP is an optimal fusion of all such activities that would be implemented through the course of five years by PESCO to take its communications and outreach further.

Through the initiatives indicated, the CIP aims to improve PESCO's branding with recognition among local communities and consumers and improved understanding among the young generation regarding their role in energy conservation along with improved corporate communication and increase in the usage of email and telephonic communication amongst PESCO's staff.

All these efforts will create a synergized effect of improving the communications function of the DISCO and making it a corporate entity at par with utilities worldwide. Therefore, based the maximum band for the buck, these projects have been chosen.

A. Internal Communication:

Mail Servers:

Before PESCO could take the initiative to improve communication with its external stakeholder such as consumers and the community as a whole, it must ensure that it has achieved the optimum level required in the internal communication among staff. To achieve this objective, PESCO should acquire the basis infrastructure that would help the staff to have affective communication among them. The modes of communication that are needed to be strengthened by PESCO as an organization are electronic communication via email and, telephonic communication over the cell phones.

In order to provide instant access to the information required for the spontaneous decision making and problem solving, PESCO employees in the officer cadre need to have in their possession, at least an email address to communicate within the boundaries of PESCO and a cell phone enabling them to relay their communication outside the premises of their offices. Therefore a mail server is suggested to be deployed within the organization. Scanners will also be installed to ease the email functionality. This will be done right after the communication protocols have been set, user trainings have been imparted and procedures have been finalized; all of which would happen in the first year of Business Plan implementation. In addition, cell phones will also be provided to the officers serving the dual purpose of not only making phone calls but also checking their emails.

Annual Employee Recognition Event:

It is the duty of an organization to appreciate its employees because as a matter of fact, an organization is in existence only because of its employees. Therefore, PESCO will organize an annual function to celebrate its successes and achievement in the last year as well as to recognize the employees that have given PESCO the reasons for celebration through their dedication and hard work. This will not only motivate the employees but will consequently result in creating harmony and mutual understanding among them.

These interventions will ensure that PESCO establish an effective internal communication setup required to run the organization and its operations, in a more efficient manner.

B. Public Communication & Outreach Activities:

PESCO's Public Relations (PR) Departments comprise one PR officer and two clerical staff who dedicate a good portion of their time to issuing rebuttals to inaccurate media reports. The concept of image building and consumer awareness needs improvement. Therefore this plan which actually comprises of a complete portfolio in the realm of Public Communication and Outreach, helping put forward an improved brand image of PESCO, better customer services and better informed customers through a series of outreach campaigns.

1. Mass Media Campaigns

The Public Relations and Customer Services Departments of PESCO will design localized campaigns to target consumers on both energy conservation and the timely payments of bills. These campaigns will help PESCO in its image promotion as a well-run and progressive power distribution company. PESCO staff will be given an opportunity to talk to consumers through radio, TV and newspapers to educate consumers regarding the distribution business of PESCO.

In the long run, these campaigns will result in an improved image of PESCO as a dynamic and customer-friendly entity through external communications that will help to smoothly implement consumer awareness campaigns and will empower the PR Department to deliver assertive communications and outreach on behalf of PESCO.

2. Public Outreach & Awareness Programs

Consumer outreach activities will help build a relationship between PESCO and its consumers. Campaigns targeted at schools and universities, and industries, traders and farmers will be planned in close coordination with the relevant departments of PESCO.

A variety of interventions at schools and colleges will be held including energy conservation seminars, lectures on PESCO's role as a DISCO, debating, essay writing and painting competitions. These will help in the image promotion of PESCO among school- / college-going students. A range of consumer awareness material will be disseminated to improve the knowledge of students on energy conservation and efficiency at both homes and schools.

Industries are important consumers of PESCO therefore targeting industrialists, through seminars at the Chamber of Commerce, will spread energy conservation awareness and the effectiveness of energy audits. Speakers from PESCO will be arranged to speak with industrialists on selected topics e.g. energy conservation, better relationships between PESCO and industries and the need for strengthening cooperation to the mutual benefit of both.

Similarly meetings will be organized with Press Club, to gain its support to spread the message to the masses to adopt energy conservation measures and place PESCO's conservation material in prominent locations.

Farmers, in addition to being important consumers of PESCO, can play a significant role in the conservation of energy through the use of efficient tubewells and legally managing their connections. Improved relationships between farmers and PESCO are the key to discouraging theft and soliciting timely bill payments.

3. Design and printing of Customer Awareness Material

PESCO's corporate image requires steps to be taken for its improvement and to promotion as a DISCO rather than an electricity generation and supply control entity. A localized media campaign will be designed and executed to create awareness among consumers regarding PESCO and energy conservation. Material will include news articles, brochures and leaflets, billboards, pamphlets, local cable advertisements and documentaries. A new corporate tagline (slogan) along with business cards will help introduce a uniform public face of the company at the professional level and will be proposed to PESCO management.

As part of the overall branding campaign, PESCO's Customer Services Centers will be branded through the strategic placement of standees, banners and other awareness material. Brochures, leaflets and handbooks will be developed for employee safety measures and workplace ethics that will help guide Customer Service Center employees. The proposed action plan includes designing content that educates consumers about PESCO's role as a DISCO and the different energy conservation measures they can adopt.

4. Student Energy Conservation Programs

Another important intervention is the energy efficiency and anti-theft campaigns consisting of mass media and Informational and Educational Communication (IEC) materials for dissemination to the public as well as internal communications. These are grassroots-level promotions that target awareness at community level or through school children and college/university students with action-oriented messages, where benefits of proposed actions are quantitative and clear to the audience. For instance, replacing an incandescent light bulb with an energy saver will help reduce consumption by 50%, resulting in money saving and increased availability of electricity.

5. Radio Talk shows

Talk shows aired through radio are one of the cost effective ways to directly reach the consumers and to tame their minds by talking about the positive developments being carried out by PESCO and showing the positive side of the picture. These talk shows also provide an opportunity to the consumers to take part in the ongoing discussions with the senior officials of PESCO, turn attention to their complaints, or provide their feedback. PESCO will launch two seasons of the radio talk shows on the leading FM radio channels, one series of 13 episodes will be aired for a quarter in peak summer season focusing on energy conservation, while other series will commence in peak winter season with an emphasis on the anti-theft.

6. Monthly News Letter

Any progressive organization would like to update the society in general and its employees and consumers in particular, in a progressive manner, about the achievement it is making throughout the course of time. Newsletter is an effective matter to get this done. PESCO will publish monthly newsletter that will not only contain the updates about the organization but will also include news, events, articles, consumer feedback and other topics of interest.

Rather than presenting the scope in a table it is narrated and explained below:

A. Internal Communications

For enhancing email internal communication via email, the company will deploy physical IT infrastructure consisting of one Mail Server and associated paraphernalia. In addition, scanners will be provided in all the distinguished offices of PESCO to facilitate email communication. Further, to facilitate swift communication amongst the officers, smart phones will be designated for all the officers enabling them not only to make calls but also to check and respond to the emails on the go.

Apart from investments in the communications technology, PESCO will invest in the human aspect as well by arranging at least one Employee Recognition Event each year. It will be a formal event attended by all the employees of PESCO in which the high-achievers will be acknowledged for their services and successes.

B. External Communications

Public Outreach Office of PESCO will be strengthened by provision of a Toyota Hiace for rapid outdoor mobility of staff for performing outreach activities in the field.

At least four mass media campaigns in a year will be arranged within the territory of PESCO, two campaigns will be based on the theme of anti-theft while two will focus energy conservation. These will include publishing advertisement in leading local newspapers, and relaying the message using the electronic media: TV, Cable and FM Radio. In addition, billboards, pole streamers and similar mediums will also be utilized to spread the message among the consumers.

Apart from these campaigns, public outreach programs and awareness sessions will be arranged at university, community and district levels. It is anticipated that at least four sessions per year at each level will be organized to reciprocate the message.

Printed material is an effective way to penetrate within the masses therefore, consumer awareness material will be designed and printed which includes but not limited to brochures, pamphlets, leaflets, flyers etc. In addition, a newsletters will be also published each month.

v. Linemen Training, Tools and Equipment

USAID Power Distribution Program (PDP) has provided quality tools, vehicles and equipment, and also conducted different trainings of PESCO line staff on the latest tools and equipment that are used worldwide to make line work effective and prevent lineman from fatal and severe non-fatal accidents. A hundred purpose-built vehicles have been provided making the line staff able to carry all necessary tools and equipment that are mandatory to perform their job safely.

PESCO's senior and middle managers are also trained so that they can realize the importance of lineman safety in quality work production and elimination of these accidents. The point of consensus has developed in the PESCO due to safety trainings at all levels of management and line staff is "all these accidents are avoidable and can be eliminated". To reach such point, unwavering commitment is required at every level of DISCO to show zero tolerance attitudes on any accident in future. The management can't justify its position by initiating disciplinary actions against SDOs and

Supervisors only, but the management has to have allocated good amount of resources in lineman safety.

Currently PESCO have serious dearth in Transport, Tools and Personal Protective Equipment for Linemen. Further PESCO operate its safety through Deputy Manager Safety with two safety inspectors, in one research it is concluded that in a well-run power utility its safety personnel ratio to its employees should be 1/250, whereas PESCO has such ratio 1/4000. To improve such ratio PESCO Safety Organization needs restructuring immediately.

In this business plan PESCO has incorporated such needs in lineman safety with extensive homework and calculations. In this plan, all the needs of Safety Organization restructuring, Trainings and Safety Professional Development Programs for management and line staff, provision of Bucket Mounted Trucks for transport and Ravis for supply complaints handling, communication (mobile phones provision for all LM), Linemen equipment and PPEs have been catered with to make PESCO lineman safe, effective and efficient (that includes miscellaneous gang-tools, individual tools, personal protective equipment are planned to be procured). This plans also includes provision for customized trainings for PESCO's LM.

This plan under safety when executed well save PESCO from huge losses due to poor quality of work and rampant accidents of experienced lineman caused in the shape of heavy financial losses and human loss and it will also improve response to complaint time resulted in improved customer services.

Please refer below for details of Tools and Planting scope.

Sr. No.	Description	Unit	Quantities					Total
			2015-16	2016-17	2017-18	2018-19	2019-20	
1	Vehicles							
	Sub Total		22	33	22	Nil	Nil	77
2	Tools & Plants (T&P)							
	a. Instrument and Test Equipment	Nos						
	b. Special Tools	Nos						
	c. Mechanical Plants (generators, welding plants etc.)	Nos						
	d. LM Tools other than personal protective equipment	Nos						
	e. Clip on Volt-Ohm Meter	Nos	100	120	120	120	120	580
	f. Clip on Power Analyzer	Nos	40	50	50	50	50	240
	g. AC Recording Watt/Var Meter	Nos	20	20	40	40	40	160
	h. Personal Computers with Printers	Nos	60	62	61	60	61	304
	Sub Total		220	252	271	270	271	1284

Section -VI

Costs and Financing Plan

A. Capital Expenditure and additional Operating Costs for Expansion and Rehabilitation
(this section also includes the total cost of DIIP)

▪ Details of Costing

The detailed costs of Transmission, Distribution and functional plans is provided hereunder, with more details Annexed.

▪ STG- Expansion and Rehabilitation (Best Case)

a. Grid Stations

DIIP 25 - STG Expansion and Rehabilitation (Best Case): Grid Stations

Rs. In Million								
Sr. No	Description	Total Cost	Total Capacity Added (MVA)	2015-16	2016-17	2017-18	2018-19	2019-20
1	New							
a	132 KV	8674	1566	272	798	1209	1179	5216
2	Conversion							
a	66 to 132 KV	1659	286		262	227	454	716
b	33 to 132 KV	135	26		135			
3	Augmentation							
a	132 KV	689	117.5	3.67	0.00	167	152	367
b	66 KV							
4	Extension (Transformer)							
a	132 KV	633	237	75	291	80	186	0.00
b	66 KV	13.63	13	13.62				
5	Rehabilitation							
a	132 KV	300				300		

Year	Cost (MRs.)					
	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Projects with Available Finances (Tr-III, Tr-IV) ADB						
New Grid	0	554	0	0	0	554
Conversion	0	284	0	0	0	284
T/Line (Total)	0	469	0	0	0	469
Augmentation	2907	0	0	0	0	2907
Extension		545				545
Spare Transformer		193				193

T/ Lines (Best Case)**i. New Line**

DIIP 26 - STG Expansion and Rehabilitation (Best Case): Transmission Lines (Best Case): New Lines

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	T/Line D/C	3599	323	924	709	716	927
2	T/Line SDT	4989	555	155	570	420	3289

ii. Rehabilitation/Reconductoring/Up-gradation (Best Case)

DIIP 27 - STG Expansion and Rehabilitation (Best Case): Transmission Lines (Best Case): Rehabilitation/Reconductoring/Up-gradation

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	132 KV D/C	23.83			15.62	8.20	
2	132 KV SDT	1200		159		123	919
3.	132 KV Addl: Ckt	338.06				240	98

iii. Reconductoring and Rerouting (Best Case)

DIIP 28 - STG Expansion and Rehabilitation (Best Case): Transmission Lines (Best Case): Reconductoring and Rerouting

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	132 KV D/C	123.19					123
2	132 KV SDT	0					

iv. Capacitor

DIIP 29 - STG Expansion and Rehabilitation (Best Case): Transmission Lines (Best Case): Capacitor

Nil

▪ **Expansion and Rehabilitation (Optimally Achievable Case)**

a. Grid Stations

DIIP 30 - Expansion and Rehabilitation (Optimally Achievable Case): Grid Stations

Rs. In Million

Sr. No	Description	Total Cost	Total Capacity (MVA)	2015-16	2016-17	2017-18	2018-19	2019-20
1	New							
a	132 KV	4419	834	272	537	1209	1179	1222
2	Conversion							
a	66 to 132 KV	1659	286	262	0.00	227	454	716
b	33 to 132 KV	135	26		135			
3	Augmentation							
a	132 KV	689.24	117.5	3.670	0.00	167	152	367
b	66 KV							
4	Extension (Transformer)							
a	132 KV	553	211	252	114	0.00	187	0.00
b	66 KV	13.63	13	14				
5	Rehabilitation							
a	132 KV	300				300		
b	66 KV							

Year	Cost (MRs.)					
	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Projects with Available Finances (Tr-III, Tr-IV) ADB						
New Grid b_T		554.33				554.33
Conversion a_T		283.62				283.62
T/Line (Total) n_T		469				
Augmentation m_T	2907					2907
Extension s_T		545.23				545.23
Spare Transformer i_T		193.24				193.24
Total n						

b. T/Lines (Optimally Achievable Case)**i. New Line**

DIIP 31- Expansion and Rehabilitation (Optimally Achievable Case): Transmission Lines (Optimally Achievable Case): New Line

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	T/Line D/C	2884	323	746	709	716	390
2	T/Line SDT	1971	555	155	349	420	492

ii. Rehabilitation/Reconductoring/Up-gradation

DIIP 32 - Expansion and Rehabilitation (Optimally Achievable Case): Transmission Lines (Optimally Achievable Case): Rehabilitation/Reconductoring/Up-gradation

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	132 KV D/C	46.15	22.32		15.62	8.20	
2	132 KV SDT	1178		136		123	919
3	132 KV Addl: Ckt	338.06				240	98

iii. Reconductoring and Rerouting

DIIP 33 - Expansion and Rehabilitation (Optimally Achievable Case): Transmission Lines (Optimally Achievable Case): Reconductoring and Rerouting

Rs. In Million

Sr. No.	Description	Total Cost	2015-16	2016-17	2017-18	2018-19	2019-20
1	132 KV D/C	123					123
2	132 KV SDT	0					

iv. Capacitor

DIIP 34- Expansion and Rehabilitation (Optimally Achievable Case): Transmission Lines (Optimally Achievable Case): Capacitor

Nil

▪ Distribution System- Expansion and Rehabilitation (Best Case)

DIIP 35 - Distribution System Expansion and Rehabilitation (Best Case)

Sr. No .	Description	Rs. In Million					
		2015-16	2016-17	2017-18	2018-19	2019-20	Total
Scope of Work for 11 kV and Below Expansion							
A.							
1	Expansion of HT Lines						
	New Line	570	1026	1140	1163	1208	5107
	Reconductoring	176	318	353	360	374	1581
2	Transformers						
	a. 25 KVA	349	462.5	479.9	497.4	523.7	2312.5
	b. 50 KVA	361.3	502.9	529.9	566	553.5	2513.6
	c. 100 KVA	62.8	94.2	106.8	115.2	119.3	498.3
	d. 200 KVA	252.8	409.5	429.8	455	500	2047.7
	e. others KVA						
	Sub Total	1025.9	1469.1	1546.3	1633.7	1697.1	7372.1
3	11 KV Capacitors						
	a. Fixed 450 KVAR	2	3	3	3	3	15
	b. Fixed 900 KVAR	Nil	Nil	Nil	Nil	Nil	Nil
	c. Others	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total	2	3	3	3	3	15
4	11 KV Panels	27	48	54	55	57	240
5	11 kV 500 MCM Cable	18	33	37	38	39	165
Scope of Work for LT Expansion							
B.							
1	New LT Lines						
	Number of proposals	4200	5848	6140	6467	6669	29324
	Length of new LT line	1503.603	2093.589	2198.125	2315.191	2387.507	10498.015
2	LT Capacitors						
	a. Different KVARs	Nil	Nil	Nil	Nil	Nil	Nil
3	Other Equipments and						

	Material						
	a. Single Phase Meters	373.5	358.56	343.62	328.68	313.74	1718.1
	b. Three Phase Meters	542.81	476.18 6	435.04 6	419.81 3	404.14 9	2278.00 3
	c. MDI	25	20	17.5	15	15	92.5
	Sub Total	941.31	854.74 6	796.16 6	763.49 3	732.88 9	4088.60 3
Scope of Cost Deposit Work							
C.	Village Electrification						
1	New HT Lines						
	Length of new HT line (km)	414.8	497.8	553.1	608.4	691.3	2765.3
2	New LT Lines						
	Length of new LT line (km)	520.1	624.2	693.5	762.9	866.9	3467.6
3	Transformers						
	a. 25 KVA (No)	45.5	54.6	60.7	66.8	75.9	303.5
	b. 50 KVA (No)	191.9	230.2	255.8	281.4	319.8	1279.1
	c. 100 KVA (No)	90.6	108.7	120.8	132.8	150.9	603.3
	d. 200 KVA (No)	13.9	16.7	18.5	20.4	23.1	92.6
	e. others KVA (No)						
	Sub Total (No)	341.9	410.2	455.8	501.4	569.8	2279.1
D.	Independent Feeder						
1	New HT Lines						
	Length of new HT line	29.3	57.2	60.1	66	73.3	285.9
2	New LT Lines						
	Length of new LT line	Nil	Nil	Nil	Nil	Nil	Nil
3	Transformers						
	a. 25 KVA	Nil	Nil	Nil	Nil	Nil	Nil
	b. 50 KVA	Nil	Nil	Nil	Nil	Nil	Nil
	c. 100 KVA	4.7	11	12.2	13	13.9	54.9
	d. 200 KVA	2.5	5.9	6.6	7	7.5	29.5
	e. others KVA						
	Sub Total	7.2	16.9	18.8	20	21.4	84.3
4	11 KV Panel	10.7	23.5	25.7	27.8	30	117.7

Scope of Work for 11 kV and Below Rehabilitation		Rs. In Million					
A.		2015-16	2016-17	2017-18	2018-19	2019-20	Total
1	Rehabilitation of HT Lines						
	Number of proposals	25	45	50	51	53	224
	New Line	570	1026	1140	1163	1208	5107
	Reconductoring	176	318	353	360	374	1581
	Re-routing	Nil	Nil	Nil	Nil	Nil	Nil
2	New Transformers						
	a. 25 KVA	349	462.5	479.9	497.4	523.7	2312.5
	b. 50 KVA	361.3	502.9	529.9	566	553.5	2513.6
	c. 100 KVA	62.8	94.2	106.8	115.2	119.3	498.3
	d. 200 KVA	252.8	409.5	429.8	455	500.5	2047.7
	e. others KVA	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total	1025.9	1469.1	1546.3	1633.7	1697.1	7372.1
3	Installation of 11 kV Panels	27	48	54	55	57	240
4	11kV 500 MCM Cable (km)	18	33	37	38	39	165
Scope of Work for LT Rehabilitation							
B							
1	LT Lines Rehabilitation						
	New LT Line	652.16 8	908.06 6	953.40 7	1004.18 3	1035.54 9	4553.37 2
	Reconductoring of LT Line	217.69 8	303.11 8	318.25 3	335.203	345.673	1519.94 5
2	Other Equipment's and Material						
	a. Single Phase Meters	16.434	72.326	69.039	65.751	62.464	286.014
	b. Three Phase Meters	8.8	44	52.8	57.2	61.6	224.4
	Sub Total	25.234	116.32 6	121.83 9	122.951	124.064	510.414

▪ **Distribution System- Expansion and Rehabilitation (Optimally Achievable Case)**

DIIP 36 - Distribution System Expansion and Rehabilitation (Optimally Achievable Case)

Sr. No	Description	Unit	Quantities					Total
			2015-16	2016-17	2017-18	2018-19	2019-20	
Scope of Work for 11 kV and Below Expansion								
A.								
1	Expansion of HT Line							
	Number of proposals	Nos	20	29	37	53	60	199
	Length of new HT line	Km	299	433	552	791	896	2971
	Reconductoring	Km	200	290	370	530	600	1990
2	Transformers							
	a. 25 KVA	Nos	130	140	140	160	160	730
	b. 50 KVA	Nos	300	350	400	500	550	2100
	c. 100 KVA	Nos	240	260	300	367	400	1567
	d. 200 KVA	Nos	85	85	90	95	100	455
	e. others KVA	Nos						
	Sub Total		755	835	930	1122	1210	4852
3	11 KV Capacitors							
	a. Fixed 450 KVAR	Nos	20	29	37	53	60	199
	b. Fixed 900 KVAR	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. Others	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		20	29	37	53	60	199
4	11 KV Panel	Nos	20	29	37	53	60	199
5	11kV 500 MCM Cable	km	6	9	11	16	18	60
Scope of Work for LT Expansion								
B.								
1	New LT Lines							
	Number of proposals	Nos	755	835	930	1122	1210	4852
	Length of new LT line (Total Wasp+ANT)	Km	453	501	558	673	726	2911
2	LT Capacitors							
	a. Different KVARs	Nos	Nil	Nil	Nil	Nil	Nil	Nil
3	Other Equipments and Material							
								7100
	a. Single Phase Meters	Nos	13000	13500	14000	15000	15500	0
	b. Three Phase Meters	Nos	450	500	550	600	650	2750

	c. MDI	Nos	150	200	250	250	300	1150
	Sub Total		13600	14200	14800	15850	16450	74900
Scope of Cost Deposit Work								
C.	Village Electrification							
1	New HT Lines							
	Length of new HT line	Km	237	280	307	152	161	1137
2	New LT Lines							
	Length of new LT line	Km	230	290	322	162	180	1184
3	Transformers							
	a. 25 KVA	Nos	48	50	52	35	42	227
	b. 50 KVA	Nos	100	150	155	75	90	570
	c. 100 KVA	Nos	35	40	42	21	23	161
	d. 200 KVA	Nos	25	25	26	15	17	108
	e. others KVA	Nos						
	Sub Total		208	265	275	146	172	1066
D.	Independent Feeder							
1	New HT Lines							
	Length of new HT line	Km	20	39	41	39	38	177
2	New LT Lines							
	Length of new LT line	Km	Nil	Nil	Nil	Nil	Nil	Nil
3	Transformers							
	a. 25 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	b. 50 KVA	Nos	Nil	Nil	Nil	Nil	Nil	Nil
	c. 100 KVA	Nos	15	35	39	35	35	159
	d. 200 KVA	Nos	5	12	13	13	13	56
	e. others KVA	Nos						
	Sub Total		20	47	52	48	48	215
4	11 KV Panel	Nos	10	22	24	23	23	102

Scope of Work for 11 kV and Below Rehabilitation

A.								
1	Rehabilitation of HT Lines							
	Number of proposals	No s	16	19	21	26	28	110
	Bifurcation	No s	16	19	21	26	28	110
	Reconductoring	Km	160	190	210	260	280	1100

	Re-routing	Km	Nil	Nil	Nil	Nil	Nil	Nil
2	New Transformers							
	a. 25 KVA	No s	110	120	120	130	140	620
	b. 50 KVA	No s	250	300	320	343	360	1573
	c. 100 KVA	No s	200	220	240	260	280	1200
	d. 200 KVA	No s	70	80	80	85	80	395
	e. others KVA	No s	Nil	Nil	Nil	Nil	Nil	Nil
	Sub Total		630	720	760	818	860	3788
3	Installation of 11 kV Panels	No s	16	19	21	26	28	110
4	11kV 500 MCM Cable	km	5	6	6	8	8	33
Scope of Work for LT Rehabilitation								
B								
1	LT Lines Rehabilitation							
	New LT Line	Km	126	144	152	164	172	758
	Reconductoring of LT Line	Km	95	108	114	123	129	568
2	Other Equipment's and Material							
	a. Single Phase Meters	No s	10000	11000	12000	13000	13500	59500
	b. Three Phase Meters	No s	500	550	600	650	650	2950
	Sub Total		10500	11550	12600	13650	14150	62450

Cost for GIS Mapping and P&E:

Sr. No.	Description	Rs. In Million						
		2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
GIS Mapping								
1	HT Mapping							
	Number of 11 kV Feeders		1	2	2	2	3	10
	Length of HT Lines mapped							
2	LT Mapping							
	Number of LT Lines		4	6	6	6	6	28
	Length of LT Lines mapped							
3	Tools Required							
	GIS Mapping Software Licenses (2M Lumpsum)		40					40
	Plotters		0.84					0.84
	Computers		1.35					1.35
	GPS devices		3					3
4	Total Cost		50.19	8	8	8	9	83.19

Sr. No.	Description	Rs. In Million						
		2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
Study Based Planning using GIS Maps with Modern Planning Tools - Transition Plan								
1	Tools Required							
	Simulation Software Licenses		40					

B. Capital Expenditure and Additional Operating Costs for Other Functional Improvement Plans:

Summary of Capital and Operational Expenditure Costs

Please note that the Scope and Cost of Functional Plans is same for both the scenarios.

DIIP 37 - Summary of Capital and Operational Expenditure Costs

Items		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	Commercial Improvement Plan	350					350
B	Financial Improvement Plan	50					50
C	HR Improvement Plan	199	191	201	186	173	950
D	Communications Improvement Plan	57	57	57	57	57	285
Subtotal: (A+B+C+D)		656	248	258	243	230	1635
Escalation @ 7.9%		708	268	279	262	248	1764
Contingencies: @3%		729	276	287	270	256	1817
Total		729	276	287	270	256	1817

Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

DIIP 39 Costing of Commercial Improvement Plan

Commercial Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	AMR Metering						
B	Electronic Metering						
C	New CIS system	350					350
D	HHUs for meter reading						
E	Consumer Census						
F	Anti-theft efforts						
G	IT infrastructure to support new initiatives						
F	Others etc...						
Total		350					350

DIIP 40 Costing of Financial Management Improvement Plan

Financial Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	ERP system implementation						
B	Revamping the Internal Audit	50					50
C	Other studies and models preparation						
G	IT infrastructure to support new initiatives						
F	Others etc...						
Total		50					50

DIIP 41 Costing of Human Resource Improvement Plan

HR Improvement Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	Revamping of Training Centers	65	57	67	52	39	280
B	Training of employees through external training institutions	79	79	79	79	79	395
C	Human Resource Information System Implementation	20	20	20	20	20	100
D	Conducting the yard stick study	10	10	10	10	10	50
E	IT infrastructure to support new initiatives	15	15	15	15	15	75
F	Improving the working environment	10	10	10	10	10	50
G	Others etc...						
Total		199	191	201	186	173	950

DIIP 42 Costing of Communications Improvement Plan

Communications Plan Items (Illustrations below)		FY-2015-16	FY-2016-17	FY-2017-18	FY-2018-19	FY-2019-20	Total
		Total	Total	Total	Total	Total	Total
A	Improving Internal Communications with Employees	45	45	45	45	45	225
B	Improving External Communications with Customers	10	10	10	10	10	50
C	Communication material	2	2	2	2	2	10
D	Others etc...						
Total		57	57	57	57	57	285

C. Summary Costs for the Integrated Investment Plan**Summary of Cost for Best Case**

DIIP 43- Summary Costs for the Investment Plan: Summary of Cost for Best Case

Covered under Section A above.

Summary of Cost for Optimally Achievable Case

DIIP 44- Summary Costs for the Investment Plan: Summary of Cost for Optimally Achievable Case

Covered under Section A above.

Summary of Annual Recurring Costs

DIIP 45- Summary Costs for the Investment Plan: Summary of Annual Recurring Costs

Covered under Section A above.

D. Financing Plan:

DIIP 46- Financing Plan

FORM - 21 (A)							
Peshawar Electric Supply Company							
Investment							
		Provisional	Projected	Projected	Projected	Projected	Projected
A Investment Plan							
DOP	[Min Rs]	2,500	2,500	2,500	3,000	3,838	4,238
ELR	[Min Rs]	1,000	1,200	1,400	1,500	1,795	1,876
STG	[Min Rs]	1,600	1,700	1,800	3,000	3,500	4,000
Village Electrification	[Min Rs]	1,440	769	1,009	1,111	650	700
Others (Tou/Amr Meters)	[Min Rs]	1,250	2,800	1,542	700	-	-
Total	[Min Rs]	7,790	8,969	8,251	9,311	9,783	10,814
B Financing Arrangement							
Local	[Min Rs]						
Loan	[Min Rs]	1,250	2,800	1,542	700		
PSDP / Own Resources	[Min Rs]	3,600	4,100	4,600	6,000	5,995	6,576
Grant	[Min Rs]						
Consumer Contribution	[Min Rs]	2,940	2,069	2,109	2,611	3,788	4,238
Others (Please Mention)	[Min Rs]						
Total	[Min Rs]	7,790	8,969	8,251	9,311	9,783	10,814

Section - VII

Benefits and Financial Analysis

A. Expansion and Rehabilitation of Secondary Transmission and Distribution System:

i. Tangible Benefits

Additional Energy Available for Sales (for Transmission)

Year	Best		Achievable	
	MVA Added	Additional Energy for Sales	MVA Added	Additional Energy for Sales
2015-2016	97.5	399.29	215.5	882.54
2016-2017	381	1560.31	211	864.11
2017-2018	314	1285.92	314	1285.92
2018-2019	379	1552.12	379	1552.12
2019-2020	1022	4185.4	316	1294.12

Transmission - Loss Reduction

Year	MW		MWKh	
	Ideal	Realistic	Ideal	Realistic
2015-2016	22.8	20.5	110.45	98.77
2016-2017	19.8	15.5	95.92	74.68
2017-2018	12.7	12.7	61.52	61.19
2018-2019	12.8	12.8	60.01	61.67
2019-2020	7	5	33.91	24.09

Distribution - Loss Reduction

Year	HT Rehab		LT Rehab		Total	
	Units MKWh		Units MKWh		Units MKWh	
	Ideal	Realistic	Ideal	Realistic	Ideal	Realistic
2015-2016	47.5	30.4	327.6	49.14	375.1	79.54
2016-2017	81	34.2	432.7	53.28	513.7	87.48
2017-2018	85.5	35.9	429.8	53.2	515.3	89.1
2018-2019	82.6	42.1	426.8	53.98	509.4	96.08
2019-2020	81	42.8	413.4	53.32	494.4	96.12

ii. Non-tangible Benefits

The other benefits like improvement in voltage profile, improving the overloading of the network will be achieved after completion of project.

iii. Financial Analysis for the entire Transmission and Distribution Investments

- Internal financial rate of return (IFRR) comes out to be 23.66%

iv. Sensitivity Analysis

The IFRR for the following scenarios are placed a

- Increasing costs by 10%. IFRR comes out to be 21.46%
- Decreasing benefits by 10%, IFRR comes out to be 20.27%
- Increasing costs and decreasing benefits by 10% each, IFRR comes out to be 18.36%
- Increasing cost by 25%, IFRR comes out to be 18.79%

Section - VIII

Financial Projections for FY 2016 to FY2020

Please find below the profit and loss account, balance sheet and cash flow of PESCO for tariff control period i.e FY 2016- FY 2020:

PESHAWAR ELECTRIC SUPPLY COMPANY

Rs. In Million

Financial Statements**INCOME STATEMENT**

Projected	Projected	Projected	Projected	Projected
2015-16	2016-17	2017-18	2018-19	2019-20

QUANTITATIVE DATA

NO. OF CUSTOMERS (Million)	3.07	3.17	3.29	3.42	3.55
Growth in No. of customers(%)	3.72	3.26	3.79	3.95	3.80
UNITS SOLD (Mill. kWh)	8,025	8,343	8,753	9,086	9,378
UNITS PURCHASED (Mill. kWh)	11,801	11,919	12,157	12,279	12,340
UNITS LOST / DISTRIBUTION LOSSES (Mill. kWh)	3,776	3,576	3,404	3,193	2,962
UNITS LOST / DISTRIBUTION LOSSES (% Age) *	32%	30%	28%	26%	24%
Company TARIFF (Rs./kWh)	17.25	16.90	16.79	16.82	16.90
Consumer Tariff	17.25	16.90	16.79	16.82	16.90
PURCHASE PRICE (Rs./kWh)	9.10	9.30	9.50	9.70	9.90

INCOME STATEMENT**SALES**

Sale of Power	138,426	141,018	146,943	152,879	158,528
Rental & Service income	50	50	50	58	66
Total Sales	138,476	141,068	146,993	152,936	158,594
Subsidy	0	0	0	0	0
Amortization of deferred Credit.	1,107	1,181	1,272	1,405	1,553
	139,583	142,249	148,265	154,341	160,147

Purchase of Power

Gross Profit

	107,389	110,847	115,494	119,106	122,166
	32,194	31,403	32,771	35,235	37,981

OPERATING EXPENSES

Establishment Cost	15,296	16,827	18,512	20,366	22,396
Maintenance & repair and Others	800	880	968	1,065	1,171
Depreciation	2,432	2,645	2,855	3,255	3,655
Provision for Bad Debt	3,250	3,400	3,550	3,700	3,850
Total Operating Expenses	21,777	23,752	25,884	28,385	31,071

OPERATING PROFIT / (LOSS)

ADD: Other Income	3,464	3,690	3,390	3,559	3,737
EBIT	13,880	11,341	10,276	10,409	10,647
LESS: Interest Expense	5,530	3,261	1,721	901	205

PROFIT / (LOSS) BEFORE TAX

Income Tax/Turnover tax	2,923	2,828	2,994	3,328	3,655

NET PROFIT/LOSS FOR THE YEAR

Un-appropriated profit B/F	(226,271)	(220,844)	(215,592)	(210,031)	(203,851)

Un-appropriated profit C/F	(220,844)	(215,592)	(210,031)	(203,851)	(197,063)

Rs. In Million					
Financial Statements					
Balance Sheet	Projected	Projected	Projected	Projected	Projected
Assets	2015-16	2016-17	2017-18	2018-19	2019-20
Fixed Assets					
Gross Fixed Assets	65,061	71,250	78,232	85,569	93,680
LESS: Accumulated Depreciation	22,106	24,751	27,606	30,860	34,515
Net Fixed Assets	42,955	46,498	50,627	54,709	59,165
Capital Work in Progress	13,709	15,771	18,099	20,545	23,248
Long Term Advances, Deposit	116	122	128	134	141
Current Assets					
Inventory / Stores & Spares	5,100	6,227	8,247	6,020	6,593
Account Receivable	89,090	96,141	103,488	111,132	119,058
Less: Provision for Bad Debt	50,846	54,247	57,797	61,496	65,346
Net Accounts Receivable	38,244	41,894	45,692	49,636	53,713
Receivable from Associated Companies	1,107	1,383	1,245	1,120	1,008
Receivable from TESCO	31,177	32,735	34,372	36,091	37,895
Advances, Deposits, Prepay. & Other Rec.	55,332	58,099	59,842	67,023	71,044
Cash & Bank Balances	1,918	2,276	2,535	2,700	3,052
Total Current Assets	132,877	142,615	151,933	162,590	173,306
TOTAL ASSETS	189,657	205,007	220,787	237,978	255,861
Liabilities & Equity					
Shareholders' Equity	18,082	18,082	18,082	18,082	18,082
Grant in Aid	43,222	43,222	43,222	43,222	43,222
Retained Earnings	(220,844)	(215,592)	(210,031)	(203,851)	(197,063)
Total Equity	(159,540)	(154,288)	(148,727)	(142,547)	(135,760)
Long Term / Deferred Liabilities					
ADB Loans/PHP Loan	61,059	62,601	63,301	63,301	63,301
Liability against govt. loan	82,145	82,145	82,145	82,145	82,145
Deferred Credits (Consumer's Capital Cont. etc.)	23,007	23,935	25,274	27,657	30,342
Employees Retirement Benefits	39,542	41,934	44,397	46,934	49,547
Total Long Term / Deferred Liability	205,754	210,615	215,117	220,037	225,335
Payable to CPPA for Supplies-Plan deficit	110,326	116,850	123,840	131,203	138,265
Payable to Associated Companies	591	609	627	659	692
Creditors, Accrued & Other Liabilities	32,525	31,220	29,921	28,626	27,328
Total current Liabilities	143,442	148,679	154,396	160,488	166,284
TOTAL LIABILITIES AND EQUITY	189,657	205,007	220,787	237,978	255,861

Rs. In Million

Financial Statements

CASH FLOW STATEMENT	Projected	Projected	Projected	Projected	Projected
CASHFLOW FROM OPERATING ACTIVITIES	2015-2016	2016-2017	2017-2018	2018-2019	2019-2020
Net Profit (loss) for the Period after tax	5,428	5,252	5,561	6,180	6,787
Adjustments:					
ADD: Depreciation	2,432	2,645	2,855	3,255	3,655
Amortisation of Deferred Income	(1,107)	(1,181)	(1,272)	(1,405)	(1,553)
Provision for Bad Debts	3,250	3,400	3,550	3,700	3,850
Intrest Income	(915)	(915)	(915)	0	0
Provision for Ret. Benefits	3,642	3,751	3,863	3,979	4,099
Interest Expense	5,530	3,261	1,721	901	205
Cash Flow from Operations	18,259	16,213	15,363	16,610	17,042
Working Capital Changes					
(Increase)/Decrease in Debtors	(6,921)	(7,051)	(7,347)	(7,644)	(7,926)
(Increase)/Decrease in Inventories	(588)	(1,127)	(2,020)	2,227	(573)
(Increase)/Decrease in Advances, Deposit.etc	(6,155)	(4,602)	(3,241)	(8,775)	(5,714)
Increase/(Decrease) in Creditors, accrued and other liabilities	5,806	5,237	5,717	6,091	5,797
	(7,858)	(7,544)	(6,891)	(8,101)	(8,416)
Payment for Ret. Benefits	(1,320)	(1,360)	(1,400)	(1,442)	(1,486)
Cash Flow from Operating Activities	9,081	7,310	7,071	7,067	7,140
Cash Generated From Operation					
Financial Charges Paid	(5,530)	(3,261)	(1,721)	(901)	(205)
Interest Received	915	915	915	0	0
Capital Reciepts -Deferred Credit	2,069	2,109	2,611	3,788	4,238
Net Cash flow From Operating activities	6,535	7,073	8,876	9,954	11,173
CASH FROM INVESTING ACTIVITIES:					
Fixed Assets Acquired	(6,727)	(6,189)	(6,983)	(7,337)	(8,111)
Capital Work in Progress	(2,242)	(2,063)	(2,328)	(2,446)	(2,704)
Long Term Advances	(27)	(6)	(6)	(6)	(7)
Cash In/(Out) flow from Investing Activities	(8,996)	(8,257)	(9,317)	(9,789)	(10,821)
CASH FROM FINANCING ACTIVITIES					
NEW LOAN ADB(ERRA)	2,800	1,542	700	0	0
GoP Investments					
GoPGrant in Aid					
Cash In/(Out) flow from Financing Activities	2,800	1,542	700	0	0
Net Cashflow During the Year	339	358	259	164	352
Cash - Start of the Year	1,579	1,918	2,276	2,535	2,700
Cash - End of the Year	1,918	2,276	2,535	2,700	3,052

Section - IX

Investment Plan Implementation

Business Planning Organization for Preparation of Investment Plans

The stewardship responsibility of the Board of Directors (the Board) is to have an oversight role over the management of the DISCO, which is responsible for the day-to-day conduct of the business. The Board must assess and ensure systems are in place to identify and manage the risks of the Company's business with the underline objective of preserving Company's assets and steering it in a strategic direction that ensures fulfilling its objectives. The Board, through the Chief Executive Officer (CEO), sets the attitude and disposition of the Company towards achieving sets of goals and objectives, in compliance with applicable laws and regulations. Business Plan is a tool that helps a company to achieve its goals and objectives.

PESCO has started the business planning initiative / DIIP that will entail company's goals and objectives to the initiatives that are required to meet those objectives. The integrated cross-functional plan will cover the core business (transmission and distribution system expansion and rehabilitation) and support business (improving the commercial, financial, HR and other functional improvement) initiatives to meet the stated objectives. The PESCO's business plan for FY2016-2020 is prepared by PESCO by getting USAID PDP's assistance and will be update each year. In-order to sustain this initiative, a strategic planning organization is required within PESCO, who can assist the CEO of the Company to prepare, maintain, improve, monitor and get implemented the business plan.

The response is the restructuring of the planning organization. The proposed restructured planning organization includes (a) creation of a Strategic Planning Committee (SPC) to the Board (please see attached the Term of Reference (TOR) of SPC) (b) establishment of a Strategic Business Unit (SBU), headed by a Chief Strategy Officer (CSO) who reports to the CEO and (c) restructuring of Planning and Engineering Department. The position of General Manager Technical is also created, to whom CE P&E and CE PMU will report. The SBU will serve as the central resource for the Planning Organization, apart from other key positions, it also includes three implementation managers' positions for Commercial, HR and Financial initiatives implementation and support. As the core business (Transmission and Distribution) is planned, augmented and expanded through CE P&E, CE Development and two Project Directors, these three implementation managers under CSO will support the functional heads and the CSO in designing and implementing their respective initiatives.

Section - X Implementation, Monitoring Plan and Reporting

i. Implementation Schedules

Transmission Expansion and Rehabilitation

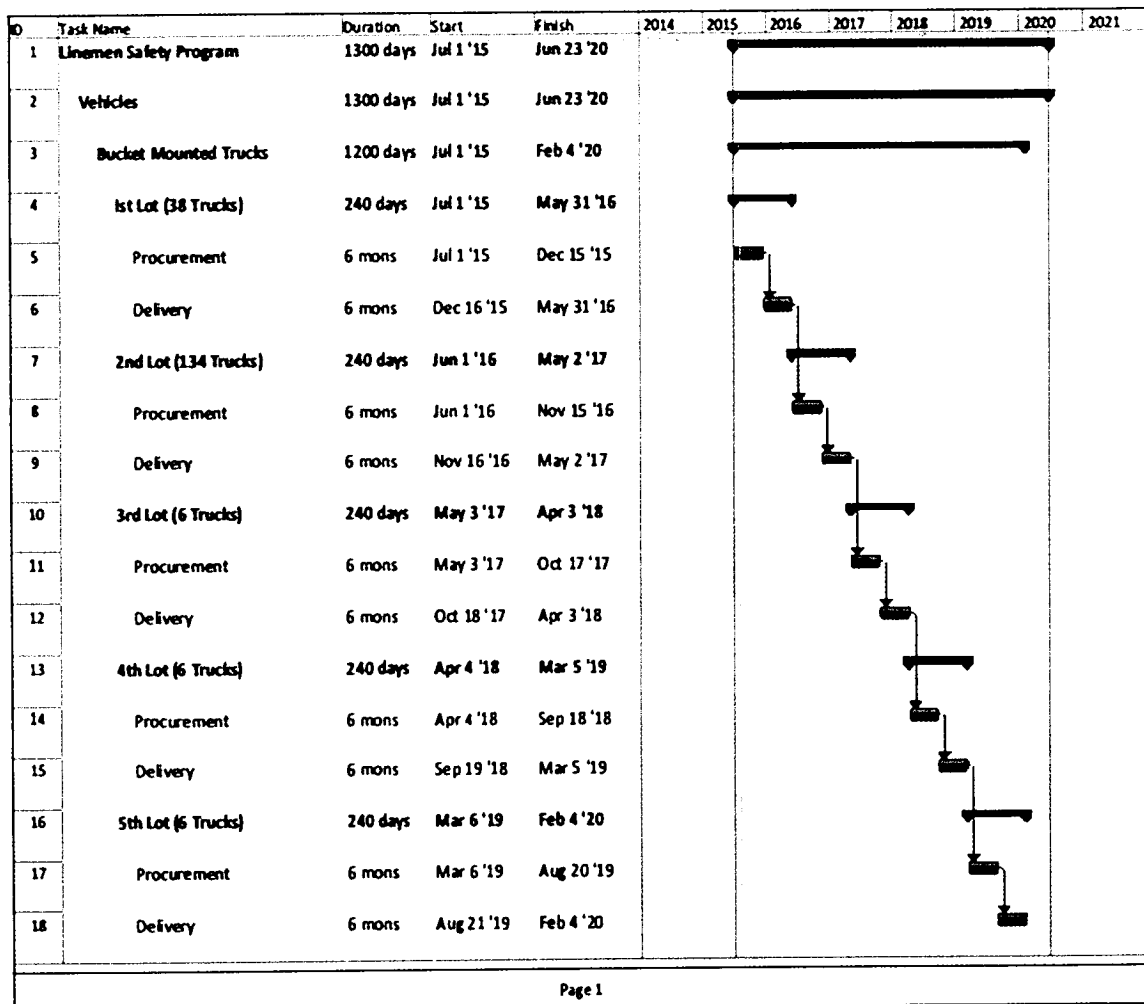
ID	Task Name	Duration	Start	Finish	2014	2015	2016	2017	2018	2019	2020	2021
1	Integrated Generation, Transmission & Distribution	1320 days	Jul 1 '15	Jul 21 '20								
2	Grid Stations-Exp. And Rehab.	1320 days	Jul 1 '15	Jul 21 '20								
3	Designing and Procurement	240 days	Jul 1 '15	May 31 '16								
4	Designing and Development	6 mons	Jul 1 '15	Dec 15 '15								
5	Procurement	6 mons	Jul 1 '15	Dec 15 '15								
6	Delivery	6 mons	Dec 16 '15	May 31 '16								
7	Expansion and Rehabilitation	1200 days	Dec 16 '15	Jul 21 '20								
8	New Grid Construction	60 mons	Dec 16 '15	Jul 21 '20								
9	Conversion	60 mons	Dec 16 '15	Jul 21 '20								
10	Augmentation	60 mons	Dec 16 '15	Jul 21 '20								
11	Extension	60 mons	Dec 16 '15	Jul 21 '20								
12	Transmission Lines	60 mons	Dec 16 '15	Jul 21 '20								
13	Designing and Procurement	240 days	Jul 1 '15	May 31 '16								
14	Designing and Development	6 mons	Jul 1 '15	Dec 15 '15								
15	Procurement	6 mons	Jul 1 '15	Dec 15 '15								
16	Delivery of Material	6 mons	Dec 16 '15	May 31 '16								
17	Expansion and Rehabilitation	1200 days	Dec 16 '15	Jul 21 '20								
18	New Transmission Lines	1200 days	Dec 16 '15	Jul 21 '20								
19	Reconductoring and Upgrading	60 mons	Dec 16 '15	Jul 21 '20								
20	Reconductoring and Rerouting	60 mons	Dec 16 '15	Jul 21 '20								
21	Fixed and Switch Capacitor Installation	60 mons	Dec 16 '15	Jul 21 '20								
22	Distribution System	1320 days	Jul 1 '15	Jul 21 '20								
23	Rehabilitation & Reconductoring	1320 days	Jul 1 '15	Jul 21 '20								
Page 1												

Distribution Expansion and Rehabilitation:

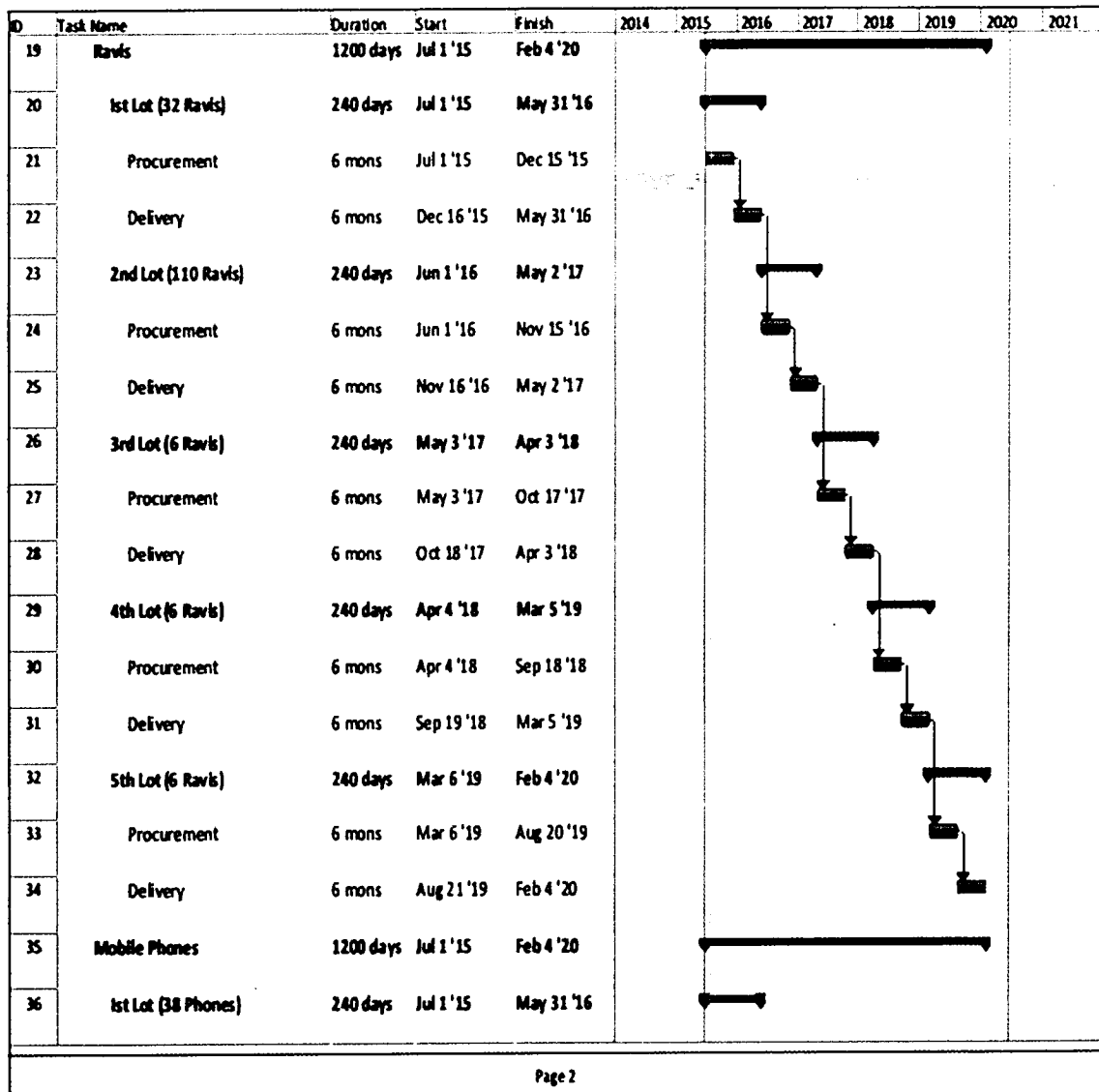
ID	Task Name	Duration	Start	Finish	2014	2015	2016	2017	2018	2019	2020	2021
24	Designing and Procurement	240 days	Jul 1 '15	May 31 '16								
25	Designing and Development	6 mons	Jul 1 '15	Dec 15 '15								
26	Procurement	6 mons	Jul 1 '15	Dec 15 '15								
27	Delivery	6 mons	Dec 16 '15	May 31 '16								
28	110kV and Below Rehabilitation	1200 days	Dec 16 '15	Jul 21 '20								
29	Rehabilitation of HT Lines	60 mons	Dec 16 '15	Jul 21 '20								
30	New HT Lines	60 mons	Dec 16 '15	Jul 21 '20								
31	LT Rehabilitation	1200 days	Dec 16 '15	Jul 21 '20								
32	Rehabilitation of LT Lines	60 mons	Dec 16 '15	Jul 21 '20								
33	Overloaded Transformers Augmentation	60 mons	Dec 16 '15	Jul 21 '20								
34	New Transformer Substation	60 mons	Dec 16 '15	Jul 21 '20								
35	Replacement of 2-Leg Transformers	60 mons	Dec 16 '15	Jul 21 '20								
36	New LT Lines	60 mons	Dec 16 '15	Jul 21 '20								
37	Expansion	1200 days	Dec 16 '15	Jul 21 '20								
38	110kV and Below Expansion	1200 days	Dec 16 '15	Jul 21 '20								
39	New HT Lines	60 mons	Dec 16 '15	Jul 21 '20								
40	Transformers	60 mons	Dec 16 '15	Jul 21 '20								
41	LT Expansion	1200 days	Dec 16 '15	Jul 21 '20								
42	New LT Lines	60 mons	Dec 16 '15	Jul 21 '20								
43	Transformers	60 mons	Dec 16 '15	Jul 21 '20								
44	Planning and Engineering Studies	1300 days	Jul 1 '15	Jun 23 '20								
45	GIS Mapping	64 mons	Jul 1 '15	May 26 '20								
46	Study Based Planning	53 mons	Jun 1 '16	Jun 23 '20								

Page 2

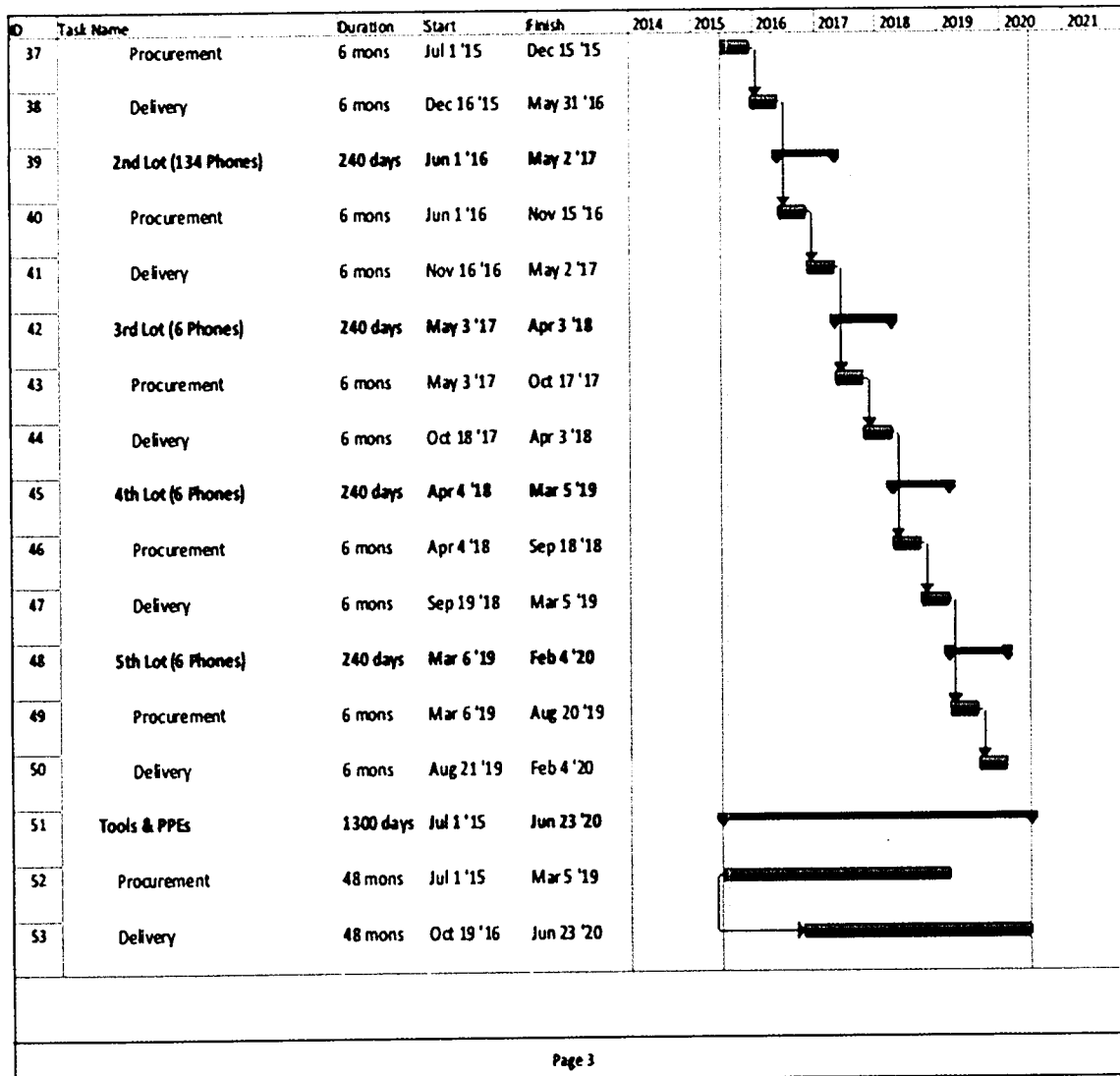
LM Safety, Tools and Equipment:



Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO



Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO



Commercial Plan Schedule:

ID	Task Name	Duration	Start	Finish	2014	2015	2016	2017	2018	2019
1	Commercial Improvement Plan	720 days	Jul 1 '15	Apr 3 '18						
2	MERCO-Wide HHU Expansion	480 days	Jul 1 '15	May 2 '17						
3	Mobile HHUs (1788 Units)	240 days	Jul 1 '15	May 31 '16						
4	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
5	Delivery	6 mons	Dec 16 '15	May 31 '16						
6	Other Equipment	240 days	Jul 1 '15	May 31 '16						
7	PCs (142)	240 days	Jul 1 '15	May 31 '16						
8	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
9	Delivery	6 mons	Dec 16 '15	May 31 '16						
10	Printers (142 Units)	240 days	Jul 1 '15	May 31 '16						
11	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
12	Delivery	6 mons	Dec 16 '15	May 31 '16						
13	DSL Connection (137 Units)	240 days	Jul 1 '15	May 31 '16						
14	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
15	Delivery	6 mons	Dec 16 '15	May 31 '16						
16	Furniture & Accessories (150 Units)	240 days	Jul 1 '15	May 31 '16						
17	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
18	Delivery	6 mons	Dec 16 '15	May 31 '16						
19	Split Air Conditioners (150 Units)	240 days	Jul 1 '15	May 31 '16						
Page 1										

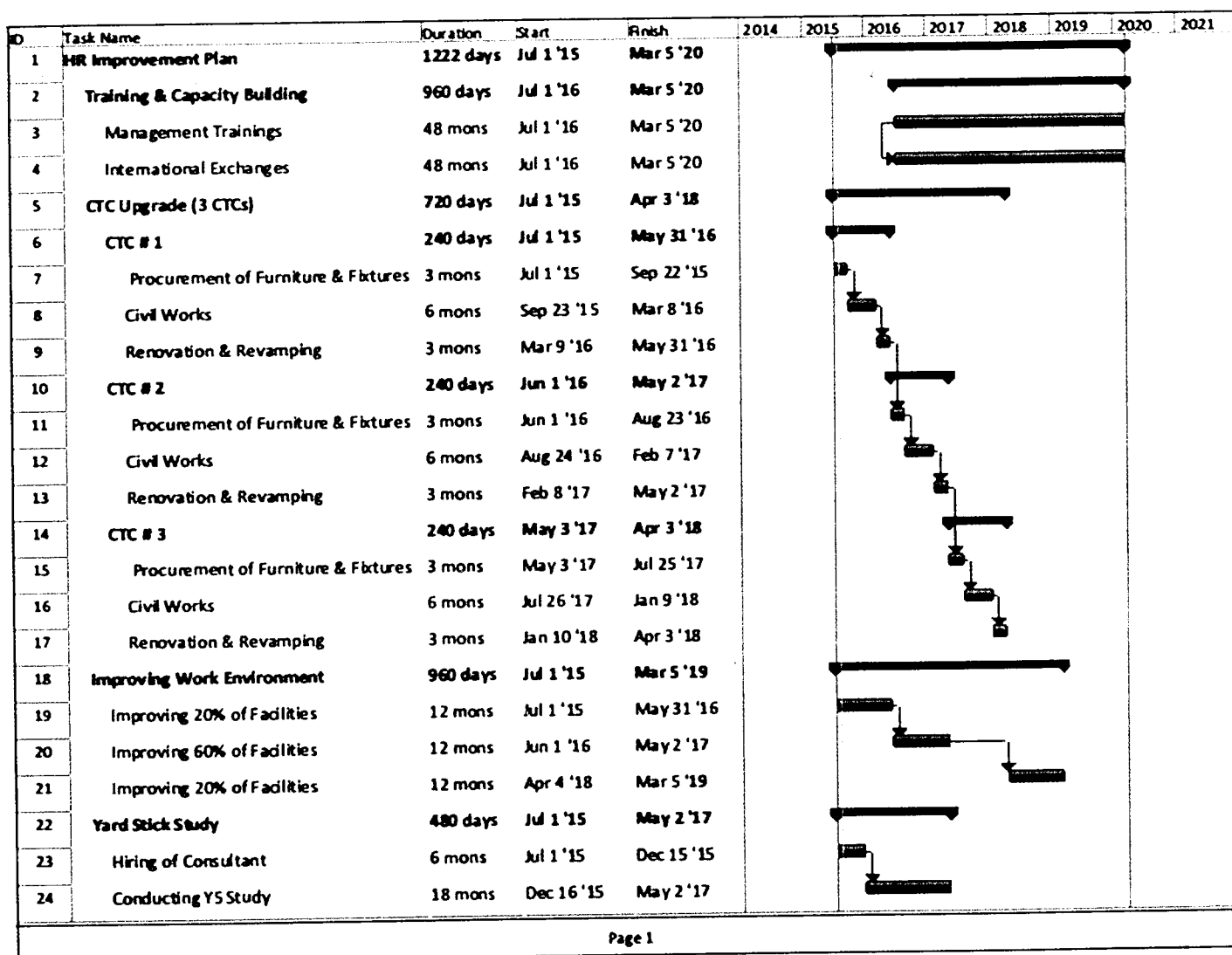
Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

ID	Task Name	Duration	Start	Finish	2014	2015	2016	2017	2018	2019
20	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
21	Delivery	6 mons	Dec 16 '15	May 31 '16						
22	Transportation	480 days	Jul 1 '15	May 2 '17						
23	Bikes (930 Units)	240 days	Jul 1 '15	May 31 '16						
24	Procurement	6 mons	Jul 1 '15	Dec 15 '15						
25	Delivery	6 mons	Dec 16 '15	May 31 '16						
26	Bikes (1395 Units)	240 days	Jun 1 '16	May 2 '17						
27	Procurement	6 mons	Jun 1 '16	Nov 15 '16						
28	Delivery	6 mons	Nov 16 '16	May 2 '17						
29	MEPCO-Wide AMR Expansion	240 days	Jul 1 '15	May 31 '16						
30	AMRS-Whole Current (61608 Units)	240 days	Jul 1 '15	May 31 '16						
31	Procurement	3 mons	Jul 1 '15	Sep 22 '15						
32	Supply	3 mons	Sep 23 '15	Dec 15 '15						
33	Installation	6 mons	Dec 16 '15	May 31 '16						
34	AMRS-HT/LT-for new connections (6252 Units)	240 days	Jul 1 '15	May 31 '16						
35	Procurement	3 mons	Jul 1 '15	Sep 22 '15						
36	Supply	3 mons	Sep 23 '15	Dec 15 '15						
37	Installation	6 mons	Dec 16 '15	May 31 '16						
Page 2										

Distribution Company Integrated Investment Plan (DIIP) / Business Plan - PESCO

ID	Task Name	Duration	Start	Finish	2014	2015	2016	2017	2018	2019
38	AMRs-Whole Current-for Tubewells (56599 Units)	240 days	Jul 1 '15	May 31 '16						
39	Procurement	3 mons	Jul 1 '15	Sep 22 '15						
40	Supply	3 mons	Sep 23 '15	Dec 15 '15						
41	Installation	6 mons	Dec 16 '15	May 31 '16						
42	MEPCO-Wide CTS Expansion	720 days	Jul 1 '15	Apr 3 '18						
43	IT Infrastructure Procurement	24 mons	Jul 1 '15	May 2 '17						
44	IT Infrastructure Deployment	24 mons	Jun 1 '16	Apr 3 '18						
45	Database Configuration and Updating	24 mons	Jun 1 '16	Apr 3 '18						
46	Customer Service Center Improvement (254 Facilities)	480 days	Jul 1 '15	May 2 '17						
47	Revamping of CSC Rooms	24 mons	Jul 1 '15	May 2 '17						
48	Provision of Furniture & Fixtures	24 mons	Jul 1 '15	May 2 '17						
49	Computing Equipment	24 mons	Jul 1 '15	May 2 '17						
50	MEPCO-Wide Surveillance for Anti-Theft	480 days	Jul 1 '15	May 2 '17						
51	Proc & Supply of 37 Toyota Hilux	24 mons	Jul 1 '15	May 2 '17						
52	Proc & Supply of Tooling Sets	24 mons	Jul 1 '15	May 2 '17						
53	Proc & Supply of Mobile Phones	24 mons	Jul 1 '15	May 2 '17						
Page 3										

HR Plan Schedule:



- ii. Monitoring of Outcomes, Physical and Financial Progress
Indicate Result Based Monitoring (RBM) framework indicators and physical and financial monitoring targets in quantifiable terms in the following table:

DIIP 48 - Monitoring of Outcomes, Physical and Financial Progress

Sr. No	Project	Output	Outcome		Physical Completion Targets (Nos)							Financial Progress Targets (Million Rs.)						
			Baseline Indicator	Targets after Completion of Project	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	Total
1																		
2																		
3																		
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iii. Linkage with Performance Standards⁸

DIIP 49 - Linkage with Performance Standards

Please refer to DIIP-4 for detailed mapping of benefits.

Section - XI

Environmental and Social Assessment and Mitigation Plans

There will be environmental and social impacts of the implementing these projects. A detailed environmental and social assessment is required to be carried out to successfully complete this project.

⁸ Please align this sub-section with benefits identified in Section VII

Acknowledgement

We gratefully acknowledge the valuable assistance provided to PESCO by USAID Power Distribution Program (PDP) in completing the DIIP / Business Plan for PESCO. The PDP's Business Planning Team supported by Policy Team, worked extremely hard with PESCO for not only preparing this plan but also building the capacity and bringing-in the organizational structural changes that are necessary for sustainability of this integrated cross-functional planning work.

DIIP-PESCO

ANNEXURE 1- 4

ANNEXURE- 1

34.0	132KV Khat C	132.0	62.8	39.8	39.8	39.8				39.8				39.8			39				39.8				
35.0	132KV Lachi	132.0	82.8	31.5	32.5	33.6	39.0	37.8	1.2	34.8	39.0	39.1	-0.1	36.0	39.0	40.3	1.4	37	39.0	41.3	2.8	38.5	45.0	43.3	21.7
36.0	132KV Locumot	132.0	82.8	12.0	12.0	12.0				12.0				12.0			12				12.0				
37.0	132KV Madyan	132.0		0.3	0.3	0.3				0.3				0.3			01				0.4				
38.0	132KV Mansehra	132.0	122.6	66.5	69.0	71.7	52.0	79.7	-12.7	74.4	52.0	82.7	-30.7	77.3	52.0	85.9	33.9	80	52.0	89.2	-37.2	83.4	92.0	92.7	-0.7
39.0	132KV Mardan II	132.0	122.6	75.6	67.4	69.8	80.0	77.6	2.4	72.3	66.0	80.3	-14.3	74.8	66.0	83.1	17.1	77	66.0	86.1	-20.1	80.2	80.0	89.1	-9.1
40.0	132KV Marikali	132.0	129.5	56.5	58.2	59.9	65.0	67.3	-2.3	61.7	65.0	69.3	-4.3	63.6	65.0	71.5	-6.5	65	65.0	73.6	-8.6	67.5	65.0	75.8	-10.8
41.0	132KV Murree	132.0	100.1	36.0	37.3	38.5				39.8				41.2			42				44.0				
42.0	132KV Murree-Koh	132.0	92.7	39.8	39.8	39.8				39.8				39.8											
43.0	132KV Murree-Koh	132.0	92.7	39.8	39.8	39.8				39.8				39.8											
44.0	132KV Nowsehra City	132.0	103.8	76.4	79.3	70.0	78.0	78.7	-0.7	64.7	78.0	72.7	5.3	67.2	78.0	75.5	2.5	69	78.0	78.4	-0.4	72.6	92.0	81.6	10.4
45.0	132KV Nowsehra Indu	132.0	102.7	45.7	47.5	49.4	52.0	55.5	-3.5	51.4	39.0	57.8	-18.8	53.5	39.0	60.1	21.1	55	39.0	62.5	-23.5	57.9	78.0	65.1	12.9
46.0	132KV Nathiagali	132.0	84.3	7.2	7.4	7.7	13.0	8.6	1.4	8.0	13.0	8.9	4.1	8.3	13.0	9.2	3.8	8	13.0	9.6	3.4	8.9	13.0	9.9	3.1
47.0	132KV New Wah	132.0	144.0	68.3	70.9	73.6				76.4				79.2				82				85.3			
48.0	132KV Nishat ter-bela	132.0	82.9	15.3	15.9	16.5	28.0	18.3	9.7	17.1	28.0	19.0	9.0	17.7	28.0	19.7	8.3	18	28.0	20.3	7.7	19.0	28.0	21.1	6.9
49.0	132KV Nizam Pur	132.0	15.3	8.3	8.6	8.9	13.0	10.0	3.0	9.2	13.0	10.3	2.7	9.5	13.0	10.7	2.2	9.5	13.0	11.1	1.9	10.2	13.0	11.5	1.5
50.0	132KV Peshawar	132.0	88.0	63.7	63.7	63.7	13.0	10.3	2.7	9.5	13.0	10.3	2.7	9.5	13.0	10.7	2.2	9.5	13.0	11.1	1.9	10.2	13.0	11.5	1.5
51.0	132KV Peshawar	132.0	88.0	63.7	63.7	63.7	13.0	10.3	2.7	9.5	13.0	10.3	2.7	9.5	13.0	10.7	2.2	9.5	13.0	11.1	1.9	10.2	13.0	11.5	1.5
52.0	132KV Peshawar	132.0	59.8	59.1	61.2	63.3	52.0	71.1	-19.1	65.5	52.0	73.6	-21.6	64.1	52.0	72.0	20.0	66.1	52.0	74.5	-22.5	68.6	92.0	77.1	14.9
53.0	132KV Peshawar	132.0	68.2	100.9	105.0	109.2	0.0	122.7	-122.7	113.6	0.0	127.6	-127.6	118.2	0.0	132.6	132.8	123.1	0.0	138.3	-138.3	128.1	0.0	143.9	-143.9
54.0	132KV Peshawar city	132.0	64.7	82.1	85.4	88.7	120.0	98.6	21.4	92.3	120.0	102.6	17.4	96.0	120.0	106.7	13.3	99.7	120.0	111.0	9.0	103.9	120.0	115.4	4.6
55.0	132KV Peshawar University	132.0	87.2	94.5	99.5	102.2	120.0	113.6	6.4	107.7	120.0	119.7	0.3	113.4	120.0	120.0	-6.0	119.4	120.0	132.7	-12.7	125.7	120.0	139.7	-19.7
56.0	132KV Peshawar Cant	132.0	94.6	60.9	63.6	66.4	104.0	73.8	30.2	69.3	104.0	77.0	27.0	72.4	104.0	80.4	23.6	75.7	104.0	84.1	19.9	79.1	132.0	87.9	44.1
57.0	132KV Peshawar fort	132.0	61.8	100.2	104.6	109.2	80.0	122.7	42.7	114.1	66.0	128.2	-62.2	119.1	66.0	133.8	-67.8	124.4	66.0	139.8	-73.8	129.9	80.0	146.0	-66.0
58.0	132KV Peshawar Industrial	132.0	96.6	62.3	65.1	68.0				71.1				74.4				77.1				81.4	106.0	90.4	15.6
59.0	132KV Petu Da	132.0	90.6	5.7	5.8	6.0				6.2				6.4				6.6				6.8			
60.0	132KV Peshawar	132.0	93.4	63.7	63.7	63.7				63.7				63.7				63.7				63.7			
61.0	132KV Rajjar	132.0	73.5	18.9	19.5	20.2	26.0	22.4	3.6	20.8	26.0	23.1	2.9	21.5	26.0	23.9	2.1	22.2	26.0	24.7	1.3	22.9	26.0	25.4	0.6
62.0	132KV Rehman baba	132.0	64.7	63.7	66.0	68.3	79.0	75.9	3.1	70.7	79.0	78.6	0.4	73.2	79.0	81.3	-2.3	75.3	79.0	84.2	-5.2	78.5	106.0	87.2	18.8
63.0	132KV Sheikh Mohammadi	132.0	66.7	25.8	27.0	28.2				29.5				30.9				32.1				33.6			
64.0	132KV Serai Nurang	132.0	98.9	56.6	58.5	60.5	52.0	68.0	-16.0	62.5	52.0	70.2	-18.2	64.6	52.0	72.6	20.6	66.1	52.0	75.1	-23.3	69.0	52.0	77.5	-25.5
65.0	132KV Sadi Ce	132.0	125.7	20.2	20.2	20.2				20.2				20.2				20.2				20.2			
66.0	132KV Sakhi Chasma	132.0	49.0	36.1	37.4	35.2	52.0	39.1	12.9	36.4	52.0	40.4	11.6	37.7	52.0	41.9	10.1	39.0	52.0	43.3	8.7	40.4	78.0	44.9	33.1
67.0	132KV Sawabi	132.0	88.9	97.0	100.4	103.9	92.0		92.0	107.6	92.0		92.0	111.4	92.0		52.0	115.4	92.0		92.0	119.5	106.0	132.8	-26.8
68.0	132KV Shabqadar	132.0	119.2	76.0	78.6	81.3	78.0	90.3	12.3	84.0	78.0	93.3	-15.3	76.1	78.0	84.6	6.6	78.7	78.0	87.4	-9.4	81.4	92.0	90.4	1.6
69.0	132KV Shahi Bagh	132.0	105.8	64.1	72.1	80.4	66.0	89.3	-23.3	58.9	52.0	98.8	-46.8	97.6	52.0	106.4	-56.4	106.5	52.0	118.3	-66.3	115.7	120.0	128.6	-8.6
70.0	132KV Shabqadar	132.0	85.0	85.0	85.0	85.0				85.0				85.0				85.0				85.0			
71.0	132KV Swat	132.0	115.2	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9	111.9
72.0	132KV Taja Zai	132.0	111.9	127.4	131.9	136.7	111.6	153.6	42.0	141.7	111.6	159.2	-47.6	128.5	111.6	144.4	-92.8	133.2	111.6	149.7	38.1	138.1	139.6	155.2	-15.6
73.0	132KV Taji	132.0	119.8	37.8	39.1	40.5	52.0	45.5	6.5	41.9	52.0	47.1	4.9	43.3	52.0	48.7	3.3	44.8	52.0	50.5	1.7	46.3	52.0	52.0	0.0
74.0	132KV Taji	132.0	132.0	36.0	37.2	38.5	39.0	43.8	4.8	39.8	39.0	45.2	-6.2	41.1	39.0	48.7	7.7	42.5	39.0	48.3	9.3	43.9	52.0	49.9	1.9

74.0	132KV Tangi	132.0	70.0	-2.1	53.9	55.8	52.0	62.7	10.7	57.7	52.0	64.8	-12.8	59.7	52.0	61.1	15.1	61.8	12.0	69.4	-17.4	64.0	92.0	71.9	20.1	
75.0	132KV Tank	132.0	99.6	-0.4	63.8	67.3	39.0	74.8	35.8	70.9	39.0	78.8	-39.8	74.6	39.0	86.9	13.9	78.5	39.0	87.2	-48.2	82.4	65.0	91.6	26.6	
76.0	132KV Tarnawa	132.0	148.6	4.9	4.9	4.9				4.9				4.9		86.9		4.9								
77.0	132KV Timergera	132.0	102.7	-1.9	63.9	66.1	65.0	73.4	8.4	68.3	65.0	75.9	-10.9	70.5	65.0	86.9	12.3	72.9	65.0	81.0	-16.0	75.4	91.0	83.8	7.2	
78.0	132KV Warsak	132.0	124.0	13.9	35.0	36.0	39.0	42.4	-3.4	37.1	39.0	43.6	-4.6	38.2	39.0	44.9	5.9	39.3	39.0	46.2	-7.2	40.5	39.0	47.6	-8.6	
79.0	132KV Best Way	132.0	88.9	-3.2	23.2	23.2				23.2				23.2		44.9		23.2				23.2				
80.0	132KVMattani	132.0	92.0	-6.1	16.8	17.5				18.3				19.0		44.9		19.8				20.6				
81.0	33KV Hattian	132.0	61.3	9.5	9.0	9.4	9.8	13.0	10.9	2.1	10.2	13.0	11.3	1.7	10.6	13.0	11.8	1.2	11.1	13.0	12.3	0.7	11.6	13.0	12.9	0.1
82.0	Azad Mandi Ba	132.0		0.0	0.0	0.0				8.6				8.8				9.1				9.4				
83.0	Ranikot Swat	132.0		0.0	0.0	0.0				0.0				18.4				19.1				19.8				
84.0	Batkheila	132.0		0.0	0.0	0.0				18.2				18.9				19.6				20.4				
85.0	Chattar Class	33.0		0.0	0.0	0.0				0.0				0.0				0.0				0.0				
86.0	Cherat Ind Pa	132.0		0.0	0.0	0.0				0.0				3.7				3.8				3.9				
87.0	DI KHAN INDUS	132.0		0.0	0.0	20.8				21.5				22.3				23.1				23.9				
88.0	DI KHAN-2	132.0		0.0	0.0	0.0				17.9				18.5				19.1				19.8				
89.0	Dhobian	132.0	36.8	0.0	10.9	11.3				11.6				12.0				12.4				12.8				
90.0	Garam Chishma	132.0		0.1	0.1	0.1				0.1				0.1				0.1				0.1				
91.0	Hasan Zai	132.0		0.0	0.0	0.0				0.0				8.3				8.5				8.8				
92.0	NSR Kaka Sahi	132.0		0.0	0.0	12.3				12.8				13.3				13.7				14.2				
93.0	NSR Ridi Indu	132.0		0.0	0.0	0.0				8.0				8.2				8.5				8.9				
94.0	Naguman	132.0		0.0	0.0	0.0				0.0				11.9				12.3				12.7				
95.0	SIRAJ BASA KA	132.0		0.0	0.0	5.3				5.5				5.7				5.9				6.1				
96.0	Sahir Abad	132.0		0.0	0.0	0.0				17.2				17.7				18.2				18.8				
97.0	Chota Lahor	132.0		0.0	0.0	9.9				10.3				10.6				11.0				11.3				
98.0	Turbella P/H	132.0		4.3	4.5	4.6	39.0	5.3	33.7	4.8	39.0	5.5	33.5	4.9	39.0	5.6	33.4	5.1	39.0	5.9	33.1	5.3	39.0	6.1	32.9	
99.0	Warsak Road P	132.0		0.0	0.0	6.1				6.2				6.4				6.6				6.8				
100.0	66KV Abbott Abad	66.0	R	7.8	8.0	9.3	13.0	9.3	3.7	8.6	13.0	9.7	3.3	8.9	13.0	10.0	3.0	9.2	13.0	10.3	2.7	9.5	13.0	10.7	2.3	
101.0	66KV Badaber	66.0	101.8	18.8	19.5	20.2	17.5	22.7	-5.2	21.0	17.5	23.6	-6.1	21.8	17.5	24.5	-7.0	22.6	17.5	25.4	-7.9	23.4	17.5	26.3	-8.8	
102.0	66KV Band Kurai	66.0	157.8	10.8	11.1	11.5	20.5	12.9	7.6	11.9	20.5	13.4	7.1	12.3	20.5	13.8	6.7	12.8	20.5	14.4	6.1	13.2	20.5	14.8	5.7	
103.0	66KV Bankoral	66.0	211.3	39.3	40.6	42.0				33.8				34.9				36.0				37.2				
104.0	66KV Daggar	66.0	52.1	6.2	6.5	6.7	13.0	7.9	5.1	6.9	13.0	8.1	4.9	7.1	13.0	8.4	4.6	7.4	13.0	8.7	4.3	7.6	13.0	8.9	4.1	
106.0	66KV Dir	66.0	108.7	14.4	14.8	15.3	13.0	8.9	4.1	7.9	13.0	9.3	3.7	8.2	13.0	9.6	3.4	8.5	13.0	10.0	3.0	8.8	13.0	10.4	2.6	
107.0	66KV Draban	66.0	98.3	12.7	13.1	13.6	13.0	16.0	-3.0	15.9	13.0	17.9	-4.9	16.4	13.0	18.4	-5.4	16.9	13.0	19.0	-6.0	17.5	13.0	19.7	-6.7	
108.0	66KV Haripur	66.0	85.3	12.7	13.1	13.6	13.0	16.0	-3.0	15.9	13.0	17.9	-4.9	16.4	13.0	18.4	-5.4	16.9	13.0	19.0	-6.0	17.5	13.0	19.7	-6.7	
109.0	66KV Havelian	66.0	98.0	20.3	21.3	22.3	26.0	25.3	0.7	23.3	26.0	26.5	-0.5	24.4	26.0	27.7	-1.7	25.6	26.0	29.1	-3.1	26.8	26.0	30.5	-4.5	
110.0	66KV Jhelum	66.0	78.3	0.0	0.0	0.0	33.0	43.0	9.0	30.6	33.0	43.0	9.0	30.6	33.0	43.0	9.0	30.6	33.0	43.0	9.0	30.6	33.0	43.0	9.0	
111.0	66KV Jalala	66.0	54.0	0.0	0.0	0.0				0.0				0.0				0.0				0.0				
112.0	66KV Khashtki	66.0	94.9	0.9	1.0	1.0	2.5	1.1	1.4	1.1	2.5	1.3	1.3	1.1	2.5	1.3	1.3	1.2	2.5	1.4	1.1	1.2	2.5	1.4	1.1	
113.0	66KV Kohat	66.0	93.3	9.5	9.9	10.2	9.3	11.3	-2.0	10.6	9.3	11.8	-2.5	11.0	9.3	12.2	-2.9	11.4	9.3	12.7	-3.4	11.9	9.3	13.2	-3.9	
114.0	66KV Kulachi	66.0	87.3	11.9	12.2	12.6	13.0	14.0	-1.0	13.1	13.0	14.6	-1.6	13.5	13.0	15.0	-2.0	13.9	13.0	15.4	-2.4	14.4	13.0	16.0	-3.0	
115.0	66KV Kurram Garhi	66.0	134.8	24.3	25.2	26.1	6.3	29.0	-22.7	27.1	6.3	30.1	-23.8	28.1	6.3	31.2	-24.9	29.1	6.3	32.3	-26.0	30.1	6.3	33.4	-27.1	
116.0	66KV Kurram G	66.0	81.3	9.6	9.9	10.2				10.5				10.8				11.2				11.5				
117.0	66KV Peshawar	66.0	52.3	2.4	2.8	3.3				2.6				3.0				3.4				3.8			15.0	
118.0	66KV Tajawal	66.0	115.6	14.9	15.4	15.9				16.5				17.1				17.7				18.3	28.0	20.3	7.7	
119.0	66KV Tarnawa	66.0	124.4	10.1	10.7	11.3	13.0	23.8	-4.1	20.8	13.0	25.3	-6.2	22.4	13.0	26.0	-7.0	23.0	13.0	27.5	-8.0	24.5	13.0	28.0	-8.5	
120.0	66KV Wari	66.0	179.2	24.5	25.2	26.0	13.0	28.9	-15.9	26.7	13.0	29.7	-16.7	27.5	13.0	30.6	-17.6	28.3	13.0	31.4	-18.4	29.1	13.0	32.3	-19.3	
121.0	66KV Wazirabad	66.0	101.4																							
122.0	33KV Daroosh	33.0	96.2	1.6	1.7	1.7	1.5	2.0	-0.5	1.8	1.5	2.1	-0.6	1.8	1.5	2.1	-0.6	1.9	1.5	2.2	-0.7	2.0	1.5	2.4	-0.9	
123.0	33KV Jutlash	33.0	82.1	3.0	3.1	3.2	8.0	3.8	4.2	3.3	8.0	3.9	4.1	3.4	8.0	4.0	4.0	3.5	8.0	4.1	3.9	3.6	8.0	4.2	3.8	
124.0	33KV Majohi	33.0	R	0.0	0.0	0.0				0.0				0.0				0.0				0.0				
125.0	33KV Pattan	33.0	124.4	1.7	1.7	1.8	4.0	2.0	2.0	1.8	4.0	2.0	-2.0	1.9	0.0	2.2	-2.2	2.0	0.0	2.3	-2.3	2.0	4.0	2.3	1.7	
126.0	33KV Thakot	33.0	126.9	15.1	15.7	16.2	12.0	19.1	-7.1	16.8	12.0	19.8	-7.8	17.3	12.0	20.4	-8.4	17.9	12.0	21.1	-9.1	18.6	12.0	21.9	-9.9	
127.0	Chitral P/H	0.0	114.4	1.7	1.8	1.9				2.0				2.1				2.2				2.3				
	Total	C 4		176.4	4488.3	4707.2				4934.1				5168.0				5411.5				5663.1				

PESCO STRATEGIC GOALS & OBJECTIVES

Strategic Goals	Strategic Objectives	Concerned Directorate (s)	Leading Directorate (s)	Target Measurement	Measurement FY 2014	5 year Goal FY 2016-2020	Project Planners	Supporting Plan
1.0 Improve Operational Efficiency	1.1 Reduce technical and commercial losses to 15% (11% technical and 7% commercial) - HT/LT ratio - Improve power factor - Improve voltage profile - Reduce average length of HT feeders - AT&C based investments - Single phase transformers piloting to hard areas w/o LT - ABC expansion (conversion of bare LT with HT)	P&E, PD Const, PD GSC, MM, Fin, Comm, Ops, MIS	Technical	%age of kWh	33%	25%	Fazle Rabbi and Kashif Kareem (dist)	IGTDP & Commercial Loss Reduction Plan
	Reduce Commercial Loss	Comm, Ops, Legal, PR	Commercial & Ops	%age of kWh			Musawwir Shah and Ataullah (MIS), Dr. Amjad	
	1.2.1 Improve SAIDI/SAIFI to meet specified regulatory performance standards in Hard Area	P&E, PD Const, PD GSC, MM, Fin, Comm, Ops, MIS	Ops	hours/numbers	Currently above NEPRA's prescribed performance standards	Improvement by 20%	Jehanzeb (DD Tech with COO)	IGTDP & Maintenance Plans
	1.2.2 Improve SAIDI/SAIFI to meet specified regulatory performance standards in Soft Area	P&E, PD Const, PD GSC, MM, Fin, Comm, Ops, MIS		hours/numbers		Improvement by 60%		
	1.3 Improve collections to 100%	Comm, Ops, PR	Commercial	%age of billing	86%	95%	Musawwir Shah (Mgr Comm)	Commercial Over: II Improvement Plan including collections
	1.4.1 Eliminate fatal accidents	Ops, HR, MM	Ops	No. of accidents	In double figures per year	Eliminate	Arbab Munir (DD Safety)	Safety Plan
	1.4.2 Eliminate non fatal accidents	Ops, HR, MM	Ops	No. of accidents	In double figures per year	Eliminate	Arbab Munir (DD Safety)	Safety Plan
2.0 Improve Customer Services and Care	2.1.1 "Soft area" Reduction in billing complaints to less than 1%	Ops, Comm, MIS, PR	Commercial	%age of total consumers	Over 10%	<1%	Musawwir Shah, DCMs	Commercial Improvement Plan (CIP)
	2.1.2 "Hard area" Reduction in billing complaints to less than 5%	Ops, Comm, MIS, PR	Commercial	%age of total consumers	Over 25%	10%	Musawwir Shah, DCMs	
	2.2 Minimize New Connections installation duration	Ops, O&M Dist, CSD, MM	Commercial	No of days	NEPRA's standards not met	NEPRA's standards to be met	Jehanzeb	
	2.3 Minimize Reconnection installation duration	Ops, O&M Dist, CSD, MM	Commercial	No of days	NEPRA's standards not met	NEPRA's standards to be met	Jehanzeb	
	2.4 Minimize the redressal time for supply complaints	Ops, MIS, CSD, O&M Dist	MIS	Avg. time in hours	NEPRA's standards not met	NEPRA's standards to be met	Jehanzeb	

ANNEXURE - 3



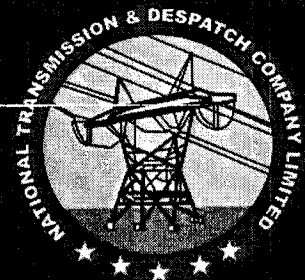
PESCO

**PESHAWAR ELECTRIC SUPPLY COMPANY
ELECTRICITY DEMAND FORECAST
BASED ON
POWER MARKET SURVEY**

TWENTY FOURTH ISSUE

PERIOD 2014 TO 2024

**JOINTLY PREPARED BY PESCO
UNDER THE SUPERVISION OF
PLANNING POWER, NTDC
MAY 2015**



■ Executive Summary

Executive Summary

Peshawar Electric Supply Company (PESCO) is supplying power to civil divisions of Peshawar, Mardan, Bannu, Malakand, Dera Ismail Khan, Hazara and Kohat. This company came into existence in the year 2001 after unbundling of WAPDA system. Earlier it was known as Peshawar Area Electricity Board (AEB) in the year 2001, its distribution network comprised of fifty nine 132 kV, thirty two 66 kV sub-stations and by year 2013-14, eighty two 132 kV, eleven 66 kV and five 33 kV sub-stations have started to function in the company.

Peak demand of PESCO in the year 2013-14 was recorded as; 1929 MW, energy sale was 7471 GWh and energy purchased was 11378 GWh. The shares of domestic sector and industrial sector were 60.00% and 28.78% respectively with respect to energy total sale, which is not a healthy sign. The total number of consumers in this year were 2.87 million out of which domestic consumers were 2.52, commercial were 0.29 and agricultural consumers were 0.023 million. In the year 2013-14, PESCO total sale in terms of megawatt was 1252 MW, for the domestic sector it was 783 MW while for the medium & large industries and small industries it was 415 MW and 15 MW respectively.

This forecast has been computed on the basis of Power Market Survey (PMS) methodology by the PESCO (PMS) team under the supervision of planning power, (NTDCL). The year 2013-14 has been taken as base year and the forecast horizon is ten years up to 2023-24. The base year sale data (feeder wise consumer category-wise energy sale) and the expected spot loads data at the locations of different sub-stations have been collected by PESCO power market survey team. Data for the base year has also been adjusted for the estimates of unserved energy (load shedding) in order to have realistic figures.

Forecast results show that energy sale will be 11084 GWh and 17876 GWh, peak demand will be 3574 MW and 4677 MW and energy purchased will be 16659 GWh and 26036 GWh by the years 2017-18 and 2023-24 respectively. The annual average compound growth rate of energy sale, peak demand and energy purchased will be 9.12%, 4.69% and 8.63% respectively by the year 2023-24 with respect to 2013-14.

To further refine the forecast and making it helpful for planners following additions have been made in this issue;

- Civil Administrative Division-wise energy and demand forecast
- Civil Administrative District-wise energy and demand forecast
- Month-wise demand projection
- Overloaded 132 kV substations
- List of existing substations with their MVA capacities

A realistic forecast, saves over investment as well as under investment, meaning thereby timely recovery of revenue and no constraints in the supply of power (load shedding) respectively. This kind of forecast can only be prepared by applying proper methodology with authentic data. The results of previous PMS forecasts were very close to the actual which proves the authenticity of methodology and data. This report highlights the salient features of load forecast of the company.

Planning Power, NTDCL firmly believes that the reader's comments/suggestions on this report will help in improving energy and demand forecast in future.

Table of Contents

Table of Contents

1	Introduction	1
2	Historical Supply And Demand Analysis.....	3
2.1	Category-wise Sale	3
2.2	Transmission and Distribution Losses.....	4
2.3	Recorded and Computed Peak Demand.....	5
2.4	Number of Consumers.....	5
3	Power Market Survey Methodology.....	6
3.1	Overview	6
3.2	Survey Base Data.....	6
3.3	Input Parameters	7
3.4	Growth Rates	8
3.5	Losses	8
3.6	Load Factors	8
3.7	Coincidence Factors	9
3.8	Forecast Calculations	10
3.9	Energy Calculations	10
3.10	Peak Demand Calculations.....	10
3.11	Accumulations.....	10
4	PMS Forecast Results.....	11
4.1	Recorded Forecast (Excluding Load Shedding)	11
4.2	Computed Forecast (Including Load Shedding)	11
4.3	Category-wise Forecasted Energy Sale (GWh).....	12
4.4	Category-wise Forecasted Energy Sale (GWh).....	13
4.5	Peak Demand of Substations	13
4.6	Per capita consumption	13
4.7	Category-wise Substation-wise Energy and Demand Projections	14
4.8	Civil Administrative Area Forecast.....	14
4.9	Monthly Demand (MW) Projections.....	14
4.10	List of 132 kV Overloaded Sub-Stations.....	14
4.11	List of Existing Sub-Stations with their Codes and MVA Capacities.....	14
	Disclaimer.....	69

■ List of Figures

List of Figures

Figure 1- 1: Computed Demand Forecast.....	1
Figure 1- 2: Historical Category-wise Sale.....	3
Figure 1- 3: Historical Transmission and Distribution Losses.....	4
Figure 1- 4: Historical Recorded and Computed Peak Demand	5
Figure 1- 5: Number of Consumers	5
Figure 1- 6: Computed Peak Demand.....	11
Figure 1- 7: Energy Purchased VS Energy Sale	11
Figure 1- 8: Forecasted Category-wise Sale	12
Figure 1- 9: Per Capita Consumption	13
Figure 1- 10: Distribution Network Map	72

List of Tables

List of Tables

Table 1- 1: PMS Recorded Forecast (Excluding Load Shedding).....	15
Table 1- 2: PMS Base Forecast.....	16
Table 1- 3: Category-wise Sale – GWh (Excluding Load Shedding).....	17
Table 1- 4: Category-wise Sale – GWh (Base Forecast)	18
Table 1- 5: Category-wise Demand – MW (Excluding Load Shedding).....	19
Table 1- 6: Category-wise Demand – MW (Base Forecast).....	20
Table 1- 7: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Peshawar	21
Table 1- 8: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District : Charsadda.....	22
Table 1- 9: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Nowshehra	23
Table 1- 10: District-Wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Mardan.....	24
Table 1- 11: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Sawabi.....	25
Table 1- 12: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Kohat.....	26
Table 1- 13: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Hangu.....	27
Table 1- 14: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Karak.....	28
Table 1- 15: District-wise Sale (GWh) , Generation (GWh) and Demand (MW) Forecast for District: Bannu	29
Table 1- 16: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Lakki	30
Table 1- 17: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: D.I.Khan.....	31
Table 1- 18: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Tank	32
Table 1- 19: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Swat	33
Table 1- 20: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Bunair.....	34
Table 1- 21: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Dir	35

■ List of Tables

Table 1- 22: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Abbotabad.....	36
Table 1- 23: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Haripur.....	37
Table 1- 24: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Mansehra.....	38
Table 1- 25: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Batagram.....	39
Table 1- 26: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Peshawar.....	40
Table 1- 27: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Mardan.....	41
Table 1- 28: Division-wise Sale (GWh) , Generation (GWh) and Demand (MW) Forecast for Division: Kohat.....	42
Table 1- 29: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Bannu.....	43
Table 1- 30: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: D.I.Khan.....	44
Table 1- 31: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Malakand.....	45
Table 1- 32: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Hazara.....	46
Table 1- 33: Month-wise Peak Demand Forecast.....	47
Table 1- 34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24	48
Table 1- 35: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24	53
Table 1- 36: List of Existing Sub-Stations with their Codes and MVA Capacities.....	57
Table 1- 37: Maximum Demand of Substations	60
Table 1- 38: Category wise Energy and Demand of Substations	66

1 Introduction

The present report of Power Market Survey forecast is the 24th issue, jointly prepared by PESCO and Planning Power NTDC. This report contains year wise detailed forecast of energy and demand for the whole company and each sub-station within the company. In addition to that civil administrative area forecast like divisions and districts within the company are also computed and depicted in different tables. The forecasted peak demand of PESCO has graphically presented in Figure 1-1.

Load forecasting is an important element of the power planning process involving prediction of energy and demand. The forecast serves as the basis for demand and supply-side planning. Load forecasts are typically prepared by utilities for different time frames depending upon the different planning applications and operations.

Long term planning requires a system level forecast of total generation requirement and peak demand. On the other hand transmission and distribution planning require more load level and geographic detail to assess location, timing and loading of individual lines, substation and transformation facilities.

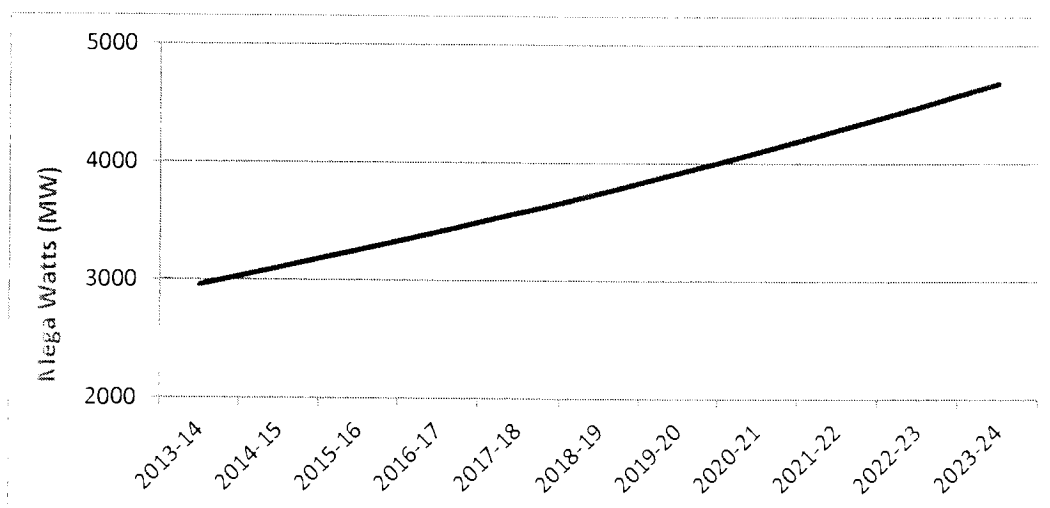


Figure 1- 1: Computed Demand Forecast

Forecasting models fall into three general categories:

- Trend models.
- Econometric based models.
- End-use models.

Trend forecasts graphically or mathematically extrapolate past electricity demand trends into the future. They may be inadequate for shorter time periods where demographic changes in the underlying casual factors of load growth are not anticipated. Econometric models represent a more complex 'top down' approach to forecasting and rely on the observed or the implied relationship between past energy consumption and other variables defining past economic

output, demographics and price or income variables. Such models employ a combination of econometric, regression and time series forecast techniques. End-use models relate energy use to the physical appliance stock levels, to the use patterns or to the industrial process. These end use models represent a 'bottom-up' forecasting approach and normally incorporate disaggregate end use forecast and consumer survey techniques.

This report has been prepared on the basis of Power Market Survey Methodology and the model used is called Power Market Survey (PMS) model. This model is a form of end use model which provides energy and power projection for all distribution companies and all grid stations within the company.

The PMS model relies on an extensive data base of historical sales. The data base includes consumption by consumer type (i.e. domestic, industrial and commercial etc.) on a grid station and grid station feeder basis. Actual consumption data are adjusted for unserved demands attributed to load shedding.

Energy forecasts are computed for each consumption category at the sub area level on the basis of a trend analysis of recent per consumer sales plus new consumer connection applications. Industrial forecasts are based on interviews with existing consumers, trend projections and a review of the applications for request of new and increased service. These analyses are repeated for each sub area for each of the years to be forecast. The annual peak demand is determined from the resulting energy forecasts by using the load factors and diversity factors developed for each consumer category. Forecasts are then aggregated to system level.

Because the PivIS forecast is based on a mix of end-use, trend projection and known consumer expansion plans, it cannot be used reliably to predict demand over the longer term. This model had not been created to predict impacts of changes in growth of different economic sectors or consumers categories over time, or changes in both the absolute and relative prices of electricity and of changes in the relationships between income growth and electricity growth over time as a result of market saturation and technological change (in order to capture these changes NTDC is using another model called regression model). Regression model is used for long term forecasting as the changes in growth rate are occurred due to change in technology, life style over a longer time period.

The Power Market Survey forecast model most closely approaches the requirements of power system planning. It provides the level of detail required for siting studies and transmission and substation planning, as well as the sectoral detail necessary to assess differential sector growth rates and their impacts on load shapes, both system wide and by DISCO and by grid station. In addition, because it makes specific provision for load shedding and suppressed demand, it provides a reasonable approximation of unconstrained load growth.

2 Historical Supply And Demand Analysis

2.1 Category-wise Sale

The costumers within the company can be segregated in different categories. The segregation is usually based upon the type of applications for which electricity is being used. Major categories include Domestic, Commercial, Small industries, Medium & Large industries and Agriculture.

The category-wise percentage sale for the years 2003-04, 2006-07, and 2013-14 are given in Figure 1-2.

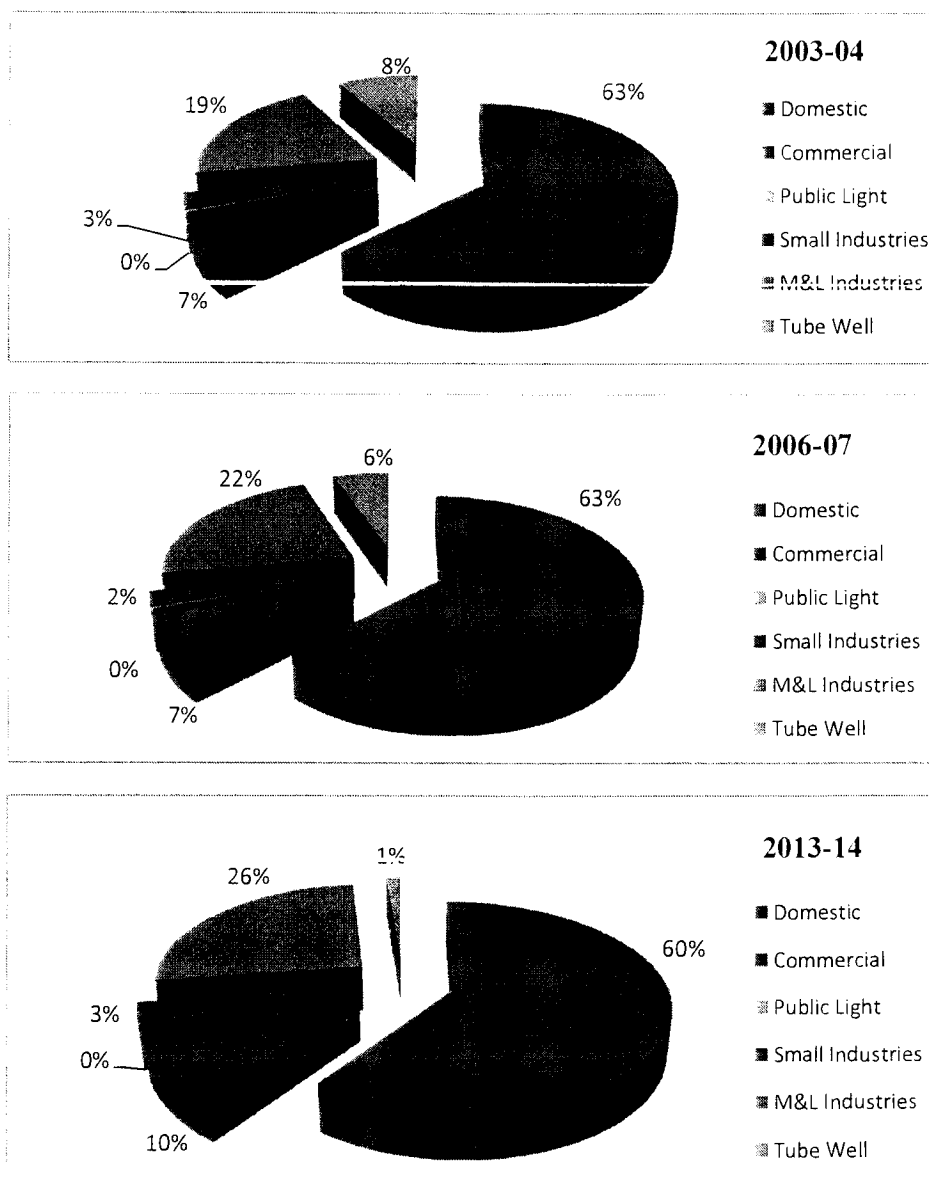


Figure 1- 2: Historical Category-wise Sale

2.2 Transmission and Distribution Losses

In our system losses are divided into two types;

- Transmission Losses
- Distribution Losses

The losses on 132 kV and 11kV transmission lines are considered as Transmission Losses where as the losses on 11 kV and 440 Volts lines supplying the consumers are called Distribution Losses. In a system, generally the high losses are due to lack of proper maintenance and element of theft. Reduction in losses can be achieved, by installing proper size of conductor in 11kV feeders, low tension lines and by installing capacitor banks, to reduce reactive power and thereby improving power factor. Energy sent out is shown in the form of its breakup as sale, distribution losses and transmission losses with their percentages in the figure 1-3 for the year 2010-11, 2011-12 and 2013-14.

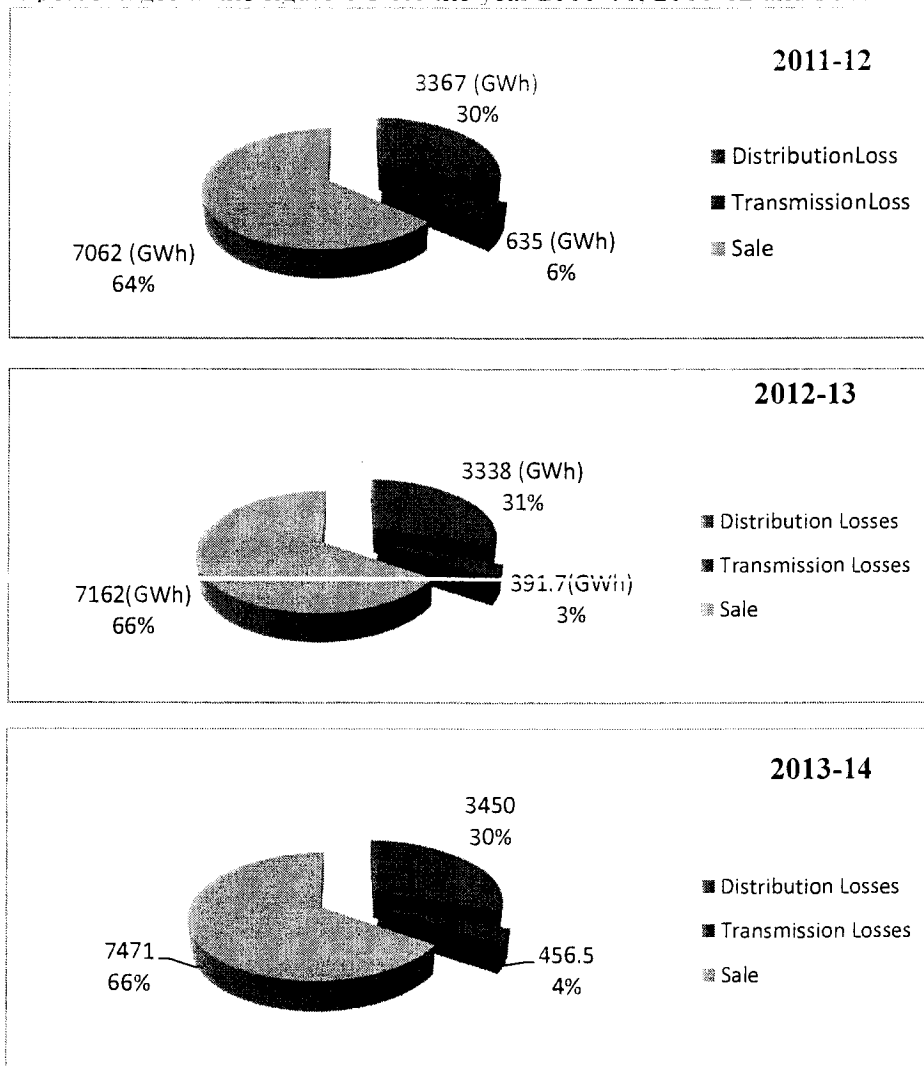


Figure 1- 3: Historical Transmission and Distribution Losses

2.3 Recorded and Computed Peak Demand

Recorded demand is the highest electricity demand or maximum power supplied to the consumers during the base year. Computed peak demand is calculated by adding the element of unserved power into the figure of recorded peak. Figure 1-4 shows the recorded and computed peak demand (MW) from the year 2008-09 to 2013-14. Figure 1-4 shows the recorded and computed peak demand (MW) from the year 2008 to 2013.

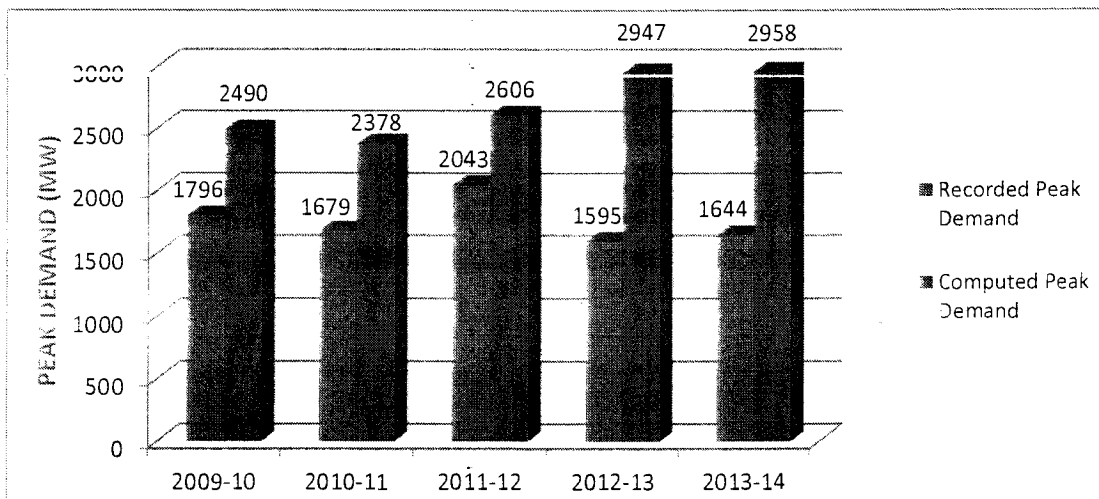


Figure 1- 4: Historical Recorded and Computed Peak Demand

2.4 Number of Consumers

Historical record of number of consumers within PESCO service area is given in Figure 1-5. These consumers are from all categories; i.e. Domestic, Commercial, Small industries, Medium & Large industries, Public Lighting, Bulk and Agriculture.

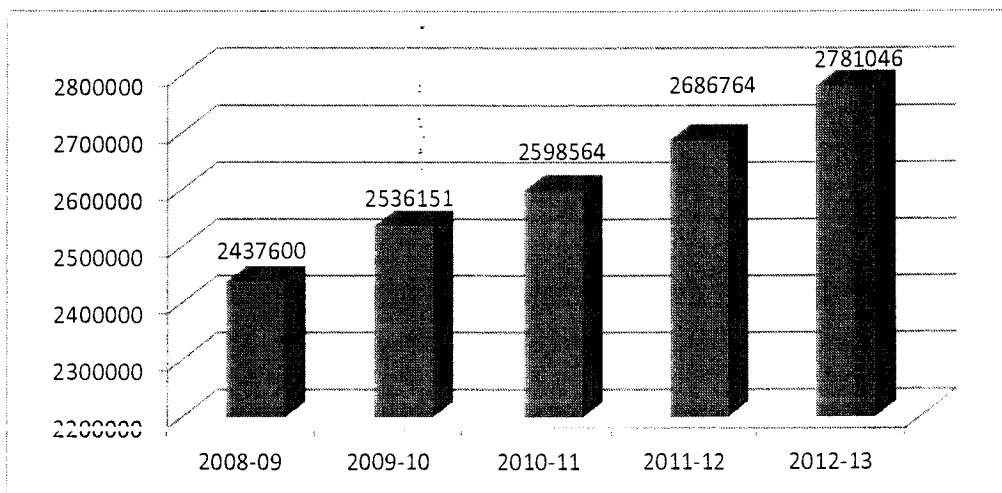


Figure 1- 5: Number of Consumers

3 Power Market Survey Methodology

3.1 Overview

The Power Market Survey Model forms the basis of the Medium Term Forecast. It produces an energy and peak demand forecast over a ten year period by consumption category and by grid station for the entire service area. The Model has three inter-related components: the main database, the basic input parameters and the calculations themselves.

The energy consumption data base obtained through the power market survey is immense. It contains base year consumption data for existing consumers and ten year's forecast data for new consumers for each consumer category within the company. In addition, there is separate information for peak demand in medium & large industries and traction categories. Because of its volume this data is not listed as part of this report.

In addition to the data base, a number of basic input parameters form an integral part of the forecast model which are separately prepared for each DISCO. These include:

- Growth rates: the annual increase in consumption per consumer by consumption category.
- Loss rates: transmission and distribution losses expressed as a percentage of energy purchased and energy sold, respectively.
- Load factors: relating the amount of energy consumed to the rate at which it is consumed (that is, the peak demand) for each consumption category.
- Coincidence factors: describing the load diversity within the system.

The forecast calculations within the model combine the energy consumption data and the input parameters to compute the energy and peak demand requirements within each area for each year to be forecast. The data are accumulated from the area basis, to grid stations, to DISCOs and ultimately to produce a forecast for the entire system. Each of the three model component is discussed in detail below.

3.2 Survey Base Data

An extensive data base has been developed on gross consumption by consumer category household (domestic), commercial, small industrial, large industrial, tube wells (agriculture), public lighting, and traction (electric rail). Energy consumption comes from consumer service meter readings. Maximum demand readings and load factors for large industrial users and other demand-metered consumers are based on service meter readings. The consumption data is collected from Computer Centers of each DISCO (It is feeder-wise category-wise consumption data).

Actual consumption data are also adjusted for un-served demands attributed to load shedding and to voluntary restraint by consumers (e.g. an industrial consumer who agrees to close his plant or switch to auto-generation during peak hours).

The basic geographic unit represented within the data base is called an area, although many areas are divided into two or more subareas. This occurs when portions of the area are served by different feeders or where a single feeder services different administrative districts. Each area is assigned a series of codes which identify the technical boundaries associated with the area.

The technical boundaries, which are emphasized in this report, start at the grid station. Thus, all areas and subareas are assigned to one of the all the sub-stations in each DISCO. These are distribution grid stations supplying power at 11 kV after transformation from a 132kV or 66 kV source. Grid stations are combined to form DISCO.

There can be up to eleven records in the data base for each area or subarea, one record for each year of forecast. The first year is typically year zero and records the base year level of consumption for each consumption category as determined in the survey. The remaining records for the area list the incremental consumption associated with new consumers to be added to the area within the specified year.

This incremental consumption is based on applications for new or extended service which are filed at each revenue office and from discussions with the relevant industries and government agencies. Incremental industrial consumption is based on a combination of interviews, trend projections, and reviews of applications for new and/or increased service. Interviews are held with major industrial consumers to identify their current capacity utilization and any long-term plans they have for future expansion or changes in their electricity consumption. Auto-generation is also recorded. In addition, the various branches of the Ministry of Industries are interviewed to determine how many applications for new developments or plant expansions have been received, and what the anticipated electrical load associated with each is likely to be. These anticipated new demands are added to the basic forecast of industrial consumption.

Extension of electricity to new areas over the forecast period is dealt with separately. The number of new communities to be electrified is also obtained. Initial loads and load growth are calculated based on past experience in terms of market penetration and consumption per consumer in newly electrified communities. This analysis is conducted at DISCO level.

There are over 10,000 area/subarea/year records in the data base.

3.3 Input Parameters

A number of input parameters are defined for use in the Power Market Survey model. These parameters are:

- Transmission and distribution loss rates
- The rates of growth in consumption per consumer
- Load factors for each consumption category
- Coincidence or diversity factors

The definition and basic derivation of each is discussed below.

3.4 Growth Rates

The forecast calculations, as will be discussed below, use per consumer growth rates to update the previous year's consumption before adding the incremental consumption estimate for the current year. The Power Market Survey Model requires per consumer growth rates to be specified by DISCO for each consumption category (domestic, commercial, etc). The rates selected for the Forecast are based on average annual compound growth rates, calculated from the last six years data of each consumer category in each DISCO.

3.5 Losses

For every 100 units of electricity purchased from a power station only 75 to 85 units are actually sold to the ultimate end-user. The remainder is consumed by the power system itself in the transmission and distribution of the sold energy. These transmission and distribution losses must be added to the sales forecast in order to determine the total generation requirement for the system. An additional source of "loss" is the consumption in auxiliaries (also called station service) used by the power plants in the process of generating electricity. Auxiliary consumption cannot be avoided and is totally dependent on the type of generation system. For example, a thermal plant would have a higher station service than a hydro plant to account for the energy consumed by fuel and waste handling systems. Auxiliary losses are determined and incorporated in the forecast outside the model.

Within the Power Market Survey model, distribution losses are expressed as a percentage of sales and transmission losses as a percentage of the energy purchased from the generating stations. The model is capable of handling different loss rates of each year for each DISCO. The distribution and transmission losses used in the Power Market Survey Model are based on the review of current loss rates and an evaluation of existing loss reduction initiatives within PEPCO. The losses proposed, distribution losses at 11kV and transmission losses at 132 kV, are applied DISCO-wise. A separate excel sheet has been developed outside the model to calculate the loss rates needed for the model. The loss rates have been set to match observed performance.

3.6 Load Factors

Energy sale in each consumption category is converted to peak power demand through the use of a load factor. It expresses the ratio of the amount of energy actually consumed to the amount that would have been consumed had the peak rate been continued over the entire period. Load factors can be calculated over any time period but the most common are daily, weekly and annual.

The load factors utilized in the Power Market Survey Model relate annual energy sales to peak capacity for each consumer category (domestic, commercial, public lighting, small industries and private tube wells). Input load factors are not required for medium/large industry, public tube well and traction sales as consumption for these sectors is provided through the survey in both energy and power terms.

Maximum demand readings are available directly for large industrial and other demand metered consumers such as public tube wells. Load factors for non-demand metered consumers are determined on a sample basis. For example, peak demand is based on maximum demand readings from substation feeders which are identified as serving predominantly one sector.

Domestic and commercial load factors are differentiated by community size (village, town or city). Whereas a single load factor is used for small industrial, private tube wells, public lighting and traction because of the similar nature in the operation of these loads. While there is some variation in the load factors within the domestic and commercial sectors, there are no differences in any of the load factors by DISCO.

3.7 Coincidence Factors

The total energy demand of a number of individual consumers is determined as the simple sum of their individual energy consumption values. The total peak load, however, is calculated as the diversified sum of their individual peak load levels. The coincidence factor, as its name implies, is a general term which measures the coincidence between the peak loads of any number of individual consumers or consumer groups over a specified time period in order to compute a combined peak. Mathematically, it is the inverse of the diversity factor.

The daily coincidence factor is determined by comparing the daily load patterns of each consumer or group under consideration. In this case, the sum of the individual hourly (or 15-minute) peaks would determine the overall daily load pattern and the overall peak load. If, for example, one consumer (or group) consumes energy only in the morning and a second group consume only in the evening, the coincidence factor between these two consumers would be zero and the peak load of the combined group would be the peak of the larger consumer. Conversely, if both groups consumed all energy at the same hour, the coincidence factor would be one and the combined peak would be the sum of the two peaks. In practice, the coincidence factor is found between these two extremes.

Coincidence factors can be determined between any group and sub-group of consumers whether it is domestic versus commercial or Lahore versus Islamabad, provided that reasonable estimates of the appropriate load patterns are available. Typically, these patterns are not readily available and must be synthesized from incomplete or estimated data. In addition, all coincidence factors calculated from these load patterns are approximations of the corresponding instantaneous peak faced by the system. In fact, a common practice is to define this instantaneous peak as the bench mark and specify all coincidence factors in relation to this peak and time. The advantage of this approach is that all peak can be easily converted into their contribution to the overall system peak, the disadvantage is that the relationship between any two groups cannot be so clearly specified and will likely be incorrectly specified.

The Power Market Survey Model depends upon specified coincidence factors between consumption categories and between consumption areas in the aggregation of peak loads from consumers to the peaks at grid stations and at DISCO level and at the level of overall system peak. The coincidence factors estimated for the medium term model have been based

on the limited available PEPCO records of the peak loads at various points in their respective systems.

3.8 Forecast Calculations

The forecast calculations involve three basic steps. Firstly, an energy forecast is determined at the area (or subarea) level using per consumer growth rates and incremental consumption estimates from the data base. This is then converted to a peak demand forecast, again at the area (or subarea) level using the input load and diversity factors. Then transmission and distribution losses are added and final step is to accumulate the areas into their corresponding grid stations, and grid stations into their DISCO and finally all DISCO's to form the system.

3.9 Energy Calculations

The basic calculation unit is the area or subarea. The data base provides the base year energy consumption level for each of six consumption categories: domestic, commercial, public lighting, small industrial, private tube wells and medium and large industry. The database also includes the peak demand associated with the medium and large industry category. The domestic energy forecast for year 1 (the base year is year 0) is calculated by multiplying the base year consumption by the domestic per consumer growth rate to account for growth in the intensity of use in the sector then adding the incremental consumption listed in the data base to account for new use in the sector. This process is repeated for the remaining five energy sectors (plus the medium and large industrial demand) for each of the remaining 9 years. The total energy consumed in the subarea within the year is then computed.

3.10 Peak Demand Calculations

The annual energy values for each of the domestic, commercial, public lighting, small industry and private tube well categories are converted to peak demand using the load factors listed in the appropriate input parameter file and adjusted to account for coincidence within the category. The annual peak demand for the area or subarea is computed as the sum of the individual category peaks multiplied by coincidence factors within the subarea and for each subarea within an area.

3.11 Accumulations

The total energy and peak demand at a given grid station is calculated as the sum of all the areas and subareas in that grid station's service area plus an allowance for distribution losses. Peak demand estimates are accumulated and different coincidence factors applied to city, town and village areas within the service area. The total energy and peak demand within a given DISCO is the sum of all grid stations in that DISCO plus traction and an allowance for transmission losses. Peak demands are again diversified in the accumulation, and the system totals are obtained from DISCO's total with some coincidence.

4 PMS Forecast Results

4.1 Recorded Forecast (Excluding Load Shedding)

The term 'recorded' means the sale used in forecast has not been adjusted for un-served energy (load shedding). Forecast of sale, transmission and distribution losses, generation requirement and peak demand without load shedding has been shown in Table 1-1.

4.2 Computed Forecast (Including Load Shedding)

The term 'computed' means the sale used in forecast has been adjusted for un-served energy (load shedding). Forecasted sale, transmission and distribution losses, generation requirement and peak demand with load shedding has been shown on Table 1-2. Peak demand of this table has been demonstrated graphically in Figure 1-6. Similarly energy sale and energy Purchased also have been shown in Figure 1-7, the difference shows all losses of the DISCO. This is also the base forecast. If there had not been the load shedding the recorded forecast would have been the actual forecast i.e. the base forecast.

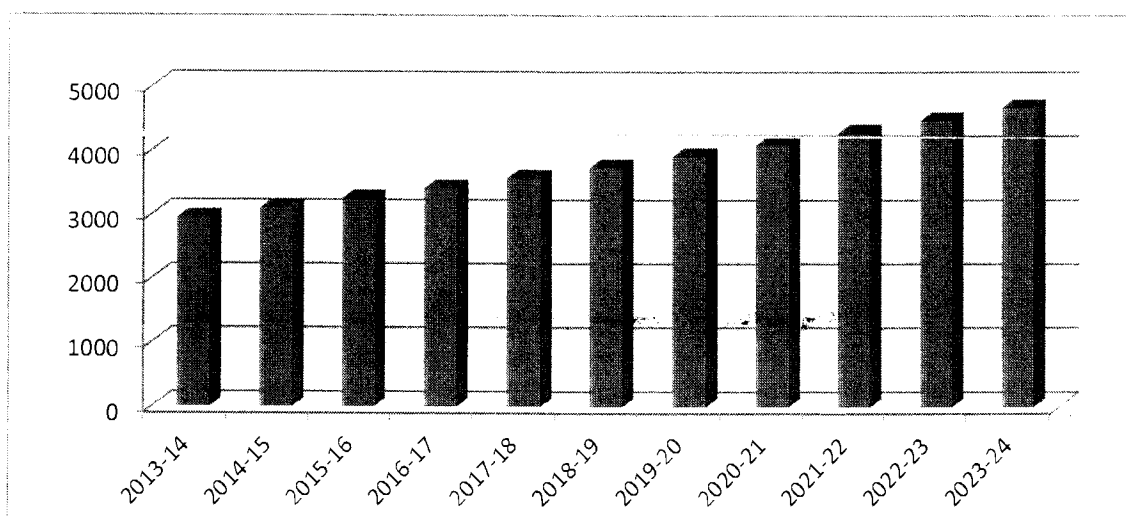


Figure 1- 6: Computed Peak Demand

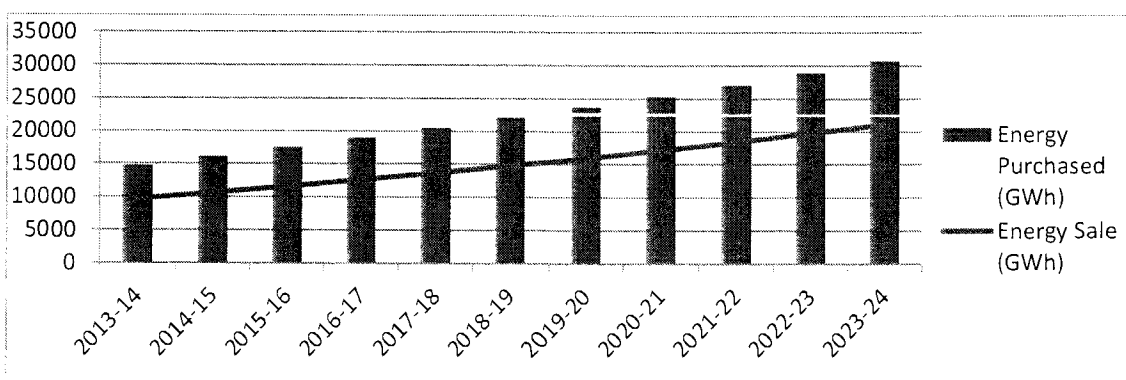


Figure 1- 7: Energy Purchased VS Energy Sale

4.3 Category-wise Forecasted Energy Sale (GWh)

Percentage share of each consumer category in total sale of year 2017-18 and year 2023-24 has been depicted in Figure 1-8.

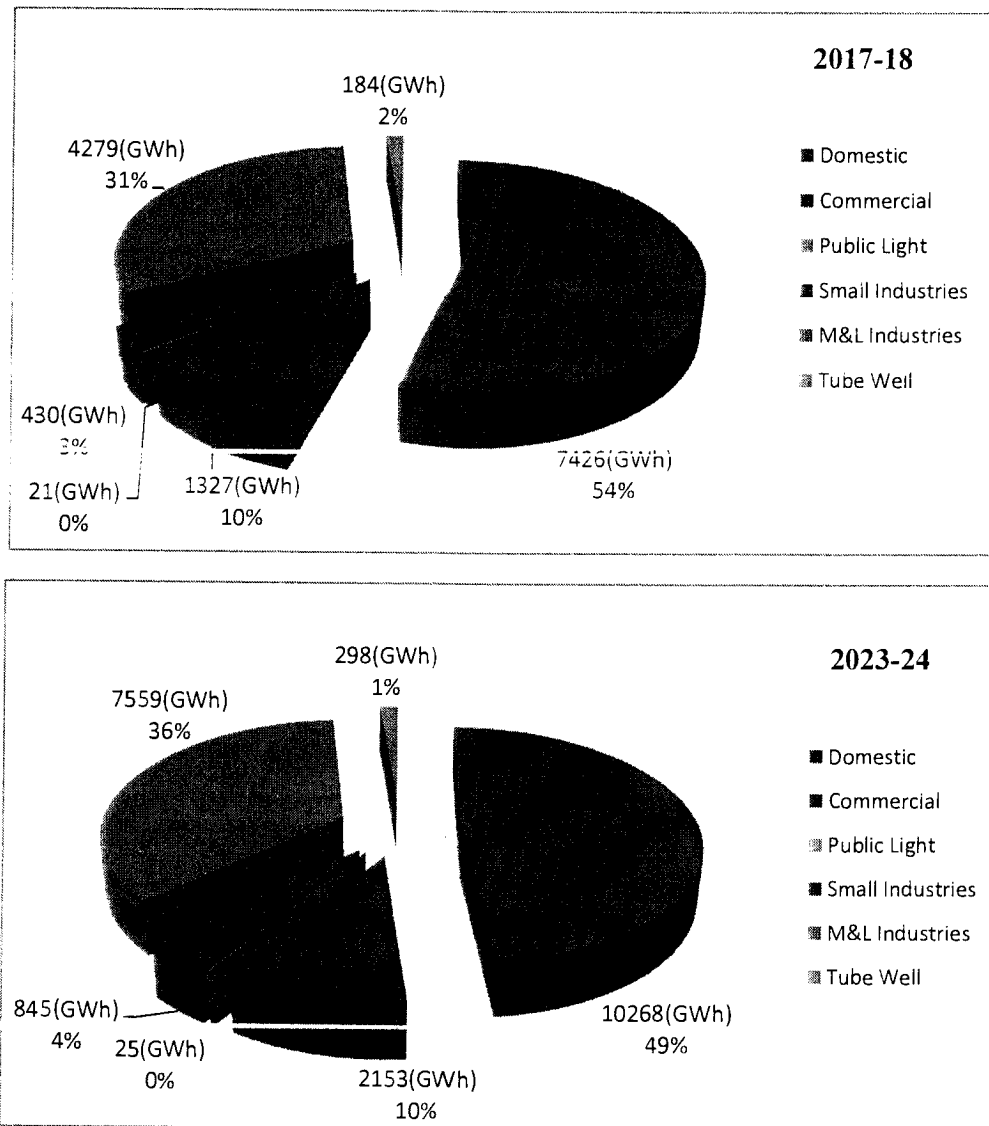


Figure 1- 8: Forecasted Category-wise Sale

The category-wise forecasted sale with and without load shedding are shown in Table 1-3 and 1-4 respectively.

4.4 Category-wise Forecasted Energy Sale (GWh)

The forecast of consumption (sale) in terms of Mega Watts with and without load shedding is shown in Table 1-5 and Table 1-6 respectively.

4.5 Peak Demand of Substations

A projection at a sub-station is the most peculiar feature of this report. It is indeed a very rare and useful forecast. It's the base of transmission system expansion planning. It also provides a very solid ground for proposing a new sub-station or augmentation, extension and conversion of a sub-station. Only distribution losses have been considered in preparing the grid station peak demand.

The peak demand of each substation, existing as well as proposed, situated in the service area of the DISCO has been shown in the Table 1-37.

4.6 Per capita consumption

Per capita consumption is a very vivid indicator of development in a country. Usually developed countries have very high per capita consumption. The consumption for the years 2016-17, 2018-19 and 2023-24 are obtained from forecasted data. The Population is projected by using the growth rate of population of K.P.K given in Census report of 1998. Per capita consumption (kWh/person) is given in Figure 1-9.

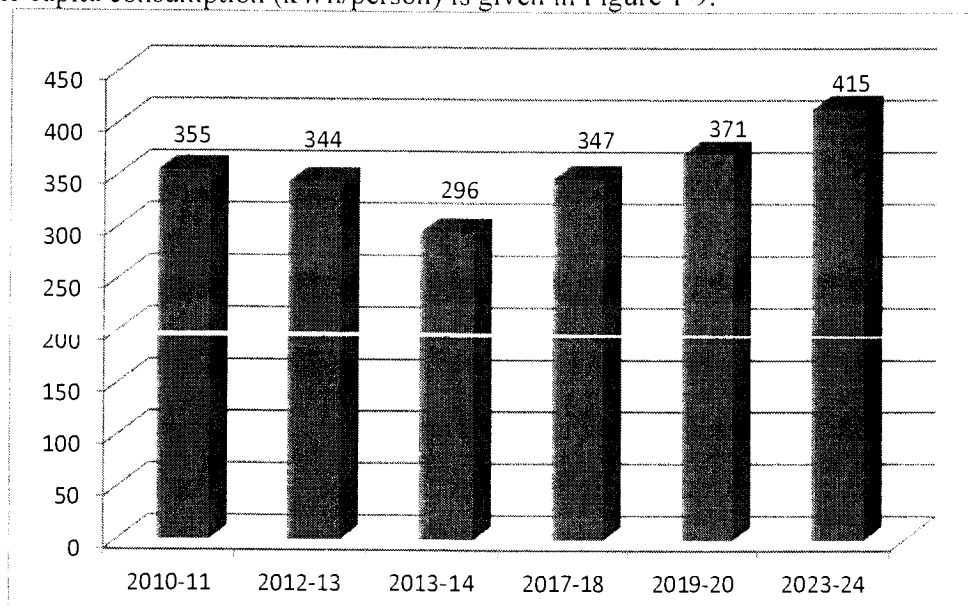


Figure 1- 9: Per Capita Consumption

4.7 Category-wise Substation-wise Energy and Demand Projections

The category-wise substation-wise energy and demand projections have been presented in Table 1-38. The last column of the table contains power factor and reactive power values. In order to reduce the volume of the report, only the values of the last year i.e. 2023-24-have been presented in the table.

4.8 Civil Administrative Area Forecast

The PESCO service area comprises of seven civil administrative divisions i-e. Peshawar, Mardan, Kohat, Bannu, D.I.Khan, Malakand, and Hazara. Peshawar Division consists of three districts: Peshawar, Nowshera, and Charsadda. Mardan Division has two districts: Mardan and Sawabi. While others districts of Divisions Kohat, Bannu, D.I.Khan, Malakand, Hazara are Kohat, Hangu, Karak, Bannu, Lakki, D.I.Kan, Tank, Swat, Dir, Bunair, Abbotabad, Haripur, Batgram, Mansehra. The civil administrative Division-wise and District-wise and energy and demand projections have been presented in Tables 1-7 to 1-32. The last column of the table contains peak demand.

4.9 Monthly Demand (MW) Projections

The Month-wise demand (MW) projections have been presented in Table 1-33. To develop this projection, monthly demand factors are computed for last five years and then its average is taken as a base for monthly demand projection.

4.10 List of 132 kV Overloaded Sub-Stations

There have been several incidents of damage and fire at a number of sub-stations across the state, proof that these sub stations are indeed overloaded and that they are in dire need of repairs and upkeep. The list of overloaded substation will inform about that particular year in which a substation will be overloaded. The overloading criterion of a substation has been considered as 85% i.e. when any substation is 85% loaded the remedial measures should be taken in the form of new substation or augmentation of the existing transformers. Table 1-34 and Table 1-35 show the list of overloaded substations based on overloading criterion of 85% and 100% respectively.

4.11 List of Existing Sub-Stations with their Codes and MVA Capacities

The existing sub stations of PESCO with their codes and MVA capacities of transformers are enlisted in the Table 1-36.

Table 1- 1: PMS Recorded Forecast (Excluding Load Shedding)

Year	Energy Sale		Distribution Losses		Transmission Losses		Energy Sent out	Load Factor	Peak Demand
	(GWh)	G.R	(GWh)	(%)	(GWh)	(%)	(GWh)	(%)	(MW)
2013-14	7471		3450	30.3	457	4.01	11378	67	1929
2014-15	8316	11.3	3812	30.2	506	4.00	12634	71	2034
2015-16	9198	10.6	4177	30.0	556	3.99	13932	74	2142
2016-17	10120	10.0	4544	29.8	609	3.98	15273	77	2254
2017-18	11084	9.5	4912	29.5	662	3.98	16659	80	2370
2018-19	12092	9.1	5282	29.2	718	3.97	18092	83	2490
2019-20	13146	8.7	5653	28.9	775	3.96	19573	85	2614
2020-21	14249	8.4	6024	28.5	833	3.95	21106	88	2742
2021-22	15403	8.1	6396	28.2	894	3.94	22693	90	2876
2022-23	16611	7.8	6768	27.8	956	3.93	24335	92	3014
2023-24	17876	7.6	7140	27.4	1021	3.92	26036	94	3157
Ave. Growth (2014-2024)	9.12%						8.63%		5.05%

Table 1- 2: PMS Base Forecast

Year	Computed Energy Load Shed	G.R	Distribution Losses		Transmission Losses		Computed Energy Sent Out	Load Factor	Computed Peak Demand	G.R
	(GWh)	(%)	GWh)	(%)	(GWh)	(%)	(GWh)	(%)	(MW)	(%)
2013-14	9694		4476	31.6	592.3	4.01	14763	57	2958	
2014-15	10622	9.6	4861	31.4	645.6	4.00	16129	59	3104	4.9
2015-16	11592	9.1	5249	31.2	700.6	3.99	17541	62	3255	4.9
2016-17	12606	8.7	5639	30.9	757.2	3.98	19002	64	3412	4.8
2017-18	13666	8.4	6031	30.6	815.5	3.98	20512	66	3574	4.7
2018-19	14775	8.1	6425	30.3	875.6	3.97	22075	67	3741	4.7
2019-20	15935	7.9	6820	30.0	937.5	3.96	23693	69	3915	4.6
2020-21	17150	7.6	7216	29.6	1001.5	3.95	25368	71	4096	4.6
2021-22	18421	7.4	7613	29.2	1067.4	3.94	27102	72	4282	4.6
2022-23	19753	7.2	8011	28.9	1135.5	3.93	28899	74	4476	4.5
2023-24	21148	7.1	8408	28.4	1205.9	3.92	30762	75	4677	4.5
Ave. Growth (2014-2024)	8.11%						7.62%		4.69%	

Table 1- 3: Category-wise Sale – GWh (Excluding Load Shedding)

Year	Domestic		Commercial		Public Light		Small Industries		M&L Industries		Tirbe Well		Total	
	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R
2013-14	4482		727		14		203		1947		93		7471	
2014-15	4823	7.6	798	9.8	15	3.3	233	14.4	2339	20.1	109	11.5	8316	11.3
2015-16	5175	7.3	874	9.6	15	3.3	265	13.9	2749	17.5	121	10.9	9198	10.6
2016-17	5538	7.0	956	9.4	15	3.3	301	13.5	3177	15.6	133	10.5	10120	10.0
2017-18	5914	6.8	1044	9.2	16	3.2	340	13.1	3624	14.1	147	10.0	11084	9.5
2018-19	6301	6.6	1138	9.0	17	3.2	384	12.8	4091	12.9	161	9.7	12092	9.1
2019-20	6702	6.4	1240	8.9	17	3.2	432	12.6	4580	11.9	176	9.3	13146	8.7
2020-21	7115	6.2	1349	8.8	18	3.2	485	12.3	5090	11.1	192	9.1	14249	8.4
2021-22	7543	6.0	1466	8.7	18	3.2	544	12.1	5623	10.5	209	8.8	15403	8.1
2022-23	7984	5.9	1591	8.6	19	3.2	609	11.9	6181	9.9	227	8.6	16611	7.8
2023-24	8440	5.7	1726	8.5	19	3.2	681	11.8	6763	9.4	246	8.4	17876	7.6
Ave. Growth (2014-2024)	6.53%		9.04%		3.24%		12.84%		13.26%		9.68%		9.12%	

Table 1- 4: Category-wise Sale – GWh (Base Forecast)

Year	Domestic		Commercial		Public Light		Small Industries		M&L Industries		Tube Well		Total	
	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R	Energy	G.R
2013-14	5816		943		18		264		2526		127		9694	
2014-15	6199	6.6	1029	9.1	19	3.2	299	13.5	2936	16.2	140	10.3	10622	9.6
2015-16	6595	6.4	1121	9.0	19	3.2	339	13.1	3364	14.6	153	9.9	11592	9.1
2016-17	7004	6.2	1220	8.8	20	3.2	382	12.8	3811	13.3	168	9.5	12606	8.7
2017-18	7426	6.0	1327	8.7	21	3.2	430	12.6	4279	12.3	184	9.2	13666	8.4
2018-19	7862	5.9	1441	8.6	21	3.2	483	12.3	4767	11.4	200	8.9	14775	8.1
2019-20	8313	5.7	1564	8.5	22	3.2	542	12.1	5278	10.7	217	8.7	15935	7.9
2020-21	8778	5.6	1696	8.4	23	3.2	607	12.0	5811	10.1	236	8.5	17150	7.6
2021-22	9259	5.5	1837	8.3	23	3.2	678	11.8	6368	9.6	255	8.3	18421	7.4
2022-23	9756	5.4	1989	8.3	24	3.2	757	11.7	6951	9.1	276	8.1	19753	7.2
2023-24	10268	5.3	2153	8.2	25	3.2	845	11.5	7559	8.8	298	8.0	21148	7.1
Ave. Growth (2014-2024)	5.85%		8.60%		3.18%		12.34%		11.58%		8.93%		8.11%	

Table 1- 5: Category-wise Demand – MW (Excluding Load Shedding)

Year	Domestic		Commercial		Public Light		Small Industries		M&L Industries		Tube Well		Total	
	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R
2013-14	783		146		3		15		415		4		1252	
2014-15	832	6.3	159	9.2	3	3.3	17	14.4	431	3.7	5	11.5	1326	5.9
2015-16	883	6.1	174	9.0	3	3.3	19	13.9	447	3.8	5	11.0	1404	5.9
2016-17	936	6.0	189	8.9	3	3.3	22	13.5	464	3.8	6	10.5	1485	5.8
2017-18	990	5.8	206	8.8	3	3.2	24	13.1	482	3.8	6	10.0	1570	5.7
2018-19	1046	5.7	224	8.7	4	3.2	27	12.8	500	3.8	7	9.7	1658	5.6
2019-20	1104	5.6	243	8.6	4	3.2	31	12.5	520	3.9	8	9.3	1751	5.6
2020-21	1164	5.4	263	8.5	4	3.2	35	12.3	540	3.9	8	9.1	1848	5.5
2021-22	1226	5.3	285	8.4	4	3.2	39	12.1	561	3.9	9	8.8	1949	5.5
2022-23	1291	5.2	309	8.3	4	3.2	44	11.9	583	3.9	10	8.6	2055	5.4
2023-24	1357	5.1	335	8.2	4	3.2	49	11.8	606	4.0	11	8.4	2166	5.4
Ave. Growth (2014-2024)	5.66%		8.66%		3.24%		12.83%		3.85%		9.68%		5.64%	

Table 1-6: Category-wise Demand – MW (Base Forecast)

Year	Domestic		Commercial		Public Light		Small Industries		M&L Industries		Tube Well		Total	
	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R	Demand	G.R
2013-14	1200		224		5		22		637		6		1919	
2014-15	1267	5.6	243	8.7	5	3.2	25	13.5	661	3.7	7	10.3	2024	5.5
2015-16	1337	5.5	264	8.6	5	3.2	29	13.1	686	3.8	8	9.8	2134	5.4
2016-17	1409	5.4	286	8.5	5	3.2	32	12.8	712	3.8	8	9.5	2248	5.4
2017-18	1483	5.3	311	8.4	5	3.2	36	12.6	739	3.8	9	9.2	2368	5.3
2018-19	1559	5.2	336	8.3	5	3.2	41	12.3	767	3.8	10	8.9	2493	5.3
2019-20	1638	5.1	364	8.3	6	3.2	46	12.1	797	3.9	11	8.7	2624	5.2
2020-21	1720	5.0	394	8.2	6	3.2	51	12.0	828	3.9	12	8.5	2761	5.2
2021-22	1805	4.9	426	8.1	6	3.2	57	11.8	860	3.9	13	8.3	2904	5.2
2022-23	1892	4.8	460	8.1	6	3.2	64	11.7	894	3.9	14	8.1	3054	5.2
2023-24	1982	4.8	497	8.0	6	3.2	71	11.5	929	4.0	15	8.0	3211	5.1
Ave. Growth (2014-2024)	5.14%		8.32%		3.18%		12.34%		3.85%		8.93%		5.28%	

Table 1- 7: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Peshawar

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	1926	0.00	1000	34.17	122	4.01	3048	35	982
2014-15	2074	7.67	1055	33.73	130	4.00	3260	36	1027
2015-16	2229	7.47	1112	33.28	139	3.99	3480	37	1074
2016-17	2391	7.28	1169	32.84	148	3.98	3708	38	1123
2017-18	2561	7.11	1226	32.38	157	3.98	3944	38	1174
2018-19	2739	6.97	1285	31.92	166	3.97	4190	39	1227
2019-20	2927	6.83	1343	31.46	176	3.96	4446	40	1282
2020-21	3123	6.71	1402	30.98	186	3.95	4711	40	1339
2021-22	3329	6.60	1461	30.50	196	3.94	4987	41	1398
2022-23	3546	6.51	1521	30.02	207	3.93	5274	41	1460
2023-24	3774	6.42	1581	29.52	218	3.92	5573	42	1525
Ave. Growth (2014-2024)	6.96%						6.22%		4.50%

Table 1- 8: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District : Charsadda

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	295	0.00	153	34.11	19	4.01	466	31	173
2014-15	330	12.09	168	33.67	21	4.00	519	32	185
2015-16	367	11.24	183	33.24	23	3.99	573	33	197
2016-17	406	10.53	198	32.79	25	3.98	629	34	210
2017-18	446	9.93	213	32.34	27	3.98	687	35	223
2018-19	488	9.42	229	31.89	30	3.97	747	36	237
2019-20	532	8.98	244	31.42	32	3.96	808	37	251
2020-21	578	8.60	259	30.95	34	3.95	871	37	266
2021-22	626	8.27	274	30.48	37	3.94	937	38	281
2022-23	676	7.97	289	29.99	39	3.93	1005	39	296
2023-24	728	7.72	305	29.50	42	3.92	1074	39	312
Ave. Growth (2014-2024)	9.46%						8.72%		6.11%

Table 1- 9: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Nowshehra

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	378	0.00	195	34.00	24	4.01	597	40	170
2014-15	422	11.74	214	33.58	27	4.00	662	43	175
2015-16	469	10.99	233	33.16	29	3.99	730	46	182
2016-17	517	10.36	252	32.72	32	3.98	801	49	188
2017-18	568	9.82	271	32.28	35	3.98	874	51	195
2018-19	621	9.36	290	31.83	38	3.97	949	54	202
2019-20	677	8.96	309	31.37	41	3.96	1027	56	209
2020-21	735	8.61	329	30.90	44	3.95	1108	58	216
2021-22	796	8.30	348	30.43	47	3.94	1192	61	224
2022-23	860	8.03	368	29.95	50	3.93	1278	63	232
2023-24	927	7.79	387	29.46	54	3.92	1368	65	241
Ave. Growth (2014-2024)	9.39%						8.65%		3.58%

Table 1- 10: District-Wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Mardan

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	604	0.00	313	34.17	38	4.01	956	40	274
2014-15	422	4.31	321	33.73	40	4.00	990	40	283
2015-16	469	4.33	328	33.28	41	3.99	1026	40	293
2016-17	517	4.36	335	32.84	42	3.98	1064	40	304
2017-18	568	4.39	343	32.38	44	3.98	1103	40	315
2018-19	621	4.41	351	31.92	45	3.97	1143	40	326
2019-20	677	4.44	358	31.46	47	3.96	1186	40	337
2020-21	735	4.47	366	30.98	49	3.95	1230	40	350
2021-22	796	4.51	374	30.50	50	3.94	1277	40	362
2022-23	860	4.54	382	30.02	52	3.93	1325	40	375
2023-24	927	4.58	390	29.52	54	3.92	1376	40	389
Ave. Growth (2014-2024)	4.38%						3.72%		3.59%

Table 1- 11: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Sawabi

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	200	0.00	104	34.17	13	4.01	316	38	96
2014-15	208	4.20	106	33.73	13	4.00	327	38	99
2015-16	217	4.22	108	33.28	14	3.99	338	38	103
2016-17	226	4.25	110	32.84	14	3.98	350	38	106
2017-18	236	4.28	113	32.38	14	3.98	363	38	110
2018-19	246	4.31	115	31.92	15	3.97	376	38	114
2019-20	256	4.34	118	31.46	15	3.96	389	38	118
2020-21	268	4.37	120	30.98	16	3.95	404	38	122
2021-22	279	4.40	123	30.50	16	3.94	418	38	127
2022-23	292	4.44	125	30.02	17	3.93	434	38	131
2023-24	305	4.48	128	29.52	18	3.92	450	38	136
Ave. Growth (2014-2024)	4.33%						3.61%		3.56%

Table 1- 12: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Kohat

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	999	0.00	234	18.97	52	4.01	1284	49	299
2014-15	1022	2.32	241	19.06	53	4.00	1315	49	309
2015-16	1046	2.37	248	19.14	54	3.99	1347	48	318
2016-17	1071	2.44	255	19.21	55	3.98	1381	48	328
2017-18	1098	2.50	262	19.26	56	3.98	1417	48	338
2018-19	1126	2.56	269	19.29	58	3.97	1453	48	349
2019-20	1156	2.63	277	19.32	59	3.96	1492	47	360
2020-21	1187	2.70	284	19.32	47	3.95	1532	47	372
2021-22	1220	2.76	292	19.32	62	3.94	1574	47	384
2022-23	1255	2.84	300	19.29	64	3.93	1618	47	397
2023-24	1291	2.91	308	19.26	65	3.92	1664	46	410
Ave. Growth (2014-2024)	2.60%						2.63%		3.19%

Table 1- 13: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Hangu

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor		Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%		(MW)
2013-14	833	0.00	378	31.19	51	4.01	1261	50		289
2014-15	1047	25.65	479	31.40	64	4.00	1590	61		298
2015-16	1270	21.34	581	31.39	77	3.99	1928	71		308
2016-17	1504	18.38	684	31.25	91	3.98	2278	82		319
2017-18	1748	16.23	787	31.04	105	3.98	2639	91		330
2018-19	2003	14.59	890	30.76	119	3.97	3012	101		341
2019-20	2269	13.31	993	30.44	134	3.96	3397	110		352
2020-21	2548	12.28	1097	30.09	150	3.95	3795	119		364
2021-22	2840	11.43	1200	29.71	166	3.94	4205	127		377
2022-23	3144	10.73	1303	29.30	182	3.93	4629	136		390
2023-24	3463	10.13	1406	28.88	199	3.92	5067	143		403
Ave. Growth (2014-2024)	15.31%						14.92%			3.40%

Table 1- 14: District-wise Sale (GV/h), Generation (GWh) and Demand (MW) Forecast for District: Karak

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand	
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)	
2013-14	207	0.00	107	34.17	13	4.07	327	30	123	
2014-15	236	14.04	120	33.73	15	4.00	371	32	133	
2015-16	266	12.79	133	33.28	17	3.99	415	33	143	
2016-17	297	11.78	145	32.84	18	3.98	461	34	153	
2017-18	330	10.95	158	32.38	20	3.98	508	36	163	
2018-19	364	10.26	171	31.92	22	3.97	557	36	174	
2019-20	399	9.68	183	31.46	24	3.96	606	37	185	
2020-21	436	9.18	196	30.98	26	3.95	657	38	197	
2021-22	474	8.75	208	30.50	28	3.94	710	39	208	
2022-23	514	8.38	220	30.02	30	3.93	764	40	221	
2023-24	555	8.05	232	29.52	32	3.92	819	40	233	
Ave. Growth (2014-2024)	10.37%						9.61%		6.58%	

Table 1- 15: District-wise Sale (GWh) , Generation (GWh) and Demand (MW) Forecast for District: Bannu

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	207	0.00	107	34.17	13	4.01	327	21	179
2014-15	216	4.40	110	33.73	14	4.00	339	21	186
2015-16	225	4.42	112	33.28	14	3.99	352	21	193
2016-17	235	4.44	115	32.84	15	3.98	365	21	199
2017-18	246	4.46	118	32.38	15	3.98	379	21	207
2018-19	257	4.49	120	31.92	16	3.97	393	21	214
2019-20	268	4.52	123	31.46	16	3.96	408	21	222
2020-21	281	4.55	126	30.98	17	3.95	423	21	230
2021-22	294	4.58	129	30.50	17	3.94	440	21	238
2022-23	307	4.61	132	30.02	18	3.93	457	21	247
2023-24	321	4.65	135	29.52	19	3.92	475	21	256
Ave. Growth (2014-2024)	4.51%						3.79%		3.60%

Table 1- 16: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Lakki

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	100	0.00	52	34.17	3	4.01	158	21	86
2014-15	104	3.91	53	33.73	7	4.00	163	21	89
2015-16	108	3.93	54	33.28	7	3.99	168	21	91
2016-17	112	3.95	55	32.84	7	3.98	174	21	94
2017-18	117	3.97	56	32.38	7	3.98	180	21	97
2018-19	121	3.99	57	31.92	7	3.97	185	21	100
2019-20	126	4.02	58	31.46	8	3.96	192	21	104
2020-21	131	4.04	59	30.98	8	3.95	198	21	107
2021-22	137	4.07	60	30.50	8	3.94	204	21	110
2022-23	142	4.10	61	30.02	8	3.93	211	21	114
2023-24	148	4.13	62	29.52	9	3.92	219	21	117
Ave. Growth (2014-2024)	4.01%						3.29%		3.15%

Table 1- 17: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: D.I.Khan

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	337	0.00	175	34.17	21	21.40	533	49	124
2014-15	417	23.63	212	33.73	26	26.22	655	51	146
2015-16	500	19.86	249	33.28	31	3.99	780	53	168
2016-17	586	17.23	286	32.84	36	3.98	908	54	190
2017-18	675	15.28	323	32.38	41	3.98	1040	56	214
2018-19	768	13.78	360	31.92	47	3.97	1175	56	238
2019-20	865	12.60	397	31.46	52	3.96	1314	57	262
2020-21	965	11.64	433	30.98	57	3.95	1456	58	288
2021-22	1070	10.85	470	30.50	63	3.94	1603	58	314
2022-23	1179	10.19	506	30.02	69	3.93	1754	59	340
2023-24	1293	9.64	542	29.52	75	3.92	1910	59	368
Ave. Growth (2014-2024)	14.39%						13.60%		11.49%

Table 1- 19: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Swat

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	650	0.00	337	34.17	41	41.28	1029	45	258
2014-15	712	9.49	362	33.73	45	44.79	1119	48	268
2015-16	776	9.07	387	33.28	48	3.99	1212	50	277
2016-17	844	8.69	413	32.84	52	3.98	1309	52	287
2017-18	914	8.37	438	32.38	56	3.98	1408	54	297
2018-19	988	8.08	463	31.92	60	3.97	1512	56	308
2019-20	1066	7.83	489	31.46	64	3.96	1619	58	319
2020-21	1147	7.60	515	30.98	68	3.95	1730	60	330
2021-22	1232	7.40	541	30.50	73	3.94	1845	62	342
2022-23	1320	7.21	566	30.02	77	3.93	1964	63	354
2023-24	1413	7.05	592	29.52	82	3.92	2087	65	367
Ave. Growth (2014-2024)	8.08%						7.33%		3.58%

Table 1- 21: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Dir

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	439	0.00	228	34.17	28	27.87	695	49	162
2014-15	486	10.67	247	33.73	31	30.56	764	52	167
2015-16	535	10.08	267	33.28	33	3.99	835	55	173
2016-17	586	9.56	286	32.84	36	3.98	908	58	179
2017-18	639	9.12	306	32.38	39	3.98	985	61	185
2018-19	695	8.74	326	31.92	42	3.97	1063	63	192
2019-20	754	8.40	346	31.46	45	3.96	1145	66	198
2020-21	815	8.10	366	30.98	49	3.95	1229	68	205
2021-22	878	7.83	385	30.50	52	3.94	1316	71	212
2022-23	945	7.59	405	30.02	55	3.93	1406	73	220
2023-24	1015	7.38	425	29.52	59	3.92	1499	75	228
Ave. Growth (2014-2024)	8.74%						7.99%		3.48%

Table 1- 22: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Abbotabad

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	484	0.00	251	34.17	31	30.71	765	38	230
2014-15	508	5.01	258	33.73	32	31.95	798	38	239
2015-16	533	4.99	266	33.28	33	3.99	832	38	249
2016-17	560	4.98	274	32.84	35	3.98	868	38	259
2017-18	588	4.98	281	32.38	36	3.98	905	38	270
2018-19	617	4.97	289	31.92	37	3.97	944	38	280
2019-20	648	4.97	297	31.46	39	3.96	984	38	292
2020-21	680	4.97	305	30.98	40	3.95	1025	39	303
2021-22	714	4.98	313	30.50	42	3.94	1069	39	316
2022-23	749	4.98	321	30.02	44	3.93	1114	39	328
2023-24	786	4.99	329	29.52	46	3.92	1161	39	341
Ave. Growth (2014-2024)	4.98%						4.26%		4.02%

Table 1- 23: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Haripur

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	794	0.00	313	28.29	46	46.28	1153	54	244
2014-15	881	10.97	351	28.52	51	51.39	1284	56	263
2015-16	972	10.34	390	28.63	57	3.99	1419	57	283
2016-17	1067	9.81	429	28.66	62	3.98	1558	59	303
2017-18	1167	9.35	468	28.61	68	3.98	1703	60	325
2018-19	1272	8.95	507	28.50	73	3.97	1852	61	347
2019-20	1381	8.60	546	28.35	79	3.96	2007	62	369
2020-21	1496	8.30	586	28.15	86	3.95	2167	63	393
2021-22	1616	8.03	626	27.91	92	3.94	2333	64	418
2022-23	1742	7.79	665	27.64	98	3.93	2505	65	443
2023-24	1874	7.58	705	27.34	105	3.92	2684	65	470
Ave. Growth (2014-2024)	8.97%						8.81%		6.76%

Table 1- 24: District-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for District: Mansehra

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	211	0.00	109	34.17	13	13.38	333	58	66
2014-15	220	4.39	112	33.73	14	13.84	346	58	68
2015-16	230	4.41	115	33.28	14	3.99	359	58	71
2016-17	240	4.44	117	32.84	15	3.98	372	58	74
2017-18	251	4.47	120	32.38	15	3.98	386	58	76
2018-19	262	4.50	123	31.92	16	3.97	401	58	79
2019-20	274	4.54	126	31.46	16	3.96	416	58	83
2020-21	286	4.57	129	30.98	17	3.95	432	57	86
2021-22	299	4.61	131	30.50	18	3.94	449	57	89
2022-23	313	4.64	134	30.02	18	3.93	466	57	93
2023-24	328	4.68	137	29.52	19	3.92	484	57	96
Ave. Growth (2014-2024)	4.53%						3.81%		3.88%

Table 1- 26: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Peshawar

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	2599	0.00	1347	34.14	165	4.01	4110	37	1282
2014-15	2826	8.77	1437	33.70	178	4.00	4441	38	1344
2015-16	3065	8.43	1527	33.26	191	3.99	4783	39	1407
2016-17	3314	8.14	1619	32.81	205	3.98	5138	40	1473
2017-18	3575	7.88	1711	32.36	219	3.98	5505	41	1542
2018-19	3849	7.65	1803	31.90	233	3.97	5886	42	1613
2019-20	4136	7.45	1896	31.44	249	3.96	6281	43	1687
2020-21	4436	7.27	1990	30.97	264	3.95	6690	43	1764
2021-22	4751	7.10	2084	30.49	280	3.94	7115	44	1843
2022-23	5082	6.96	2178	30.00	297	3.93	7557	45	1926
2023-24	5429	6.83	2273	29.51	314	3.92	8016	45	2012
Ave. Growth (2014-2024)	7.65%						6.91%		4.61%

Table 1- 27: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Mardan

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	803	0.00	417	34.17	51	4.01	1271	41	358
2014-15	838	4.28	426	33.73	53	4.00	1317	41	370
2015-16	874	4.31	436	33.28	54	3.99	1364	41	384
2016-17	912	4.33	446	32.84	56	3.98	1414	41	397
2017-18	951	4.36	456	32.38	58	3.98	1465	41	411
2018-19	993	4.39	466	31.92	60	3.97	1519	41	426
2019-20	1037	4.42	476	31.46	62	3.96	1575	41	441
2020-21	1083	4.45	486	30.98	65	3.95	1634	41	457
2021-22	1132	4.48	497	30.50	67	3.94	1695	41	474
2022-23	1183	4.51	507	30.02	69	3.93	1759	41	491
2023-24	1237	4.55	518	29.52	72	3.92	1826	41	509
Ave. Growth (2014-2024)	4.41%						3.69%		3.58%

Table 1- 28: Division-wise Sale (GWh) , Generation (GWh) and Demand (MW) Forecast for Division: Kohat

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	2039	0.00	719	26.07	115	4.01	2873	48	689
2014-15	2305	13.04	840	26.71	131	4.00	3275	52	716
2015-16	2582	12.06	961	27.13	147	3.99	3691	57	745
2016-17	2873	11.24	1084	27.39	164	3.98	4121	61	775
2017-18	3176	10.56	1207	27.53	181	3.98	4564	65	805
2018-19	3493	9.98	1330	27.57	199	3.97	5022	69	837
2019-20	3825	9.49	1453	27.53	217	3.96	5495	72	870
2020-21	4171	9.06	1577	27.43	236	3.95	5984	76	904
2021-22	4533	8.69	1700	27.27	256	3.94	6489	79	939
2022-23	4912	8.36	1824	27.07	275	4	7011	82	975
2023-24	5308	8.07	1947	26.83	296	3.92	7551	85	1013
Ave. Growth (2014-2024)	10.04%						10.15%		3.93%

Table 1- 29: Division-wise Sale (GWh), Generation (G Wh) and Demand (MW) Forecast for Division: Bannu

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor		Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)		%	(MW)
2013-14	307	0.00	159	34.17	19	4	485		22	257
2014-15	320	4.24	163	33.73	20	4	502		22	266
2015-16	333	4.26	166	33.28	21	4	520		22	275
2016-17	347	4.28	170	32.84	21	4	539		22	285
2017-18	362	4.30	174	32.38	22	4	558		22	294
2018-19	378	4.33	177	31.92	23	4	578		22	305
2019-20	395	4.36	181	31.46	24	4	599		22	315
2020-21	412	4.38	185	30.98	25	4	621		22	326
2021-22	430	4.42	189	30.50	25	4	644		22	337
2022-23	449	4.45	193	30.02	26	4	668		22	349
2023-24	469	4.48	197	29.52	27	4	693		22	361
Ave. Growth (2014-2024)	4.35%						3.63%			3.46%

Table 1- 30: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: D.I.Khan

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	694	0.00	360	34.17	44	4	1099	39	322
2014-15	814	17.21	414	33.73	51	4	1279	41	357
2015-16	938	15.27	468	33.28	58	4	1465	43	393
2016-17	1067	13.78	522	32.84	66	4	1655	44	430
2017-18	1202	12.60	576	32.38	74	4	1851	45	468
2018-19	1342	11.65	629	31.92	81	4	2736	46	507
2019-20	1488	10.86	683	31.46	89	4	2260	47	547
2020-21	1640	10.21	736	30.98	98	4	2473	48	588
2021-22	1798	9.65	789	30.50	106	4	2693	49	631
2022-23	1963	9.17	842	30.02	115	4	2919	49	675
2023-24	2135	8.76	894	29.52	124	4	3152	50	720
Ave. Growth (2014-2024)	11.89%						11.11%		8.38%

Table 1- 31: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division: Malakand

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	1269	0.00	659	34.17	81	4	2008	47	484
2014-15	1388	9.33	706	33.73	87	4	2181	50	502
2015-16	1511	8.93	754	33.28	94	4	2360	52	520
2016-17	1641	8.57	802	32.84	101	4	2545	54	539
2017-18	1776	8.25	851	32.38	109	4	2736	56	559
2018-19	1918	7.97	899	31.92	116	4	2934	58	580
2019-20	2066	7.73	948	31.46	124	4	3139	60	601
2020-21	2221	7.51	997	30.98	132	4	3351	61	624
2021-22	2384	7.31	1046	30.50	141	4	3571	63	647
2022-23	2554	7.13	1095	30.02	149	4	3798	65	671
2023-24	2732	6.97	1144	29.52	158	4	4034	66	696
Ave. Growth (2014-2024)	7.97%						7.22%		3.70%

Table 1- 32: Division-wise Sale (GWh), Generation (GWh) and Demand (MW) Forecast for Division Hazara

Year	Energy Sale		Distribution Losses		Transmission Losses		Generation	Load Factor	Peak Demand
	(GWh)	G.R.(%)	(GWh)	%	(GWh)	%	(GWh)	%	(MW)
2013-14	1983	0.00	816	29.14	117	4	2916	47	707
2014-15	2132	7.50	875	29.11	125	4	3133	48	746
2015-16	2288	7.31	936	29.03	134	4	3358	49	787
2016-17	2451	7.13	997	28.91	143	4	3591	49	829
2017-18	2622	6.98	1058	28.76	152	4	3833	50	872
2018-19	2801	6.84	1120	28.57	162	4	4084	51	917
2019-20	2989	6.71	1183	28.35	172	4	4344	51	964
2020-21	3186	6.60	1246	28.10	182	4	4614	52	1013
2021-22	3393	6.49	1309	27.83	193	4	4895	53	1063
2022-23	3611	6.40	1372	27.54	204	4	5186	53	1116
2023-24	3839	6.32	1436	27.22	215	4	5489	54	1170
Ave. Growth (2014-2024)	6.83%						6.53%		5.17%

Table 1- 33: Month-wise Peak Demand Forecast

Year	July	August	September	October	November	December	January	February	March	April	May	June
	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)	(MW)
2013-14	2705	2452	2522	2440	2122	2508	2431	2039	2069	2419	2714	2947
2013-14	2788	2527	2600	2515	2187	2584	2505	2102	2132	2493	2797	3037
2014-15	2910	2638	2714	2625	2283	2698	2615	2194	2225	2603	2920	3170
2015-16	3034	2750	2829	2736	2379	2812	2726	2287	2320	2713	3044	3305
2016-17	3158	2863	2945	2849	2477	2928	2838	2381	2415	2825	3169	3441
2017-18	3284	2977	3063	2962	2576	3045	2952	2476	2512	2937	3295	3578
2018-19	3412	3092	3181	3077	2676	3163	3066	2572	2609	3051	3423	3716
2019-20	3540	3208	3301	3193	2776	3282	3181	2668	2707	3166	3551	3856
2020-21	3670	3326	3422	3310	2878	3402	3298	2766	2806	3282	3682	3997
2021-22	3801	3444	3544	3428	2981	3523	3416	2865	2906	3399	3813	4140
2023-24	3933	3564	3667	3547	3085	3646	3534	2965	3007	3517	3946	4284

Table 1- 34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criteria=85%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
1	32KV Abbottaba	132	4	65	58.50	49.73	85.00	2013-14	51.10	0.90
2	32KV Bannu	132	11	92	81.88	69.60	85.00	2013-14	133.10	0.89
3	32KV Battal	132	14	26	23.40	19.89	85.00	2013-14	21.50	0.90
4	32KV Chakdara	132	24	78	69.42	59.01	85.00	2013-14	78.90	0.89
5	32KV Charssada	132	26	78	70.20	59.67	85.00	2013-14	61.80	0.90
6	32KV D.I.Khan	132	34	119	107.10	91.04	85.00	2013-14	100.70	0.90
7	32KV Haripur	132	59	78	70.20	59.67	85.00	2013-14	73.50	0.90
8	32KV Jehangira	132	68	67	57.62	48.98	85.00	2013-14	61.10	0.86
9	32KV Jamrud	132	70	118	105.02	89.27	85.00	2013-14	114.90	0.89
10	32KV Karak	132	98	52	46.28	39.34	85.00	2013-14	94.80	0.89
11	32KV Kohat	132	111	106	94.34	80.19	85.00	2013-14	95.60	0.89
12	32KV Mansehra	132	128	52	46.80	39.78	85.00	2013-14	66.50	0.90
13	220KV Mardan	220	129	66	59.40	50.49	85.00	2013-14	77.20	0.90
14	132KV Murree	132	137	26	23.40	19.89	85.00	2013-14	36.00	0.90
15	132KV Nizam Pur	132	145	13	11.57	9.84	85.00	2017-18	9.50	0.89
16	132KV New Wah	132	146	26	23.14	19.67	85.00	2013-14	68.30	0.89
17	132KV NSR City	132	150	78	70.20	59.67	85.00	2013-14	76.40	0.90
18	132KV NSR Indus	132	151	39	34.71	29.50	85.00	2013-14	45.70	0.89
19	132KV Prova	132	156	39	34.71	29.50	85.00	2021-22	28.70	0.89
20	132KV Pesh: Ind	132	162	106	94.34	80.19	85.00	2013-14	100.90	0.89

Table 1-34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criteria=85%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
21	132KV Shahi Bag	132	193	92	82.80	70.38	85.00	2013-14	64.10	0.90
22	132KV R.B Tarbe	132	211	39	33.54	28.51	85.00	2013-14	36.50	0.86
23	66KV Abbott Aba	66	225	13	11.70	9.95	85.00	2020-21	9.80	0.90
24	66KV Badaber	66	235	17.5	15.58	13.24	85.00	2013-14	18.80	0.89
25	66KV Bankorai	66	239	20.5	18.25	15.51	85.00	2013-14	39.30	0.89
26	66KV Hungu	66	282	52	46.80	39.78	85.00	2016-17	39.60	0.90
27	66KV Hari Pur	66	283	19.3	17.37	14.77	85.00	2013-14	14.30	0.90
28	66KV Havalian	66	286	26	23.40	19.89	85.00	2013-14	20.30	0.90
29	66KV Kohat	66	311	9.3	8.37	7.12	85.00	2013-14	9.50	0.90
30	66KV Kurram Gar	66	312	19.3	17.18	14.60	85.00	2013-14	24.30	0.89
31	132KV Mattani	132	324	26	23.14	19.67	85.00	2013-14	56.50	0.89
32	132KV Pabbi	132	340	52	46.80	39.78	85.00	2013-14	59.10	0.90
33	132KV Pesh:City	132	344	120	108.00	91.80	85.00	2015-16	88.70	0.90
34	132KV Peshawar	132	346	104	93.60	79.56	85.00	2013-14	94.50	0.90
35	132KV Peshawar	132	347	26	23.14	19.67	85.00	2013-14	60.90	0.89
36	132KV Shabqadar	132	365	78	70.20	59.67	85.00	2013-14	76.00	0.90
37	132KV Sawabi	132	384	92	81.88	69.60	85.00	2013-14	97.00	0.89
38	66KV Tajazai	66	386	28	24.64	20.94	85.00	2022-23	20.40	0.88
39	66KV Temargara	66	389	13	11.70	9.95	85.00	2013-14	19.10	0.90
40	132KV Tank	132	393	39	34.71	29.50	85.00	2013-14	60.40	0.89

Table 1-34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criterion = 85%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		kV		(MVA)	(MW)	(MW)	(%)		(MW)	
41	132KV Tall	132	394	39	35.10	29.84	85.00	2013-14	36.00	0.90
42	132KV Lachi	132	460	39	34.71	29.50	85.00	2013-14	31.50	0.89
43	132KV Swat	132	461	111.6	100.44	85.37	85.00	2013-14	127.40	0.90
44	132KV Nishat Ta	132	462	28	25.20	21.42	85.00	2022-23	21.20	0.90
45	66KV Draban	66	464	13	11.57	9.84	85.00	2013-14	12.70	0.89
46	66KV Kulachi	66	466	13	11.57	9.84	85.00	2013-14	11.90	0.89
47	132KV Muzaffar	132	473	26	22.62	19.23	85.00	2013-14	46.00	0.87
48	132KV Peshawar	132	514	120	108.00	91.80	85.00	2013-14	100.20	0.90
49	33KV Hattian	132	518	13	11.31	9.61	85.00	2014-15	9.40	0.87
50	132KV Tangi	132	567	52	46.80	39.78	85.00	2013-14	52.10	0.90
51	132KV Balakot	132	580	13	11.70	9.95	85.00	2013-14	12.10	0.90
52	66KV Pezu	66	596	5	4.45	3.78	85.00	2013-14	7.40	0.89
53	66KV Dir	66	625	13	11.70	9.95	85.00	2013-14	14.40	0.90
54	132KV Gadoon Am	132	627	104	93.60	79.56	85.00	2013-14	83.60	0.90
55	132KV AMC A/Aba	132	628	26	23.40	19.89	85.00	2013-14	26.60	0.90
56	132KV Hattar	132	638	132	118.80	100.98	85.00	2013-14	106.20	0.90
57	132KV S. Mohamm	132	671	26	22.88	19.45	0.00	2013-14	25.80	0.88
58	132KV Mardan	132	693	66	59.40	50.49	0.00	2013-14	75.60	0.90
59	132KV Gumbat	132	694	39	34.71	29.50	85.00	2018-19	29.10	0.89
60	66KV KURRAM GHA	66	699	13	11.57	9.84	85.00	2013-14	9.60	0.89

Table 1-34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)

Overloading Criteria=85%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
61	132KV Nusarry	132	709	13	11.31	9.61	85.00	2015-16	9.40	0.87
62	132KV Timor Gar	132	736	65	58.50	49.73	85.00	2013-14	61.90	0.90
63	66KV Band Kurai	66	744	13	11.57	9.84	85.00	2013-14	10.80	0.89
64	132KV Jala a	132	757	65	58.50	49.73	85.00	2013-14	79.60	0.90
65	132KV Gurjurai	132	783	6.3	5.67	4.82	85.00	2013-14	5.70	0.90
66	132KV Peshawar	132	792	66	59.40	50.49	85.00	2013-14	62.30	0.90
67	220KV Domail	220	804	52	46.28	39.34	85.00	2013-14	51.10	0.89
68	132KV Sakhi Cha	132	819	52	44.72	38.01	85.00	2017-18	37.70	0.86
69	33KV Thakot	33	829	12	10.80	9.18	85.00	2013-14	15.10	0.90
70	33KV Daroosh	33	830	1.5	1.35	1.15	85.00	2013-14	1.60	0.90
71	132KV Hayat Aba	132	834	106	91.16	77.49	85.00	2017-18	75.00	0.86
72	132KV Nathia Ga	132	857	13	11.70	9.95	85.00	2021-22	9.60	0.90
73	132KV Dala Zak	132	865	52	46.80	39.78	85.00	2020-21	39.70	0.90
74	66KV Dargai	66	868	13	11.31	9.61	85.00	2021-22	9.40	0.87
75	66KV Wari	66	875	13	11.70	9.95	85.00	2013-14	24.50	0.90
76	132KV Rehman Ba	132	876	79	70.31	59.76	85.00	2013-14	63.70	0.89
77	132KV Khawza Kh	132	877	38.5	34.65	29.45	85.00	2013-14	45.30	0.90
78	132KV Hussai	132	901	52	46.28	39.34	85.00	2013-14	65.40	0.89
79	132KV S/Nurang	132	903	52	45.76	38.90	85.00	2013-14	56.60	0.88
80	132KV Katlang	132	906	26	23.14	19.67	85.00	2013-14	25.40	0.89

Table 1-34: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criteria=85%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
81	132KV Warsak	132	910	13	11.70	9.95	85.00	2013-14	33.90	0.90
82	132KV Rajjar	132	940	26	23.40	19.89	85.00	2014-15	19.50	0.90
83	132KV Shangla	132	956	7.6	6.84	5.81	85.00	2013-14	8.90	0.90
84	132KV Taja Zai	132	992	52	45.76	38.90	85.00	2013-14	37.80	0.88
85	132KV Daggar	132	1026	52	45.24	38.45	85.00	2013-14	54.80	0.87
86	132KV K.D.A Koh	132	1054	39	35.10	29.84	85.00	2016-17	28.60	0.90

Table 1- 35: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criterion=100%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
1	132KV Abbottaba	132	4	65	58.50	58.50	100.00	2015-16	57.50	0.90
2	132KV Bannu	132	11	92	81.88	81.88	100.00	2013-14	133.10	0.89
3	132KV Battal	132	14	26	23.40	23.40	100.00	2013-14	21.50	0.90
4	132KV Chakdara	132	24	78	69.42	69.42	100.00	2013-14	78.90	0.89
5	132KV Charssada	132	26	78	70.20	70.20	100.00	2013-14	61.80	0.90
6	132KV D.I.Khan	132	34	119	107.10	107.10	100.00	2013-14	100.70	0.90
7	132KV Haripur	132	59	78	70.20	70.20	100.00	2013-14	73.50	0.90
8	132KV Jehangira	132	68	67	57.62	57.62	100.00	2013-14	61.10	0.86
9	132KV Jamrud	132	70	118	105.02	105.02	100.00	2013-14	114.90	0.89
10	132KV Karak	132	98	52	46.28	46.28	100.00	2013-14	94.80	0.89
11	132KV Kohat	132	111	106	94.34	94.34	100.00	2013-14	95.60	0.89
12	132KV Mansehra	132	128	52	46.80	46.80	100.00	2013-14	66.50	0.90
13	220KV Mardan	220	129	66	59.40	59.40	100.00	2013-14	77.20	0.90
14	132KV Murree	132	137	26	23.40	23.40	100.00	2013-14	36.00	0.90
15	132KV Nizam Pur	132	145	13	11.57	11.57	100.00	2022-23	11.30	0.89
16	132KV New Wah	132	146	26	23.14	23.14	100.00	2013-14	68.30	0.89
17	132KV NSR City	132	150	78	70.20	70.20	100.00	2013-14	76.40	0.90
18	132KV NSR Indus	132	151	39	34.71	34.71	100.00	2013-14	45.70	0.89
19	132KV Pesh: Ind	132	162	106	94.34	94.34	100.00	2013-14	100.90	0.89
20	132KV Shahi Bag	132	193	92	82.80	82.80	100.00	2015-16	80.40	0.90

Table 1-35: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criterion=100%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
21	132KV R.B Tarbe	132	211	39	33.54	33.54	100.00	2013-14	36.50	0.36
22	66KV Badaber	66	235	17.5	15.58	15.58	100.00	2013-14	18.80	0.39
23	66KV Bankorai	66	239	20.5	18.25	18.25	100.00	2013-14	39.30	0.39
24	66KV Hungu	66	282	52	46.80	46.80	100.00	2021-22	46.80	0.30
25	66KV Hari Pur	66	283	19.3	17.37	17.37	100.00	2018-19	17.10	0.30
26	66KV Havalian	66	286	26	23.40	23.40	100.00	2016-17	23.30	0.30
27	66KV Kohat	66	311	9.3	8.37	8.37	100.00	2013-14	9.50	0.30
28	66KV Kurram Gar	66	312	19.3	17.18	17.18	100.00	2013-14	24.30	0.39
29	132KV Mattani	132	324	26	23.14	23.14	100.00	2013-14	56.50	0.39
30	132KV Pabbi	132	340	52	46.80	46.80	100.00	2013-14	59.10	0.30
31	132KV Pesh:City	132	344	120	108.00	108.00	100.00	2019-20	103.90	0.30
32	132KV Peshawar	132	346	104	93.60	93.60	100.00	2013-14	94.50	0.30
33	132KV Peshawar	132	347	26	23.14	23.14	100.00	2013-14	60.90	0.39
34	132KV Shabqadar	132	365	78	70.20	70.20	100.00	2013-14	76.00	0.30
35	132KV Sawabi	132	384	92	81.88	81.88	100.00	2013-14	97.00	0.39
36	66KV Temargara	66	389	13	11.70	11.70	100.00	2013-14	19.10	0.30
37	132KV Tank	132	393	39	34.71	34.71	100.00	2013-14	60.40	0.39
38	132KV Tall	132	394	39	35.10	35.10	100.00	2013-14	36.00	0.30
39	132KV Lachi	132	460	39	34.71	34.71	100.00	2015-16	33.60	0.39
40	132KV Swat	132	461	111.6	100.44	100.44	100.00	2013-14	127.40	0.30

Table 1-35: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)

Overloading Criterion=100%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Over loading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
41	66KV Draban	66	464	13	11.57	11.57	100.00	2013-14	12.70	0.89
42	66KV Kulachi	66	466	13	11.57	11.57	100.00	2013-14	11.90	0.89
43	132KV Muzaffar	132	473	26	22.62	22.62	100.00	2013-14	46.00	0.87
44	132KV Peshawar	132	514	120	108.00	108.00	100.00	2014-15	104.60	0.90
45	33KV Hattian	132	518	13	11.31	11.31	100.00	2018-19	11.10	0.87
46	132KV Tangi	132	567	52	46.80	46.80	100.00	2013-14	52.10	0.90
47	132KV Balakot	132	580	13	11.70	11.70	100.00	2013-14	12.10	0.90
48	66KV Pezu	66	596	5	4.45	4.45	100.00	2013-14	7.40	0.89
49	66KV Dir	66	625	13	11.70	11.70	100.00	2013-14	14.40	0.90
50	132KV Gadoon Am	132	627	104	93.60	93.60	100.00	2016-17	93.40	0.90
51	132KV AMC A/Aba	132	628	26	23.40	23.40	100.00	2013-14	26.60	0.90
52	132KV Hattar	132	638	132	118.80	118.80	100.00	2015-16	114.50	0.90
53	132KV S. Mohamm	132	671	26	22.88	22.88	100.00	2013-14	25.80	0.88
54	132KV Mardan	132	693	66	59.40	59.40	100.00	2013-14	75.60	0.90
55	66KV KURRAM GHA	66	699	13	11.57	11.57	100.00	2019-20	11.50	0.89
56	132KV Nuserry	132	709	13	11.31	11.31	100.00	2019-20	11.10	0.87
57	132KV Timer Gar	132	736	65	58.50	58.50	0.00	2013-14	61.90	0.90
58	66KV Band Kurai	66	744	13	11.57	11.57	0.00	2015-16	11.50	0.89
59	132KV Jalala	132	757	65	58.50	58.50	100.00	2013-14	79.60	0.90
60	132KV Gurgurai	132	783	6.3	5.67	5.67	100.00	2013-14	5.70	0.90

Table 1-35: List of 132 kV Overloaded Sub-Stations during Period 2013-14 to 2023-24 (Continued...)
Overloading Criterion=100%

S.No.	Name	Rating	Grid #	Total Capacity	Total Capacity	Overloading Criterion	Overloading Criterion	Year of Overloading	Overloading Status	Power Factor
		KV		(MVA)	(MW)	(MW)	(%)		(MW)	
61	132KV Peshawar	132	792	66	59.40	59.40	100.00	2013-14	62.30	0.90
62	220KV Dornail	220	804	52	46.28	46.28	100.00	2013-14	51.10	0.89
63	132KV Sakhi Cha	132	819	52	44.72	44.72	100.00	2021-22	43.30	0.86
64	33KV Thakot	33	829	12	10.80	10.80	100.00	2013-14	15.10	0.90
65	33KV Daroush	33	830	1.5	1.35	1.35	100.00	2013-14	1.60	0.90
66	132KV Hayat Aba	132	834	106	91.16	91.16	100.00	2022-23	90.90	0.86
67	66KV Wari	66	875	13	11.70	11.70	100.00	2013-14	24.50	0.90
68	132KV Rehman Ba	132	876	79	70.31	70.31	100.00	2015-16	68.30	0.89
69	132KV Khawza Kh	132	877	38.5	34.65	34.65	100.00	2013-14	45.30	0.90
70	132KV Hussai	132	901	52	46.28	46.28	100.00	2013-14	65.40	0.89
71	132KV S/Nurang	132	903	52	45.76	45.76	100.00	2013-14	56.60	0.88
72	132KV Katlang	132	906	26	23.14	23.14	100.00	2013-14	25.40	0.89
73	132KV Warsak	132	910	13	11.70	11.70	100.00	2013-14	33.90	0.90
74	132KV Rajjar	132	940	26	23.40	23.40	100.00	2019-20	22.90	0.90
75	132KV Shangla	132	956	7.6	6.84	6.84	100.00	2013-14	8.90	0.90
76	132KV Taja Zai	132	992	52	45.76	45.76	100.00	2018-19	44.80	0.88
77	132KV Daggar	132	1026	52	45.24	45.24	100.00	2013-14	54.80	0.87
78	132KV K.D.A Koh	132	1054	39	35.10	35.10	100.00	2019-20	34.80	0.90

Table 1-36: List of Existing Sub-Stations with their Codes and MVA Capacities (Continued...)

SR. No.	Grid No.	KV	Grid Name	Transformers				(MVA)	SR. No.	Grid No.	KV	Grid Name	Transformers				(MVA)
				T1	T2	T3	T4	Total					T1	T2	T3	T4	Total
1	4	132	132KV Abbottaba	26	13	26		65	2	11	132	132KV Bannu	26	40	26		92
3	14	132	132KV Battal	26				26	4	24	132	132KV Chakdara	26	26	26		78
5	26	132	132KV Charssada	26	26	26		78	6	34	132	132KV D.I. Khan	13	40	26	40	119
7	59	132	132KV Haripur	26	26	26		78	8	68	132	132KV Jehangira	15	26	26		67
9	70	132	132KV Jamrud	40	26	26	26	118	10	98	132	132KV Karak	26	26			52
11	111	132	132KV Kohat	40	40	26		106	12	128	132	132KV Mansehra	26	26			52
13	129	220	220KV Mardan	26	40			66	14	137	132	132KV Murree					0
15	145	132	132KV Nizam Pur	13				13	16	146	132	132KV New Wah					0
17	150	132	132KV NSR City	26	26	26		78	18	151	132	132KV NSR Indus	26	13			39
19	156	132	132KV Prova	13	26			39	20	162	132	132KV Pesh: Ind	40	26	40		106
21	193	132	132KV Shahi Bag	26	40	26		92	22	211	132	132KV R.B Tarbe	26	13			39
23	225	66	66KV Abbott Aba	13				13	24	235	66	66KV Badaber	8	10			18
25	239	66	66KV Bankorai	8	13			21	26	258	66	66KV Daggar	13				13
27	262	132	132KV Dargai	26	26			52	28	282	66	66KV Hungu	26	26			52
29	283	66	66KV Hari Pur	6	13			19	30	286	66	66KV Havalian	13	13			26
31	292	66	66KV Jalala	13	26	26		65	32	311	66	66KV Kohat	6	3			9
33	312	66	66KV Kurram Gar	6	13			19	34	324	132	132KV Maltari					0
35	340	132	132KV Pabbi	26	26			52	36	344	132	132KV Pesh:City	40	40	40		120

Table 1-36: List of Existing Sub-Stations with their Codes and MVA Capacities (Continued...)

SR. No.	Grid No.	KV	Grid Name	Transformers				(MVA) Total	SR. No.	Grid No.	KV	Grid Name	Transformers				(MVA) Total
				T1	T2	T3	T4						T1	T2	T3	T4	
37	346	132	132KV Peshawar	26	26	26	26	104	38	347	132	132KV Peshawar					0
39	365	132	132KV Shabqadar	26	26	26		78	40	384	132	132KV Sawabi	26	26	40		92
41	386	66	66KV Tajazai	15	13			28	42	389	66	66KV Temargara	13				13
43	393	132	132KV Tank	13	26			39	44	394	132	132KV Tall	26	13			39
45	460	132	132KV Lachi	13	26			39	46	461	132	132KV Swat	26	26	26	8	86
47	462	132	132KV Nishat Ta	15	13			28	48	463	0	Chitral P/H					0
49	464	66	66KV Draban	13				13	50	466	66	66KV Kulachi	13				13
51	473	132	132KV Muzaffar					0	52	514	132	132KV Peshawar	40	40	40		120
53	518	132	33KV Hattian					0	54	567	132	132KV Tangi	26	26			52
55	580	132	132KV Balakot	13				13	56	596	66	66KV Pezu	5				5
57	625	66	66KV Dir	13				13	58	627	132	132KV Gadoon Am	26	26	26	26	104
59	628	132	132KV AMC A/Aba	26				26	60	638	132	132KV Hattar	40	40	26	26	132
61	657	66	66KV Khaishki	3				3	62	671	132	132KV S. Mohamun					0
63	678	132	Garam Chishma P					0	64	693	132	132KV Mardan	26	40			66
65	694	132	132KV Gumbat	13	26			39	66	699	66	66KV KORRAM GHA					0
67	709	132	132KV Nuserry					0	68	718	132	Turbella P/H					0
69	736	132	132KV Timer Gar	26	13	26		65	70	744	66	66KV Band Kurai					0
71	757	132	132KV Jalala	13	26	26		65	72	783	132	132KV Gurgurai	6				6

Table 1- 37: Maximum Demand of Substations

(Continued...)

POWER MARKET SURVEY
LOAD CENTRE SUMMARY
MAXIMUM DEMAND (MW) OF GRIDSTATIONS

DISCO: PESCO

S. NO.	GRID NO.	NAME OF GRIDSTATION	KV	Y E A R										
				2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
1.	804	220KV Domail	220	51.1	51.9	54.7	56.6	58.6	60.6	62.7	64.9	67.2	69.5	71.9
2.	129	220KV Mardan	220	77.2	80.2	83.4	86.6	90.0	93.6	97.3	101.2	105.2	109.5	113.9
3.	943	220KV Shahi B	220	23.1	23.9	24.7	25.5	26.3	27.3	28.0	28.9	29.9	30.6	31.8
4.	156	132KV Prova	132	22.0	21.7	23.5	24.2	25.1	25.9	26.6	27.7	28.7	29.7	30.7
5.	628	132KV AMC A/A	132	26.6	27.7	28.8	29.9	31.1	32.4	33.7	35.1	36.5	38.0	39.6
6.	784	132KV AWT Niz	132	29.2	29.2	29.2	29.2	29.2	29.2	29.2	29.2	29.2	29.2	29.2
7.	4	132KV Abbotta	132	51.1	51.2	57.5	60.9	64.4	68.1	72.0	76.1	80.3	84.7	89.3
8.	580	132KV Balakot	132	12.1	12.5	12.9	13.4	13.8	14.3	14.8	15.3	15.8	16.3	16.9
9.	11	132KV Bannu	132	133.1	138.0	143.0	139.6	144.8	150.1	155.6	161.4	167.4	173.6	180.0
10.	14	132KV Battal	132	21.5	27.6	33.9	40.3	46.9	53.7	60.6	67.7	75.0	82.5	90.2
11.	24	132KV Chakdar	132	78.9	81.9	97.2	88.6	97.8	107.2	117.0	127.0	137.3	148.0	159.0
12.	26	132KV Charasa	132	61.8	70.3	79.2	88.2	97.5	107.1	117.1	127.1	137.6	148.4	159.5
13.	1004	132KV Cherat	132	14.2	14.2	14.2	14.2	14.2	14.2	14.2	14.2	14.2	14.2	14.2
14.	717	132KV Consume	132	20.7	20.7	20.7	20.7	20.7	20.7	20.7	20.7	20.7	20.7	20.7
15.	34	132KV D.I.Kha	132	100.7	122.6	122.7	135.9	157.8	180.1	203.1	226.9	251.3	276.3	302.1
16.	1016	132KV Daggur	132	54.8	57.1	60.6	63.7	66.8	70.1	73.1	77.0	80.6	84.4	88.3
17.	865	132KV Dala Za	132	39.7	40.1	42.5	43.9	35.9	37.1	38.4	39.7	41.1	42.5	43.9
18.	262	132KV Dargai	132	21.7	22.4	23.2	24.0	24.8	25.7	26.6	27.5	28.5	29.5	30.5
19.	617	132KV Gadson	132	83.6	86.8	90.0	93.4	96.9	100.1	104.1	108.1	112.1	116.3	120.6
20.	694	132KV Gumbat	132	34.6	35.4	26.3	27.2	28.1	29.1	30.1	31.1	32.2	33.3	34.5
21.	783	132KV Gurgura	132	5.7	5.9	6.1	6.2	6.4	6.6	6.8	7.0	7.2	7.4	7.6
22.	59	132KV Haripur	132	73.5	87.5	101.9	116.8	132.1	148.0	164.4	181.4	199.0	217.2	236.1
23.	638	132KV Hattar	132	106.1	110.3	114.5	118.9	123.4	128.1	133.0	138.1	143.4	148.8	154.5
24.	854	132KV Hayat A	132	64.0	66.6	69.3	72.1	75.0	77.9	81.0	84.2	87.5	90.9	94.4
25.	901	132KV Hussani	132	65.4	67.4	69.6	71.8	74.1	76.4	78.9	81.4	84.0	86.7	89.5

Table 1-37: Maximum Demand of Substations

(Continued...)

POWER MARKET SURVEY
LOAD CENTRE SUMMARY
MAXIMUM DEMAND (MW) OF GRIDSTATIONS

DISCO: PESCO

GRID NO.	NAME OF GRIDSTATION	VOL. (KV)	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
26.	757 132KV Jalala	132	79.6	82.4	85.3	88.3	91.4	94.7	98.1	101.6	105.3	109.1	113.1
27.	70 132KV Jamrud	132	114.9	119.8	124.8	130.1	135.6	141.4	147.4	153.7	160.3	167.2	174.5
28.	68 132KV Jehangi	132	61.1	67.9	64.9	71.8	79.0	86.4	94.1	102.1	110.3	118.9	127.7
29.	1054 132KV K.D.A K	132	28.9	24.8	26.7	28.6	30.6	32.7	34.8	37.0	39.2	41.5	43.9
30.	98 132KV Karak	132	94.8	98.0	96.1	82.3	85.2	88.1	91.4	94.6	98.0	101.5	105.1
31.	906 132KV Kat Jan	132	25.4	26.2	27.1	28.0	28.9	29.8	30.7	31.7	32.8	33.8	34.9
32.	877 132KV Khawza	132	45.3	46.7	48.1	49.6	51.1	52.7	54.3	56.0	57.7	59.5	61.3
33.	111 132KV Kohat	132	98.6	99.4	103.3	107.5	111.8	116.3	121.0	125.9	131.0	136.4	142.1
34.	714 132KV Kohat C	132	39.8	39.8	39.8	39.8	39.8	39.8	39.8	39.8	39.8	39.8	39.8
35.	460 132KV Lachi	132	31.5	32.5	33.6	34.8	36.0	37.2	38.5	39.8	41.2	42.6	44.1
36.	716 132KV Locomot	132	12.0	12.0	12.0	12.0	12.0	12.0	12.0	12.0	12.0	12.0	12.0
37.	896 132KV Madyan	132	0.3	0.3	0.3	0.3	0.3	0.3	0.4	0.4	0.4	0.4	0.4
38.	128 132KV Mansehr	132	68.5	69.0	71.7	74.4	77.3	80.3	83.4	86.7	90.1	93.7	97.5
39.	693 132KV Mardan	132	75.6	67.4	69.8	72.3	74.8	77.5	80.2	83.1	86.1	89.2	92.4
40.	324 132KV Mattani	132	56.5	56.2	59.9	61.7	63.6	65.5	67.5	69.5	71.6	73.7	76.0
41.	137 132KV Murree	132	36.0	37.3	38.5	39.8	41.2	42.6	44.1	45.5	47.1	48.7	50.3
42.	919 132KV Nozafar	132	7.4	7.5	7.5	7.5	7.5	7.6	7.6	7.6	7.6	7.7	7.7
43.	473 132KV Nozaira	132	46.0	46.2	46.3	46.5	46.6	46.7	46.9	47.0	47.1	47.3	47.4
44.	150 132KV NSR Cit	132	76.4	79.3	70.0	64.7	67.2	69.6	72.0	75.4	78.4	81.5	84.8
45.	191 132KV NSR Ind	132	45.7	47.5	49.4	51.4	53.5	55.6	57.8	60.3	62.7	65.3	68.0
46.	857 132KV Nathia	132	7.2	7.4	7.7	8.0	8.3	8.6	8.9	9.2	9.6	10.0	10.3
47.	146 132KV New Wah	132	68.3	70.9	73.6	76.4	79.2	82.1	85.3	88.5	91.9	95.3	98.9
48.	462 132KV Nishat	132	15.3	15.9	16.5	17.1	17.7	18.3	19.0	19.7	20.4	21.2	22.0
49.	145 132KV Nizam P	132	8.3	8.6	8.9	9.2	9.5	9.9	10.3	10.6	10.9	11.3	11.7
50.	709 132KV Nuserry	132	8.7	9.1	9.4	9.8	10.2	10.7	11.1	11.6	12.0	12.6	13.1

Table 1-37: Maximum Demand of Substations

(Continued...)

POWER MARKET SURVEY
LOAD CENTRE SUMMARY
MAXIMUM DEMAND (MW) OF GRIDSTATIONS

DISCO: PESCO

GRID NO.	NAME OF GRIDSTATION	KV	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
76.	786 132KV Tarnawa	132	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9	4.9
77.	736 132KV Timer G	132	61.9	63.9	66.1	68.3	70.5	72.9	75.4	77.9	80.6	83.3	86.1
78.	910 132KV Warsak	132	33.9	35.0	36.0	37.1	38.2	39.3	40.5	41.7	42.9	44.2	45.5
79.	799 132KV Best Way	132	23.2	23.2	23.2	23.2	23.2	23.2	23.2	23.2	23.2	23.2	23.2
80.	801 132KV Mattani	132	16.1	16.8	17.5	18.3	19.0	19.6	20.6	21.5	22.3	23.2	24.1
81.	518 33KV Hattian	132	9.0	9.4	9.8	10.2	10.6	11.1	11.6	12.1	12.6	13.2	13.8
82.	5000 Azad Mandi Ba	132	0.0	0.0	0.0	8.6	8.8	9.1	9.4	9.7	10.0	10.3	10.6
83.	5013 Barikot SWT	132	0.0	0.0	0.0	0.0	18.4	19.1	19.8	20.5	21.3	22.1	22.9
84.	5001 Batkhela	132	0.0	0.0	0.0	18.2	18.9	19.6	20.4	21.2	22.0	22.9	23.8
85.	1006 Chatter Class	132	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
86.	5009 Cherat Ind Pa	132	0.0	0.0	0.0	0.0	3.7	3.8	3.9	4.0	4.2	4.3	4.5
87.	5003 DI KHAN INDUS	132	0.0	0.0	20.8	21.5	22.3	23.1	23.9	24.8	25.7	26.6	27.6
88.	5002 DI KHAN-2	132	0.0	0.0	0.0	17.9	18.5	19.1	19.8	20.5	21.2	22.0	22.8
89.	5014 Dhoobian	132	0.0	10.9	11.3	11.6	12.0	12.4	12.8	13.2	13.7	14.1	14.6
90.	678 Garam Chishma	132	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
91.	5012 Hasan Zai	132	4.0	0.0	0.0	0.0	8.3	8.5	8.8	9.0	9.3	9.5	9.8
92.	5008 NSR Kaka Sahi	132	0.0	0.0	12.3	12.8	13.3	13.8	14.3	14.8	15.3	15.9	16.5
93.	5007 NSR Ridi Indu	132	0.0	0.0	0.0	8.0	8.2	8.4	8.6	8.8	9.0	9.3	9.6
94.	5011 Naguman	132	0.0	0.0	0.0	0.0	11.9	12.3	12.7	13.1	13.5	14.0	14.4
95.	5005 SIRAJ BABA KA	132	0.0	0.0	5.3	5.5	5.7	5.9	6.1	6.3	6.5	6.7	7.0
96.	5006 Sabir Abad	132	0.0	0.0	0.0	17.2	17.7	18.1	18.6	19.1	19.6	20.1	20.6
97.	5004 TORDHER	132	0.0	0.0	9.9	10.3	10.6	11.0	11.3	11.7	12.1	12.5	12.9
98.	718 Turbellia P/H	132	4.3	4.5	4.6	4.8	4.9	5.1	5.3	5.5	5.7	5.9	6.1
99.	5010 Warsak Road F	132	0.0	0.0	6.1	6.2	6.4	6.6	6.8	7.1	7.3	7.5	7.7
100.	775 66KV Abbott A	66	7.8	8.0	8.3	8.6	8.9	9.1	9.4	9.8	10.1	10.5	10.8

Table 1-37: Maximum Demand of Substations (Continued...)

POWER MARKET SURVEY
LOAD CENTRE SUMMARY
MAXIMUM DEMAND (MW) OF GRIDSTATIONS

DISCO: PESCO

GRID NO.	NAME OF GRIDSTATION	V	KV	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
101.	235 66KV Badaber	66	16.8	19.5	20.2	21.0	21.8	22.6	23.1	24.3	25.2	26.2	27.2	
102.	744 66KV Band Kur	66	10.8	11.1	11.5	11.9	12.3	12.8	13.1	13.6	14.1	14.6	15.1	
103.	239 66KV Bankorai	66	39.3	40.6	42.0	33.8	34.9	36.0	37.2	38.4	39.7	41.0	42.4	
104.	258 66KV Daggar	66	6.2	6.5	6.7	6.9	7.1	7.4	7.6	7.9	8.1	8.4	8.7	
105.	868 66KV Dargai	66	7.1	7.3	7.6	7.9	8.2	8.5	8.8	9.1	9.4	9.8	10.1	
106.	625 66KV Dir	66	14.4	14.8	15.3	15.9	16.4	16.9	17.5	18.1	18.7	19.4	20.0	
107.	464 66KV Draban	66	12.7	13.1	13.6	14.0	14.5	15.0	15.5	16.0	16.5	17.1	17.7	
108.	283 66KV Hari Pur	66	14.3	14.8	15.3	15.9	16.5	17.1	17.7	18.4	19.1	19.8	20.5	
109.	286 66KV Havelian	66	20.5	21.3	22.3	23.3	24.4	25.6	26.6	28.0	29.4	30.8	32.3	
110.	282 66KV Hungu	66	35.9	37.1	38.3	39.6	40.9	42.3	43.7	45.2	46.8	48.4	50.0	
111.	292 66KV Jalala	66	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
112.	657 66KV Khaishki	66	0.9	1.0	1.0	1.1	1.1	1.1	1.1	1.3	1.4	1.4	1.5	
113.	511 66KV Kohat	66	9.5	9.9	10.2	10.6	11.0	11.4	11.9	12.3	12.8	13.3	13.8	
114.	466 66KV Kotachi	66	11.9	12.2	12.6	13.1	13.5	13.9	14.4	14.9	15.4	15.9	16.4	
115.	312 66KV Kurram G	66	24.5	25.2	26.1	27.1	28.1	29.1	30.1	31.3	32.4	33.6	34.8	
116.	699 66KV Kurram G	66	9.6	9.9	10.2	10.5	10.8	11.1	11.5	11.9	12.3	12.6	13.0	
117.	596 66KV Pazu	66	7.4	7.8	8.1	8.6	9.0	9.4	9.9	10.3	10.8	11.3	11.8	
118.	386 66KV Tajazai	66	14.9	15.4	15.9	16.5	17.1	17.7	18.3	19.0	19.7	20.4	21.1	
119.	389 66KV Temargar	66	19.1	19.7	20.3	20.9	21.6	22.2	22.9	23.7	24.4	25.2	26.0	
120.	875 66KV Wari	66	24.5	25.2	26.0	26.7	27.5	28.3	29.1	30.0	30.9	31.8	32.7	
121.	830 33KV Daroosh	33	1.6	1.7	1.7	1.8	1.8	1.9	2.0	2.0	2.1	2.2	2.2	
122.	831 33KV Jutilash	33	3.0	3.1	3.2	3.3	3.4	3.5	3.6	3.7	3.9	4.0	4.1	
123.	1002 33KV Majohi	33	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
124.	955 33KV Pattan	33	1.7	1.7	1.8	1.8	1.9	2.0	2.0	2.1	2.2	2.2	2.3	
125.	879 33KV Tha Kot	33	15.1	15.7	16.2	16.8	17.3	17.9	18.6	19.2	19.8	20.5	21.2	

Table 1- 38: Category wise Energy and Demand of Substations

(Continued...)

POWER MARKET SURVEY														
CATEGORY-WISE GRIDSTATION LOAD FOR PESCO														
Year:- YEAR :2023-24														
DISCO: PESCO														
SR	GRID No.	NAME OF GRID STATION		DOMESTIC	COMMERCIAL	PUBLIC LIGHTING	SMALL INDUSTRIES	M & L INDUSTRIES	PIPE WELLS PRIVATE	PIPE WELLS PUBLIC	TRACTION	TOTAL OF GRIDSTATION	POWER FACTOR(%)	REACT-POWER(Mvar)
1.	156	132KV/ 132KV Prova	GWh	56.29	4.16	0.00	9.78	3.58	4.26	0.00	3.00	77.07	0.88	
			NW	21.42	1.90	0.00	1.24	7.49	0.25	0.00	0.00	30.69	17.00	
2.	628	132KV/ 132KV AMC A/Aba	GWh	146.57	56.50	0.37	13.71	20.76	0.17	0.00	0.00	238.09	0.89	
			NW	24.97	11.73	0.14	1.74	3.08	0.01	0.00	0.00	39.59	20.00	
3.	784	132KV/ 132KV AWT Nizam	GWh	0.00	0.00	0.00	0.00	143.71	0.00	0.00	0.00	143.71	0.90	
			NW	0.00	0.00	0.00	0.00	29.20	0.00	0.00	0.00	29.20	14.00	
4.	4	132KV/ 132KV Abbottaba	GWh	194.51	98.34	0.50	17.61	28.15	0.43	0.00	0.00	339.54	0.89	
			NW	37.01	24.95	0.19	2.23	29.63	0.03	0.00	0.00	89.34	46.00	
5.	580	132KV/ 132KV Balakot	GWh	85.75	9.33	0.00	0.68	0.42	0.01	0.00	0.00	96.19	0.90	
			NW	15.06	2.13	0.00	0.09	1.49	0.00	0.00	0.00	16.89	8.00	
6.	11	132KV/ 132KV Bannu	GWh	189.26	30.01	0.01	28.57	18.80	5.24	0.00	0.00	269.88	0.89	
			NW	86.42	17.13	0.00	3.62	82.07	0.25	0.00	0.00	180.02	92.00	
7.	14	132KV/ 132KV Battal	GWh	407.19	32.22	0.00	13.03	5.06	0.01	0.00	0.00	457.51	0.90	
			NW	77.47	8.17	0.00	1.65	12.88	0.00	0.00	0.00	90.16	44.00	
8.	24	132KV/ 132KV Chakdara	GWh	565.86	67.43	0.03	41.61	11.07	15.59	0.00	0.00	699.59	0.89	
			NW	107.66	17.11	0.01	5.28	45.58	1.03	0.00	0.00	159.00	81.00	
9.	26	132KV/ 132KV Charssada	GWh	603.35	89.19	0.25	18.84	10.52	4.11	0.00	0.00	717.27	0.90	
			NW	114.79	20.34	0.10	2.39	29.93	0.31	0.00	0.00	159.47	77.00	
10.	1004	132KV/ 132KV Cherat Ce	GWh	0.00	0.00	0.00	0.00	77.76	0.00	0.00	0.00	77.76	0.90	
			NW	0.00	0.00	0.00	0.00	14.17	0.00	0.00	0.00	14.17	7.00	
11.	717	132KV/ 132KV Consumer	GWh	0.00	0.00	0.00	0.00	95.11	0.00	0.00	0.00	95.11	0.90	
			NW	0.00	0.00	0.00	0.00	20.69	0.00	0.00	0.00	20.69	10.00	
12.	34	132KV/ 132KV D.I.Khan	GWh	1521.97	144.89	0.34	58.00	51.56	22.68	0.00	0.00	1599.43	0.89	
			NW	251.52	36.76	0.13	7.36	20.53	1.73	0.00	0.00	302.11	155.00	
13.	1026	132KV/ 132KV Daggar	GWh	172.59	22.70	0.00	20.35	94.64	0.63	0.00	0.00	310.90	0.86	
			NW	56.29	8.64	0.00	2.58	30.51	0.05	0.00	0.00	88.26	52.00	
14.	865	132KV/ 132KV Dala Zak	GWh	84.05	5.90	0.01	1.11	3.28	0.16	0.00	0.00	94.62	0.90	
			NW	31.98	3.37	0.00	0.14	16.18	0.02	0.00	0.00	43.94	21.00	
15.	262	132KV/ 132KV Dargai	GWh	135.71	26.66	0.19	6.54	347.61	2.50	0.00	0.00	519.21	0.88	
			NW	26.26	5.97	0.07	0.83	0.61	0.19	0.00	0.00	30.54	16.00	
16.	627	132KV/ 132KV Gadoon Am	GWh	39.93	2.68	0.00	4.01	1058.03	1.81	0.00	0.00	1106.46	0.90	
			NW	11.39	0.68	0.00	0.51	129.22	0.14	0.00	0.00	120.65	58.00	
17.	694	132KV/ 132KV Gumbat	GWh	59.33	3.80	0.00	5.08	1.75	3.32	0.00	0.00	73.28	0.89	
			NW	32.25	2.89	0.00	0.64	4.50	0.25	0.00	0.00	34.46	18.00	
18.	763	132KV/ 132KV Gurgurai	GWh	12.97	0.26	0.00	0.04	0.00	0.03	0.00	0.00	13.31	0.90	
			NW	8.71	0.20	0.00	0.00	0.00	0.00	0.00	0.00	7.58	4.00	
19.	59	132KV/ 132KV Haripur	GWh	783.61	214.59	0.86	66.00	81.00	20.41	0.00	0.00	1174.68	0.89	
			NW	162.64	54.24	0.33	8.37	20.69	2.24	0.00	0.00	236.08	121.00	
20.	638	132KV/ 132KV Hattar	GWh	40.00	13.55	0.00	12.29	4174.90	1.00	0.00	0.00	4241.80	0.90	
			NW	9.13	2.81	0.00	1.56	158.11	0.08	0.00	0.00	154.52	75.00	
21.	834	132KV/ 132KV Hayat Aba	GWh	158.45	12.03	2.33	9.60	659.91	2.77	0.00	0.00	845.09	0.89	
			NW	51.68	5.49	0.89	1.22	45.38	0.21	0.00	0.00	94.38	48.00	
22.	961	132KV/ 132KV Hussai	GWh	217.86	13.30	0.00	18.07	11.69	6.16	0.00	0.00	267.09	0.89	
			NW	80.23	6.07	0.00	2.29	10.35	0.47	0.00	0.00	89.47	46.00	
23.	757	132KV/ 132KV Jalala	GWh	234.66	50.65	0.10	13.95	68.45	1.96	0.00	0.00	369.79	0.90	
			NW	83.72	23.15	0.04	1.77	16.85	0.15	0.00	0.00	113.09	55.00	
24.	70	132KV/ 132KV Jamrud	GWh	85.30	88.78	1.97	26.39	920.76	1.75	0.00	0.00	1124.95	0.89	
			NW	27.82	40.54	0.75	5.35	121.25	0.13	0.00	0.00	174.45	89.00	
25.	66	132KV/ 132KV Jehangira	GWh	289.07	73.47	0.20	49.98	130.61	3.36	0.00	0.00	616.69	0.85	
			NW	66.00	20.97	0.08	6.34	42.96	0.58	0.00	0.00	127.75	79.00	

Table 1-38: Category wise Energy and Demand of Substations

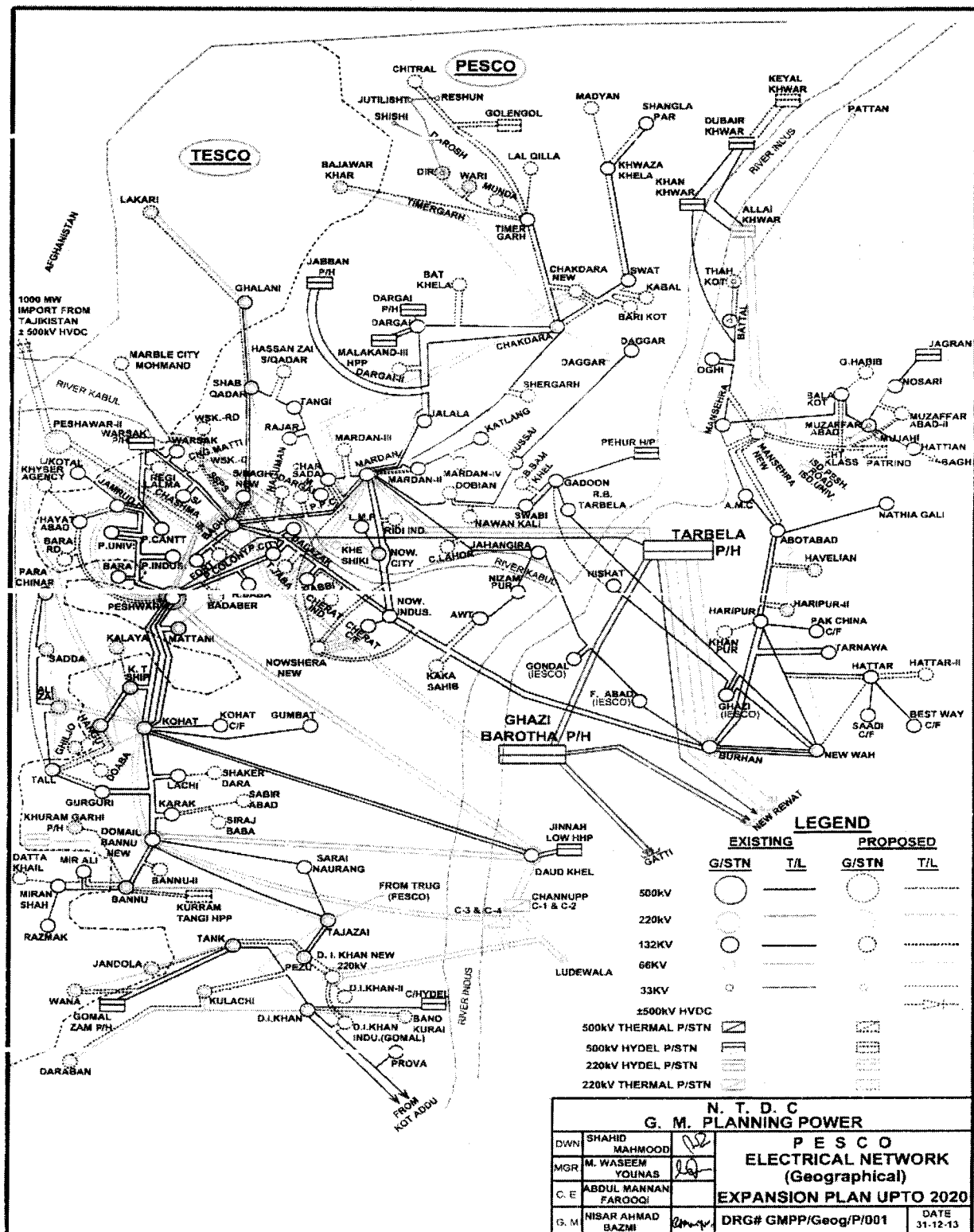
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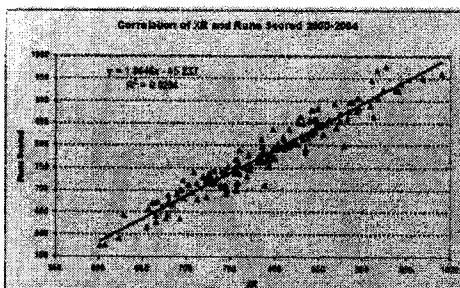
POWER MARKET SURVEY
CATEGORY-WISE GRIDSTATION LOAD FOR DISCO
Year:- YEAR :2023-24

DISCO: PESCO

SR GRID No.	GRID No.	NAME OF GRID STATION		DOMESTIC	COMMERCIAL	PUBLIC LIGHTING	SMALL INDUSTRIES	M & L INDUSTRIES	TUBE WELLS PRIVATE	PUBLIC TRACTION	TOTAL OF GRIDSTATION	POWER FACTOR(%) REACT-POWER(Mva)
26.	1054	132KV 132KV R.D.A Roh	GWh	61.22	5.30	0.06	2.53	1.73	0.03	0.00	70.86	0.90
			MW	38.83	4.03	0.02	0.32	3.00	0.00	0.00	43.89	21.00
27.	98	132KV 132KV Karak	GWh	136.20	16.38	0.00	19.29	5.17	2.40	0.00	179.33	0.89
			MW	62.19	9.35	0.00	2.45	42.66	0.7	0.00	105.14	54.00
28.	906	132KV 132KV Kat lang	GWh	71.26	4.96	0.00	8.72	1.97	1.86	0.00	88.79	0.89
			MW	32.55	1.62	0.00	1.11	5.68	0.4	0.00	34.93	18.00
29.	877	132KV 132KV Khawda Kh	GWh	169.82	12.37	0.01	3.94	6.77	2.95	0.00	195.87	0.90
			MW	60.58	4.71	0.00	0.50	6.13	0.02	0.00	61.32	30.00
30.	111	132KV 132KV Kohat	GWh	308.42	98.08	0.73	31.69	57.37	16.74	0.00	512.63	0.89
			MW	70.42	37.40	0.28	4.02	36.22	1.03	0.00	142.08	73.00
31.	714	132KV 132KV Kohat Cem	GWh	0.00	0.00	0.00	0.00	222.11	0.00	0.00	222.11	0.90
			MW	0.00	0.00	0.00	0.00	39.76	0.00	0.00	39.76	19.00
32.	460	132KV 132KV Lachi	GWh	88.84	4.75	0.00	10.36	4.83	4.00	0.00	112.78	0.89
			MW	28.98	1.17	0.00	1.31	19.12	0.00	0.00	44.10	23.00
33.	716	132KV 132KV Locomotiv	GWh	0.00	0.00	0.00	0.00	2.71	0.00	0.00	2.71	0.90
			MW	0.00	0.00	0.00	0.00	11.98	0.00	0.00	11.98	6.00
34.	896	132KV 132KV Madyan	GWh	1.15	0.12	0.00	0.00	0.00	0.00	0.00	1.28	0.90
			MW	0.44	0.04	0.00	0.00	0.00	0.00	0.00	0.40	0.00
35.	128	132KV 132KV Mangohra	GWh	313.94	98.86	0.56	24.91	25.38	1.02	0.00	465.44	0.89
			MW	59.73	25.08	0.21	3.16	14.29	0.12	0.00	97.46	50.00
36.	693	132KV 132KV Mardan	GWh	164.56	25.64	1.63	14.58	7.61	1.82	0.00	235.24	0.89
			MW	60.20	11.71	0.62	1.85	22.79	0.09	0.00	92.39	47.00
37.	324	132KV 132KV Mattani	GWh	43.08	2.08	0.00	3.39	0.15	6.03	0.00	55.12	0.88
			MW	81.96	6.50	0.00	0.43	0.00	0.00	0.00	75.96	41.00
38.	137	132KV 132KV Murree	GWh	26.65	2.68	0.00	0.04	1.00	0.00	0.00	30.43	0.90
			MW	30.42	3.06	0.00	0.00	25.89	0.00	0.00	50.30	24.00
39.	919	132KV 132KV Muzaffar A	GWh	37.56	2.91	0.00	0.45	0.30	0.01	0.00	41.23	0.90
			MW	6.40	0.51	0.00	0.06	0.00	0.00	0.00	7.68	4.00
40.	473	132KV 132KV Muzaffar	GWh	149.11	57.71	0.00	0.00	85.88	0.00	0.00	292.70	0.86
			MW	30.95	16.47	0.00	0.00	0.00	0.00	0.00	47.42	28.00
41.	150	132KV 132KV NSR City	GWh	175.92	48.41	0.04	9.42	551.43	5.63	0.00	791.99	0.88
			MW	39.71	18.42	0.02	1.19	29.48	6.43	0.00	84.76	46.00
42.	151	132KV 132KV NSR Indus	GWh	120.51	40.95	0.19	11.73	31.11	10.97	0.00	215.45	0.89
			MW	27.51	15.58	0.07	1.49	26.11	0.83	0.00	68.02	35.00
43.	857	132KV 132KV Nathia Ga	GWh	27.77	10.21	0.14	0.93	3.93	0.00	0.00	42.63	0.90
			MW	7.55	2.92	0.05	0.13	1.53	0.00	0.00	10.35	5.00
44.	146	132KV 132KV New Wah	GWh	10.56	1.92	0.00	1.95	3.89	0.01	0.00	17.53	0.85
			MW	6.03	1.16	0.00	0.25	108.61	0.04	0.00	98.93	61.00
45.	462	132KV 132KV Nishat Ta	GWh	69.00	17.83	0.57	2.94	17.35	2.04	0.00	109.93	0.90
			MW	15.44	4.53	0.22	0.57	3.02	0.00	0.00	22.00	11.00
46.	145	132KV 132KV Nizam Pur	GWh	27.63	1.58	0.00	1.94	0.84	0.00	0.00	35.77	0.88
			MW	7.01	0.60	0.00	0.22	5.03	0.00	0.00	11.70	6.00
47.	709	132KV 132KV Nuserry	GWh	32.62	19.26	0.00	0.00	21.97	0.00	0.00	73.86	0.86
			MW	8.28	6.28	0.00	0.00	0.00	0.00	0.00	13.10	8.00
48.	712	132KV 132KV PFC Chars	GWh	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.76	0.90
			MW	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.37	2.00
49.	340	132KV 132KV Pabbi	GWh	124.36	38.88	0.01	13.32	23.80	5.03	0.00	304.38	0.89
			MW	53.36	10.32	0.00	1.69	21.91	0.08	0.00	76.90	40.00
50.	160	132KV 132KV Peshawar Ind	GWh	309.23	90.97	3.80	64.03	41.04	3.01	0.00	519.20	0.89
			MW	78.44	36.90	1.44	8.12	53.73	0.08	0.00	150.97	77.00

Figure 1- 10: Distribution Network Map





PESHAWAR ELECTRIC SUPPLY COMPANY

**JOINTLY PREPARED BY PESCO
UNDER THE SUPERVISION OF
PLANNING POWER, NTDC
MAY 2015**



ANNEXURE-4

DIIP-PESCO

ANNEXURE 5

ANNEX-1 PESCO LOAD FLOW STUDY

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE

Exhibit-1-2015-1.1

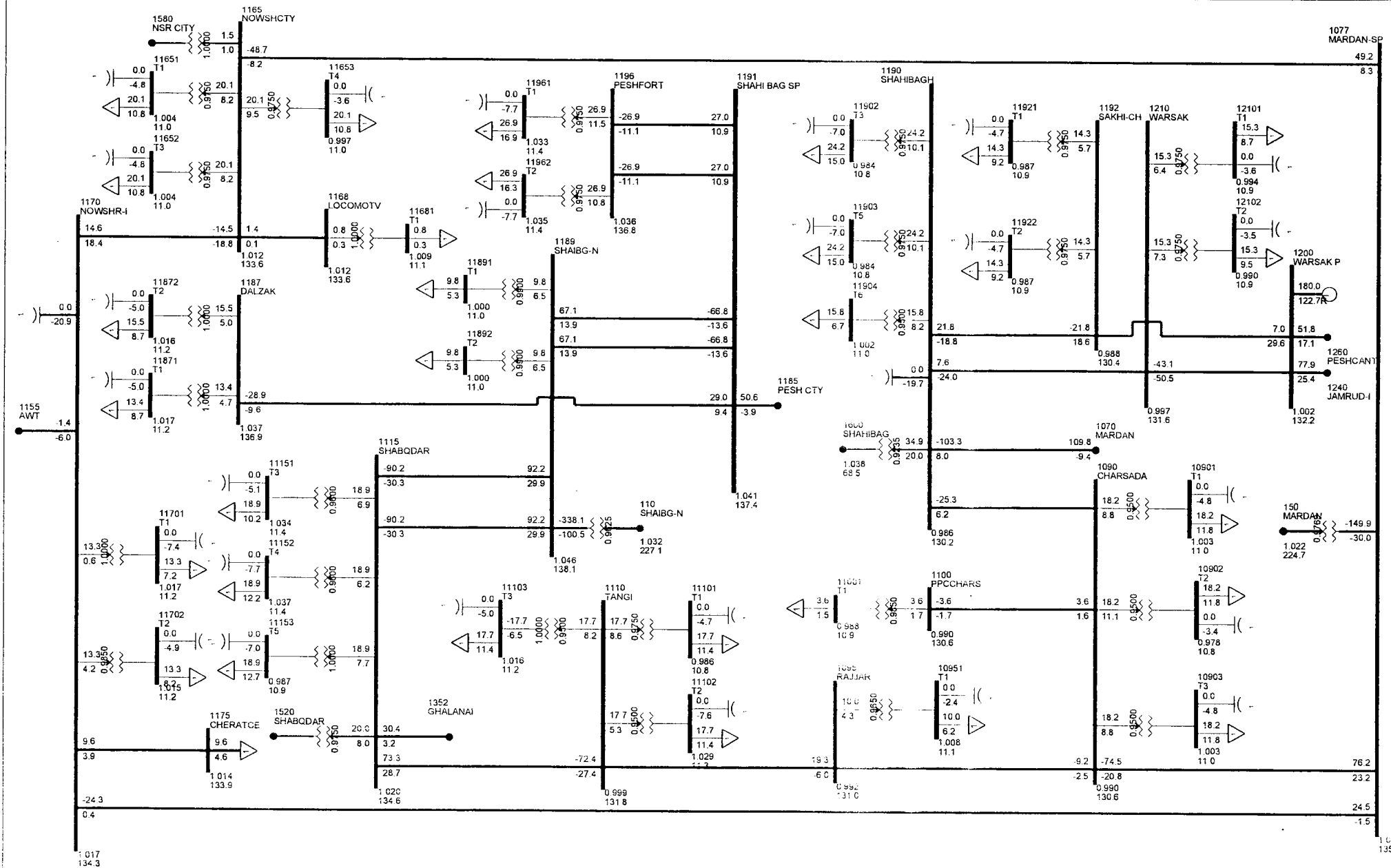
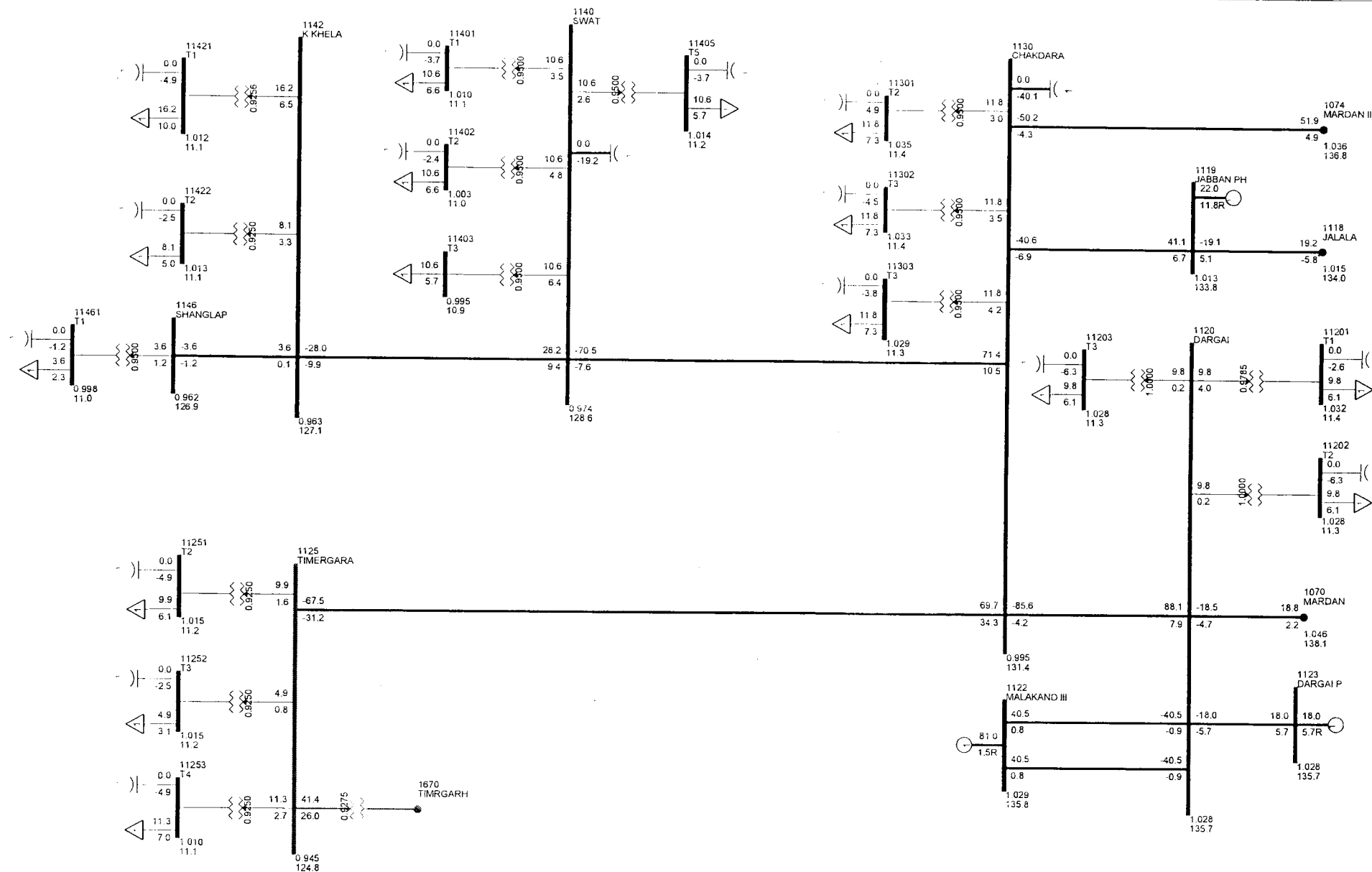


Exhibit-1-2015-1.3



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE

Exhibit-1-2015-1.4

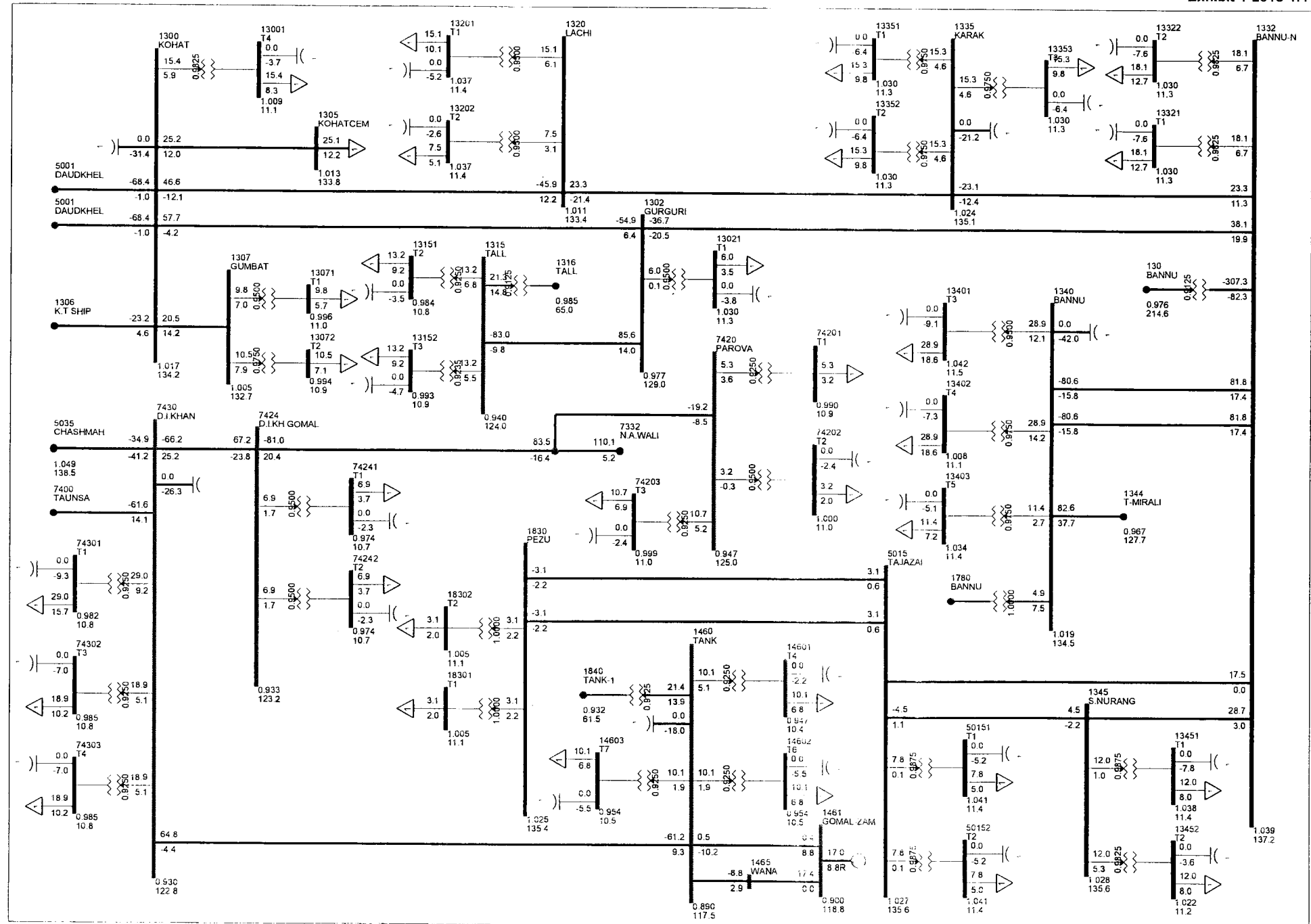
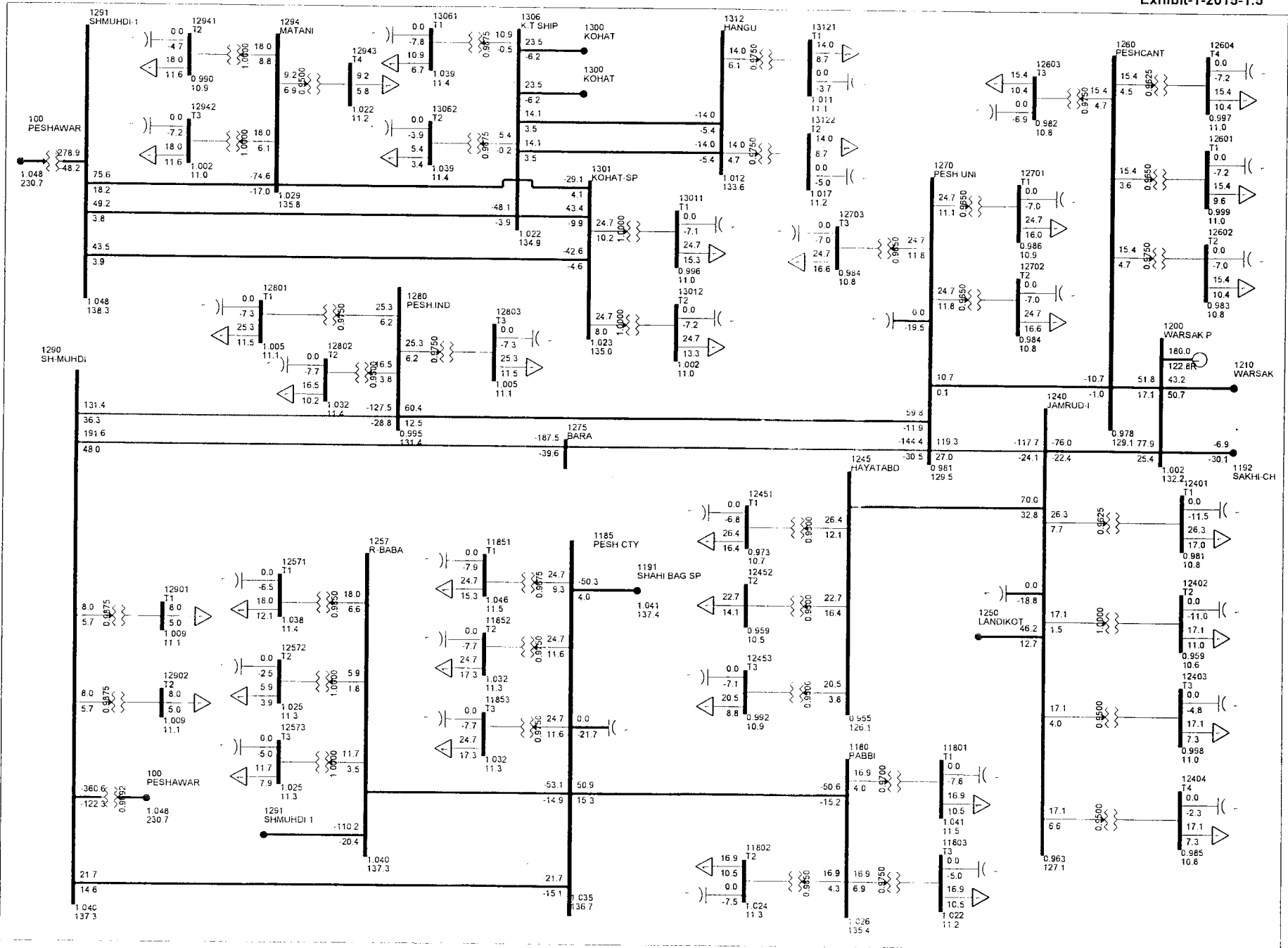
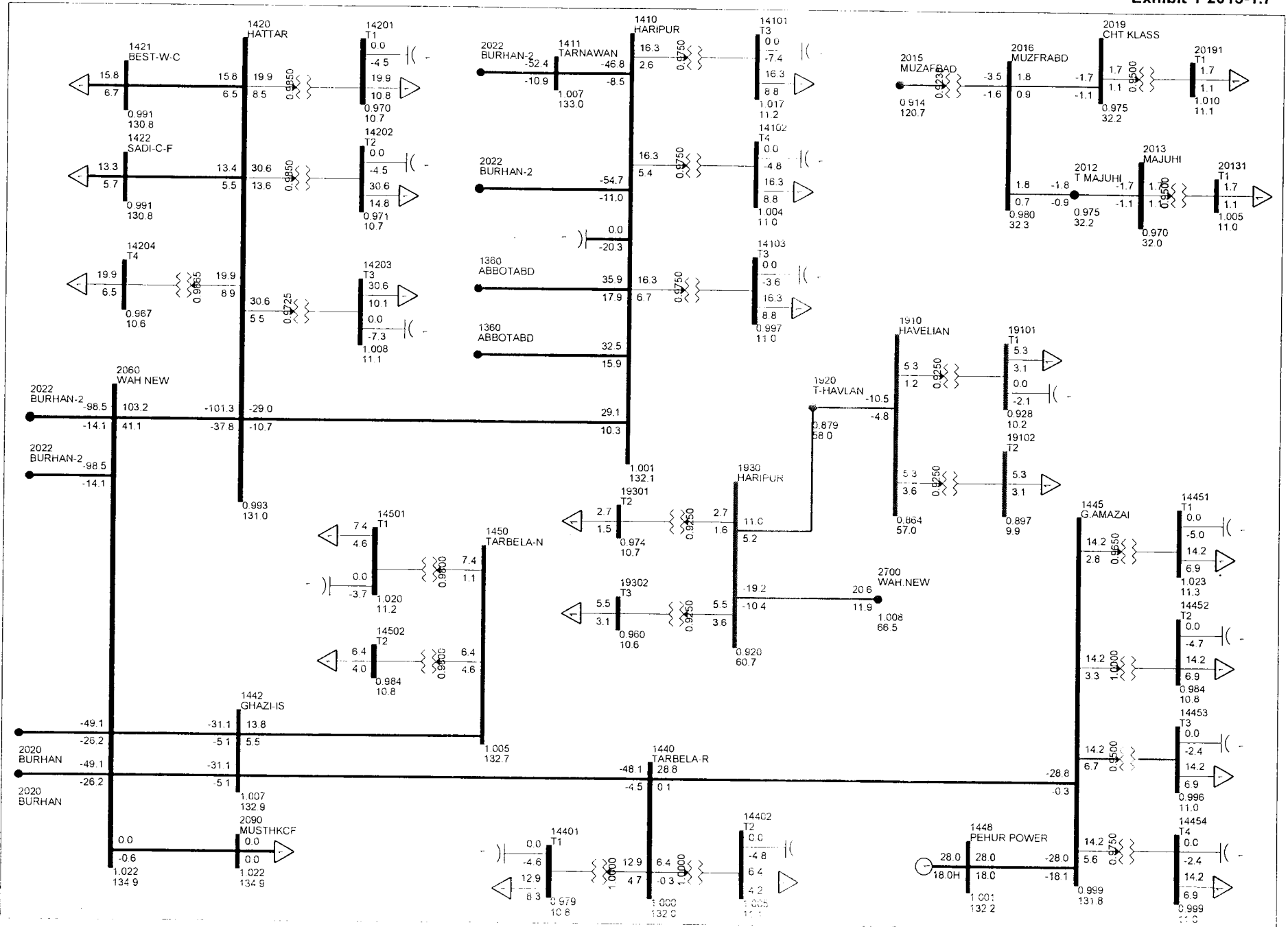


Exhibit-1-2015-1.5



PESCO LOAD FLOW STUDY FOR TRANCHE-III YEAR 2015: BASE CASE

Exhibit-1-2015-1.7



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE WITH REINFORCEMENT

Exhibit-1-2015-2.1

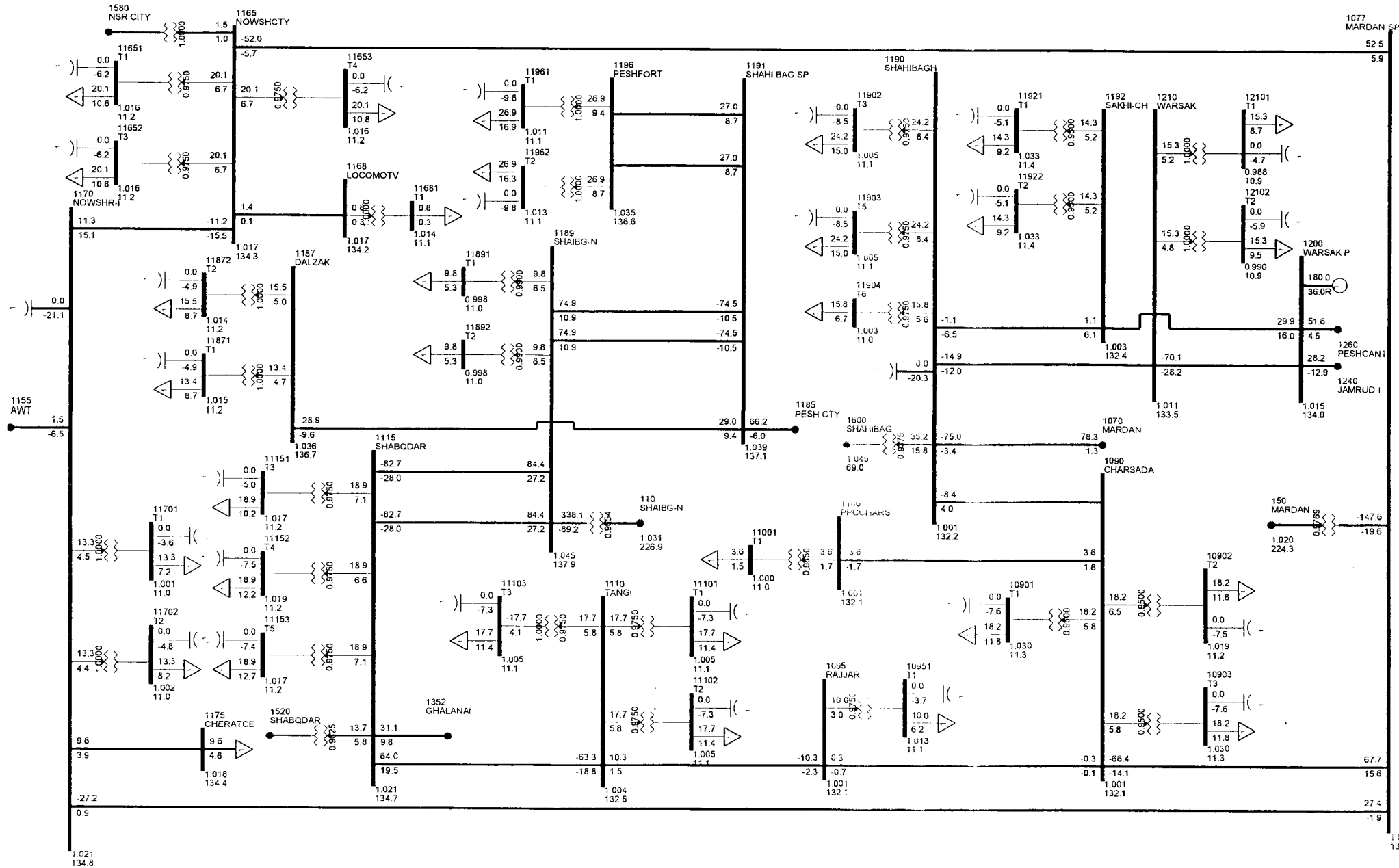
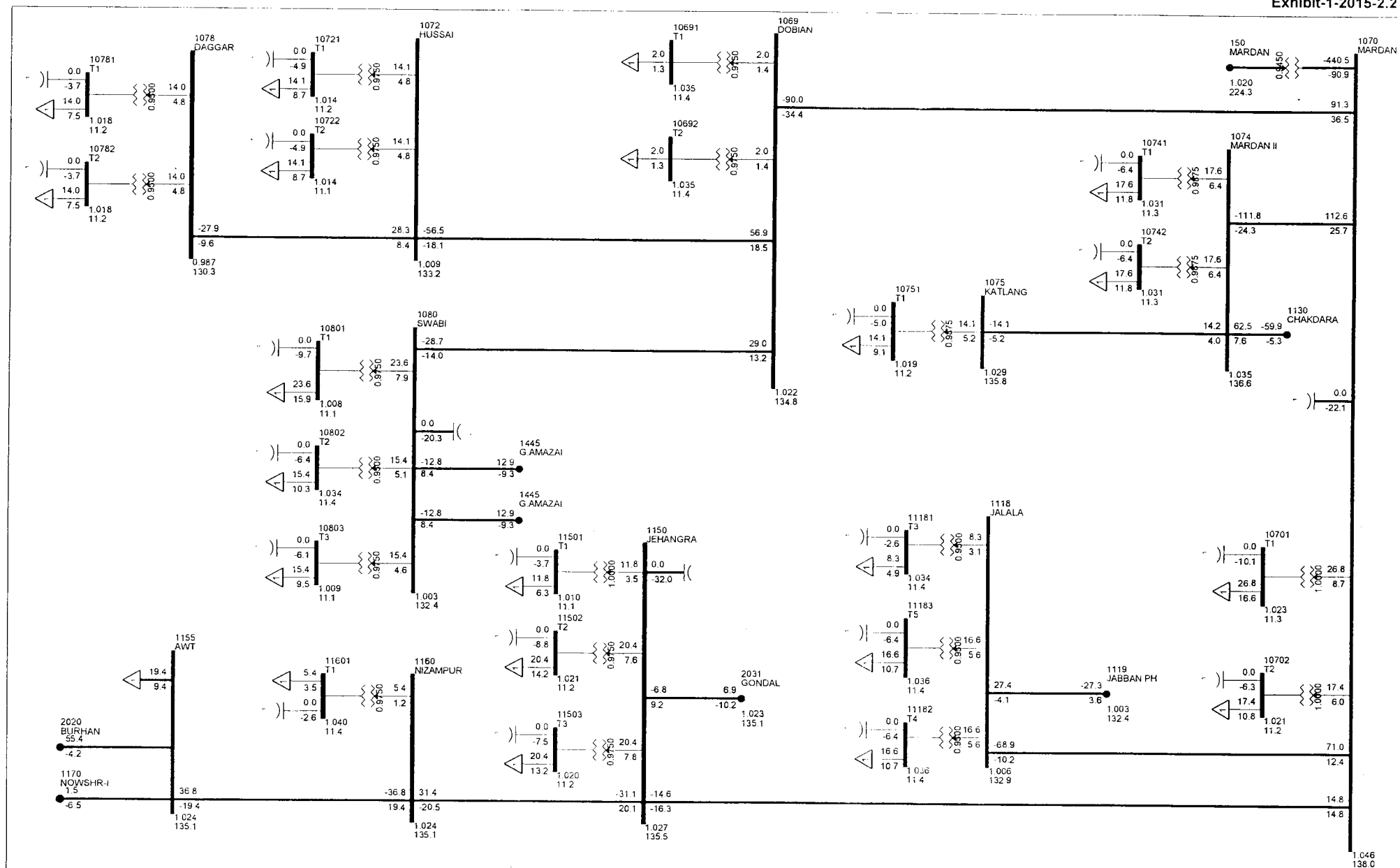
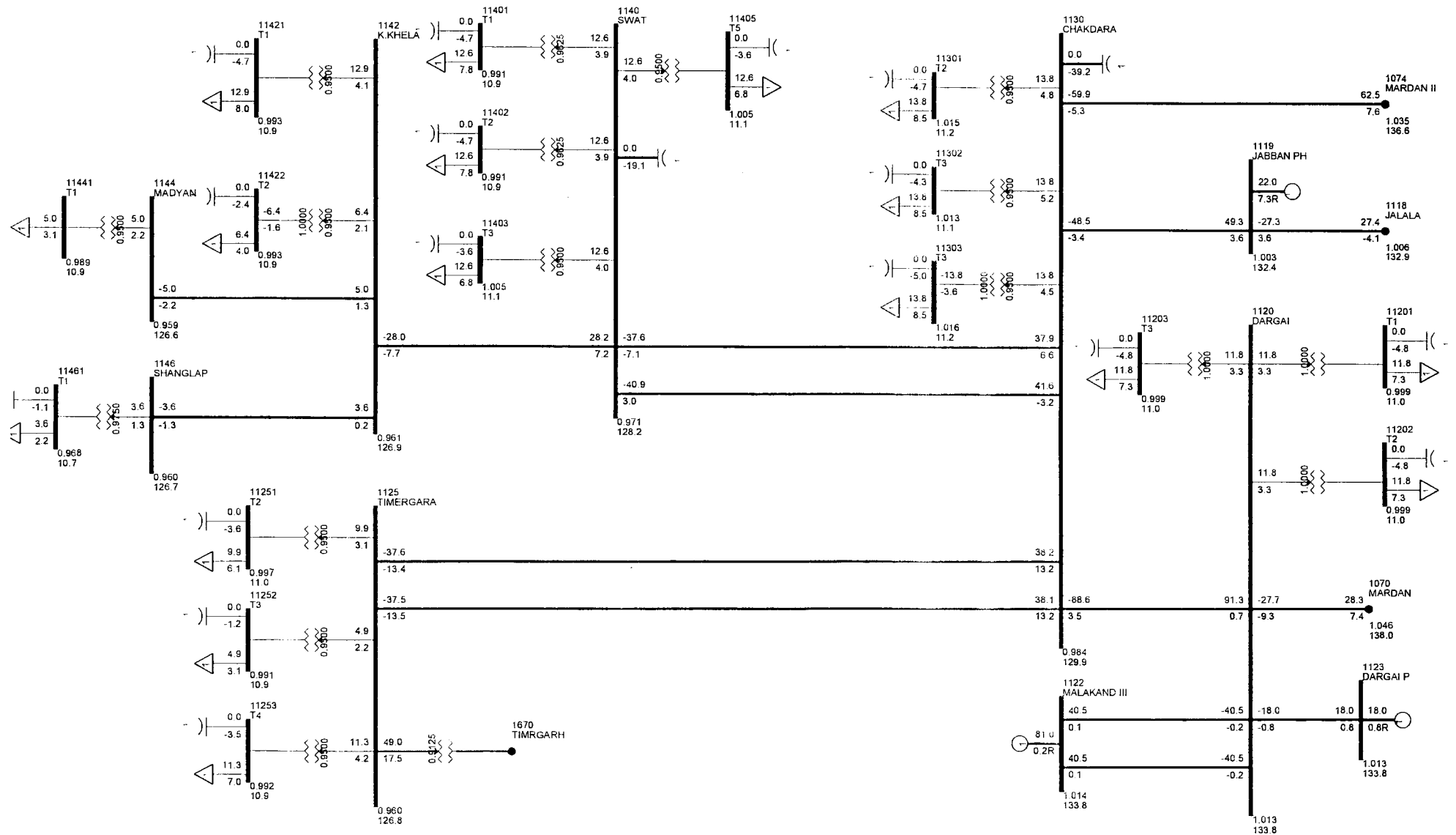


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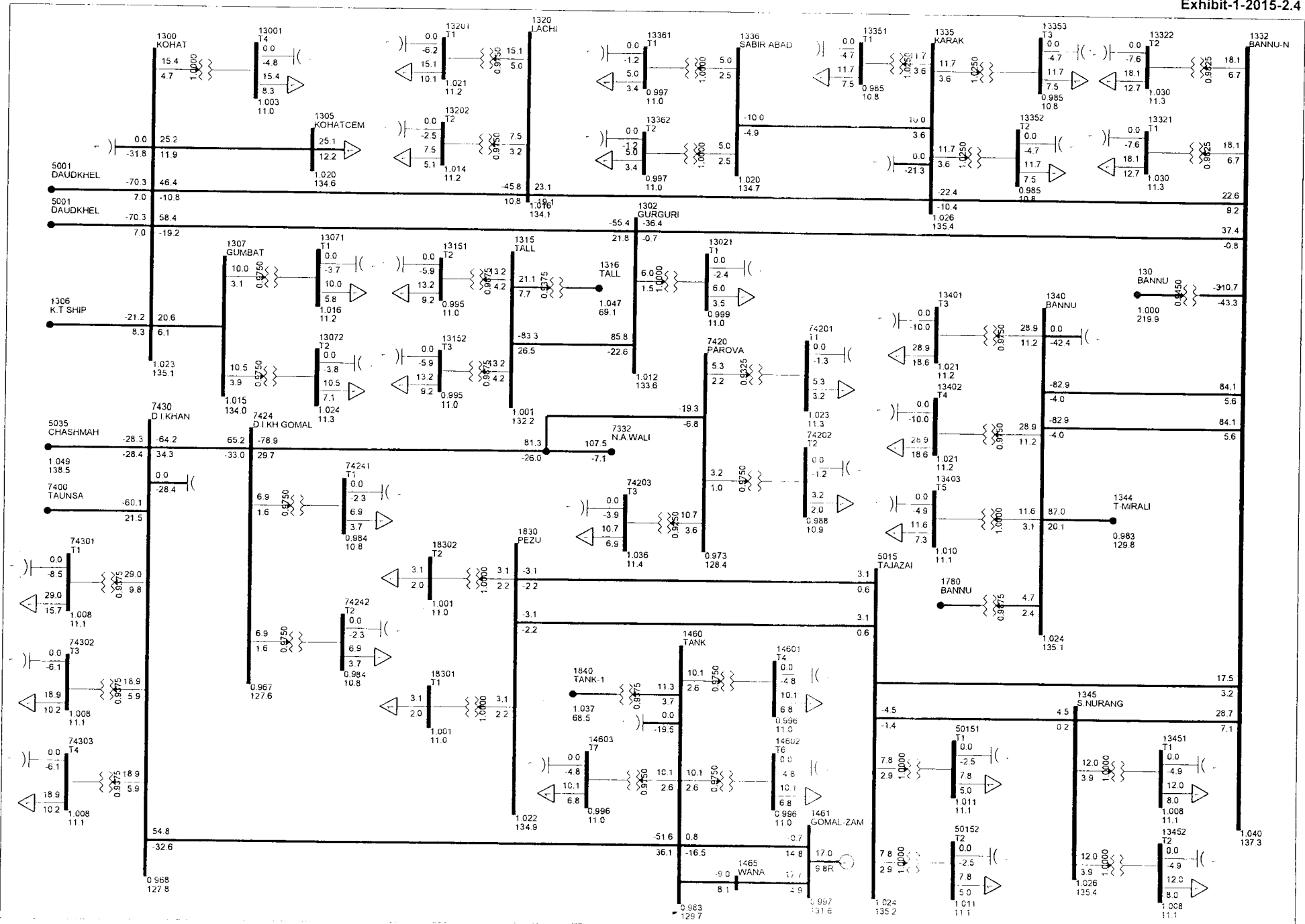
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE WITH REINFORCEMENT

Exhibit-1-2015-2.3



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE WITH REINFORCEMENT

Exhibit-1-2015-2.4



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2015: BASE CASE WITH REINFORCEMENT

Exhibit-1-2015-2.5

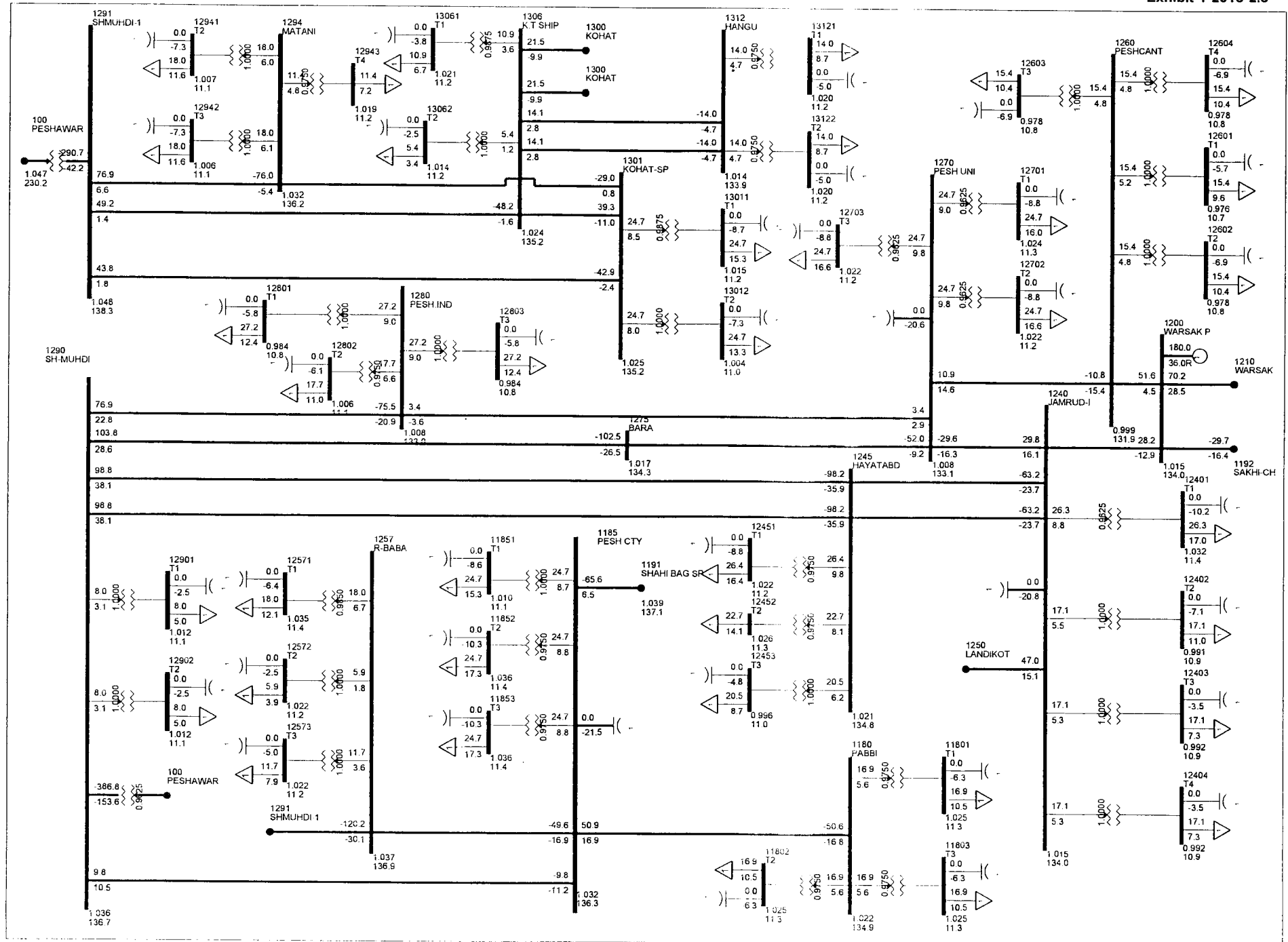


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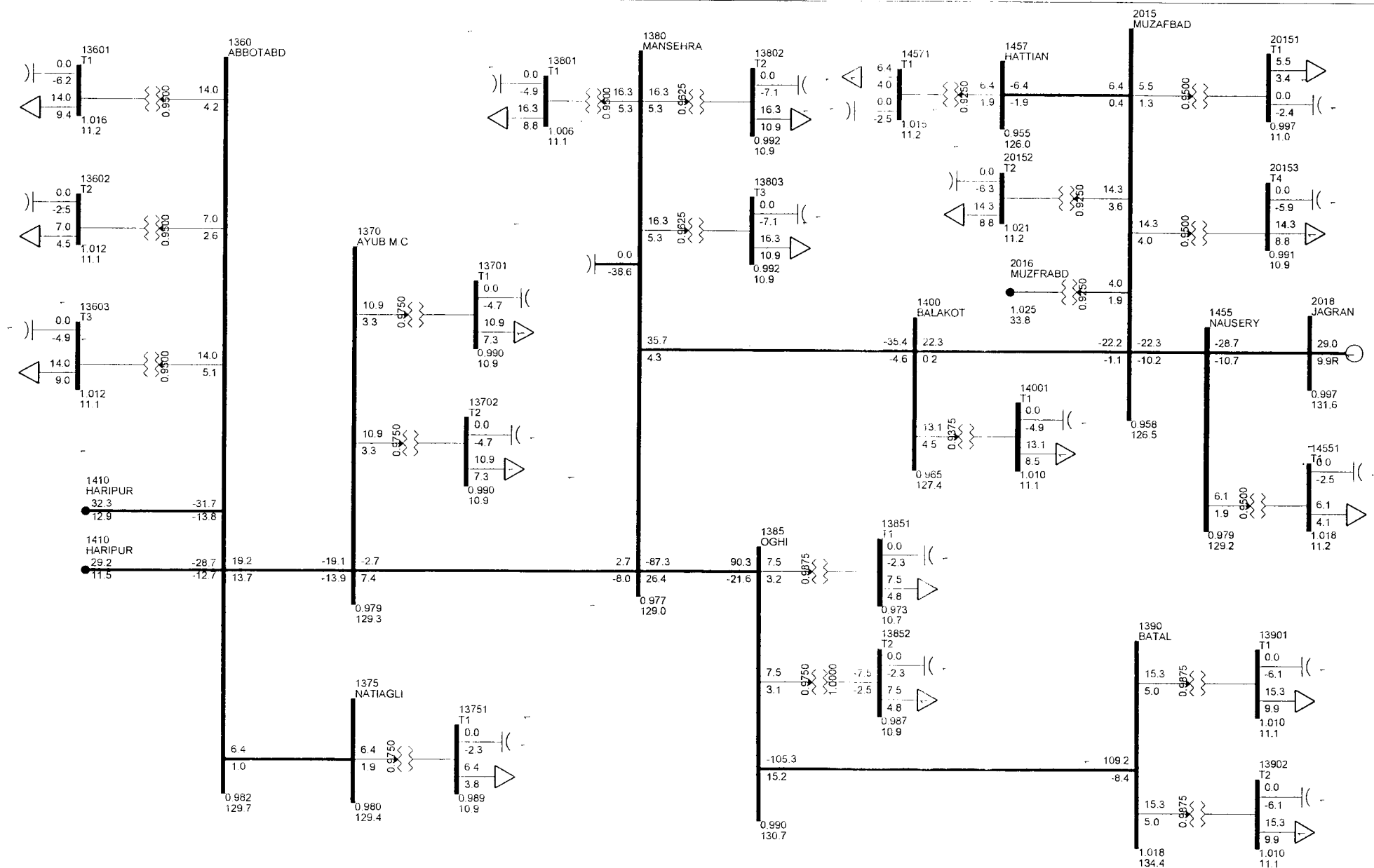
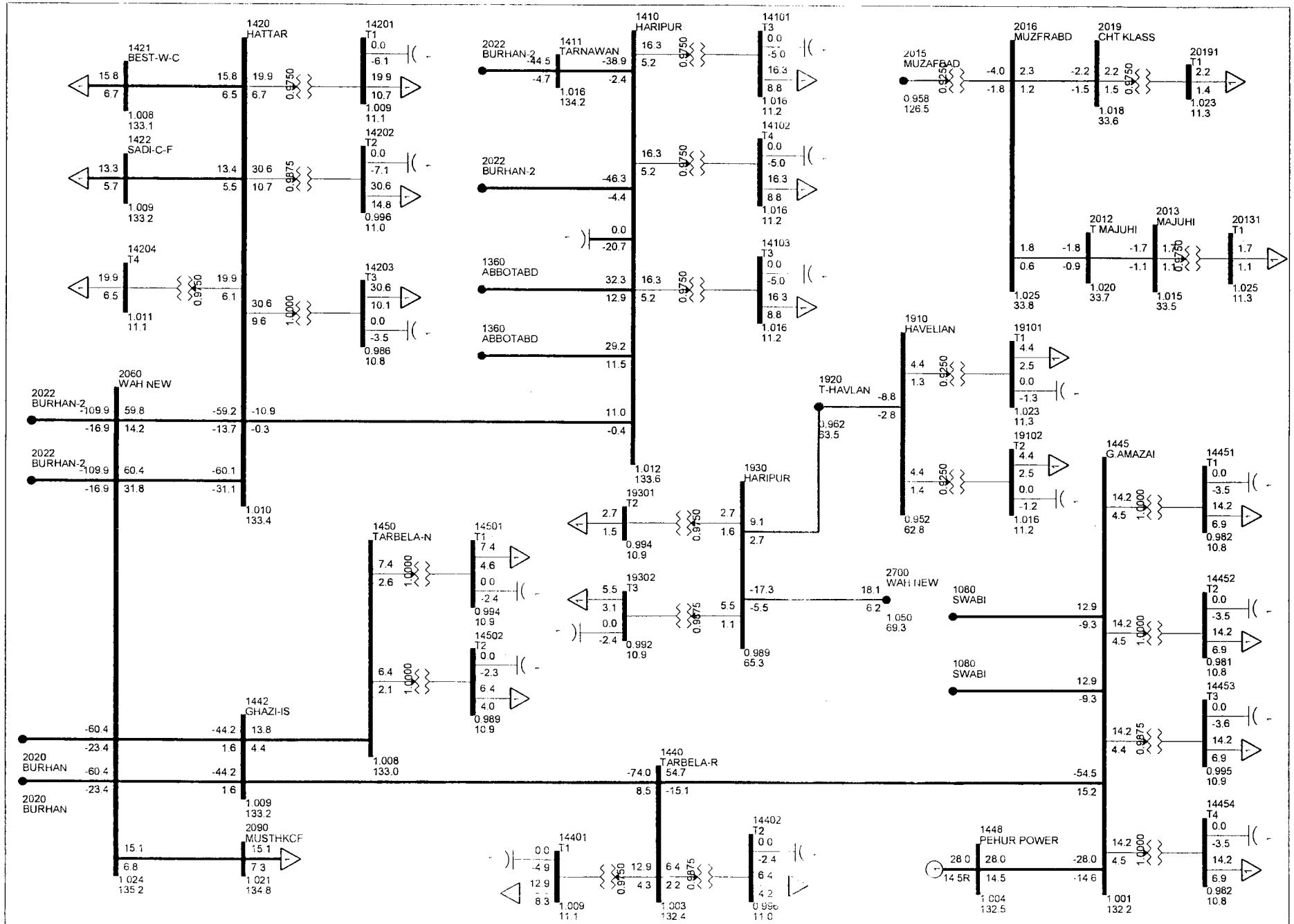


Exhibit-1-2015-2.7



PESCO IGTD 2015 with R losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E TUE, JUN 21 2014 12:25

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN AREA TOTALS

YEAR 2015: BASE CASE WITH REINFORCEMENT IN MW/MVAR

INTERCHANGE-	FROM	TO	LOAD	TO					-NET
TO TIES	GENE- DESIRED	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE	
X-- AREA + LOADS	--X NET INT	RATION TO AREA	SHUNT	DEVICES	SHUNT CHARGING	LOSSES	LINES		
1 -2225.7	576.3 0.0	2712.7	0.0	0.0	0.0	0.0	89.3	-2285.2	
PESCO -575.1	101.5	1629.5	-1384.3	0.0	0.0	183.5	614.9	-611.1	
COLUMN -2225.7	576.3 0.0	2712.7	0.0	0.0	0.0	0.0	89.3	-2285.2	
TOTALS -575.1	101.5	1629.5	-1384.3	0.0	0.0	183.5	614.9	-611.1	

Exhibit-1-2016-1.1

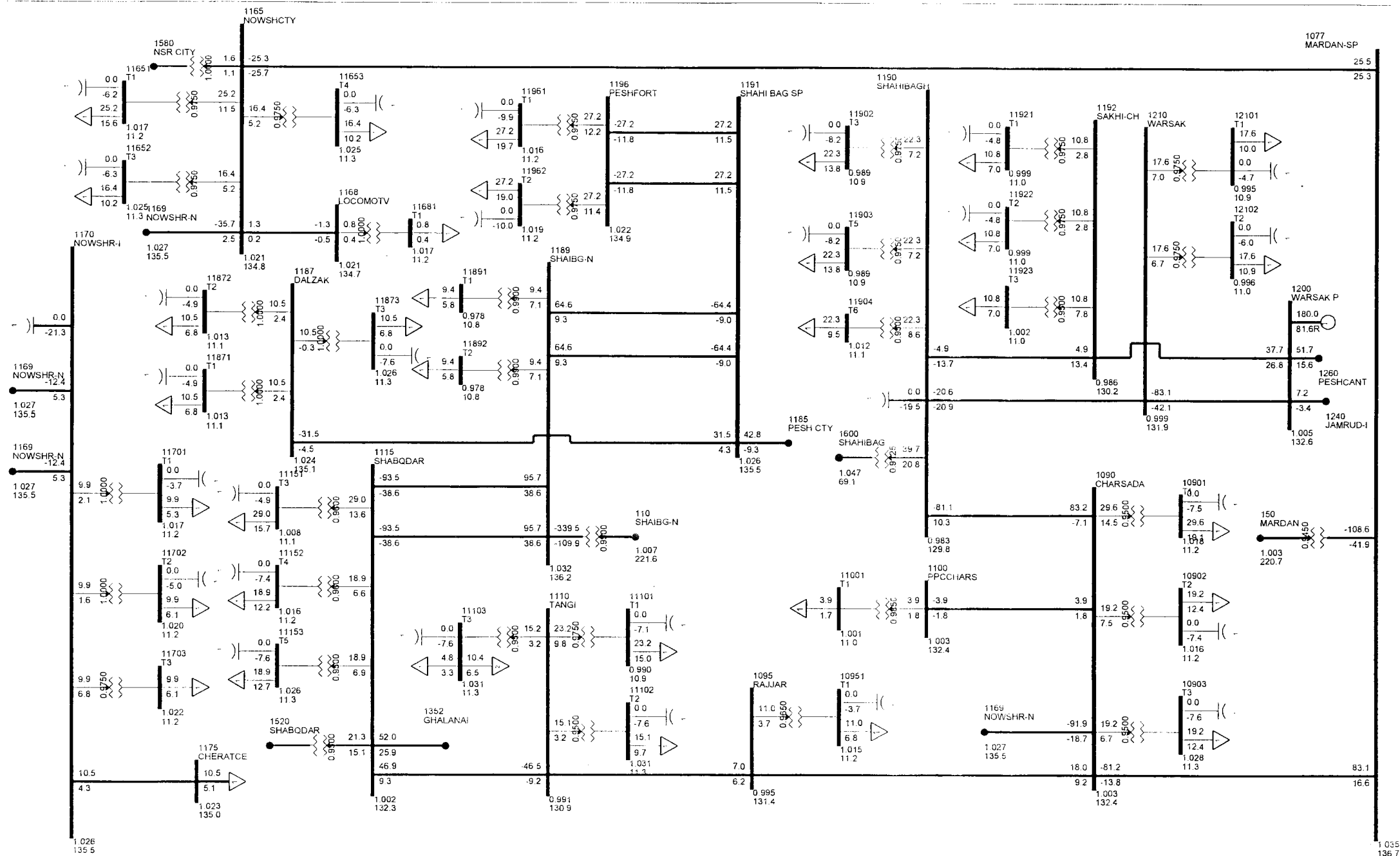


Exhibit-1-2016-1.2

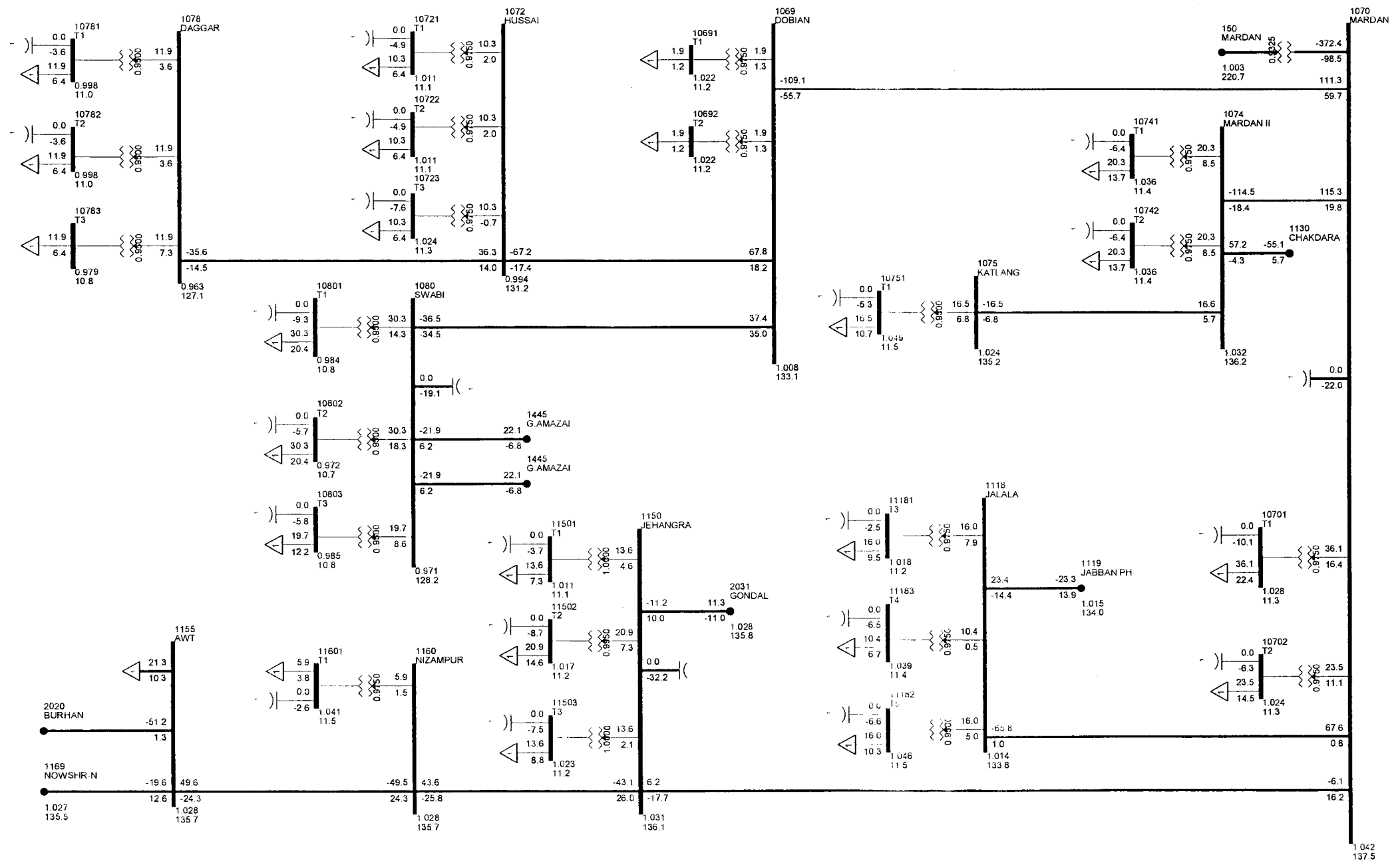


Exhibit-1-2016-1.3

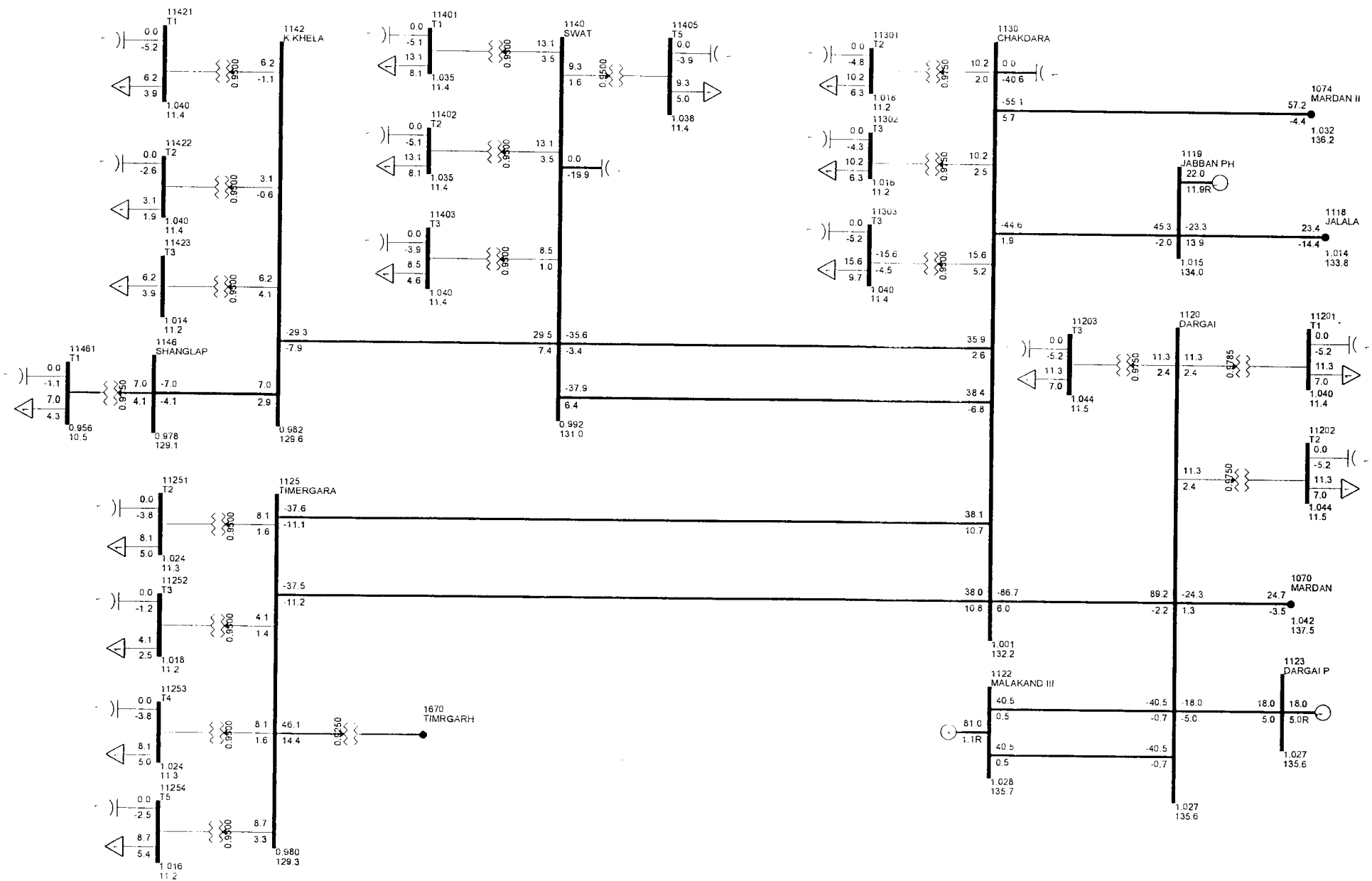
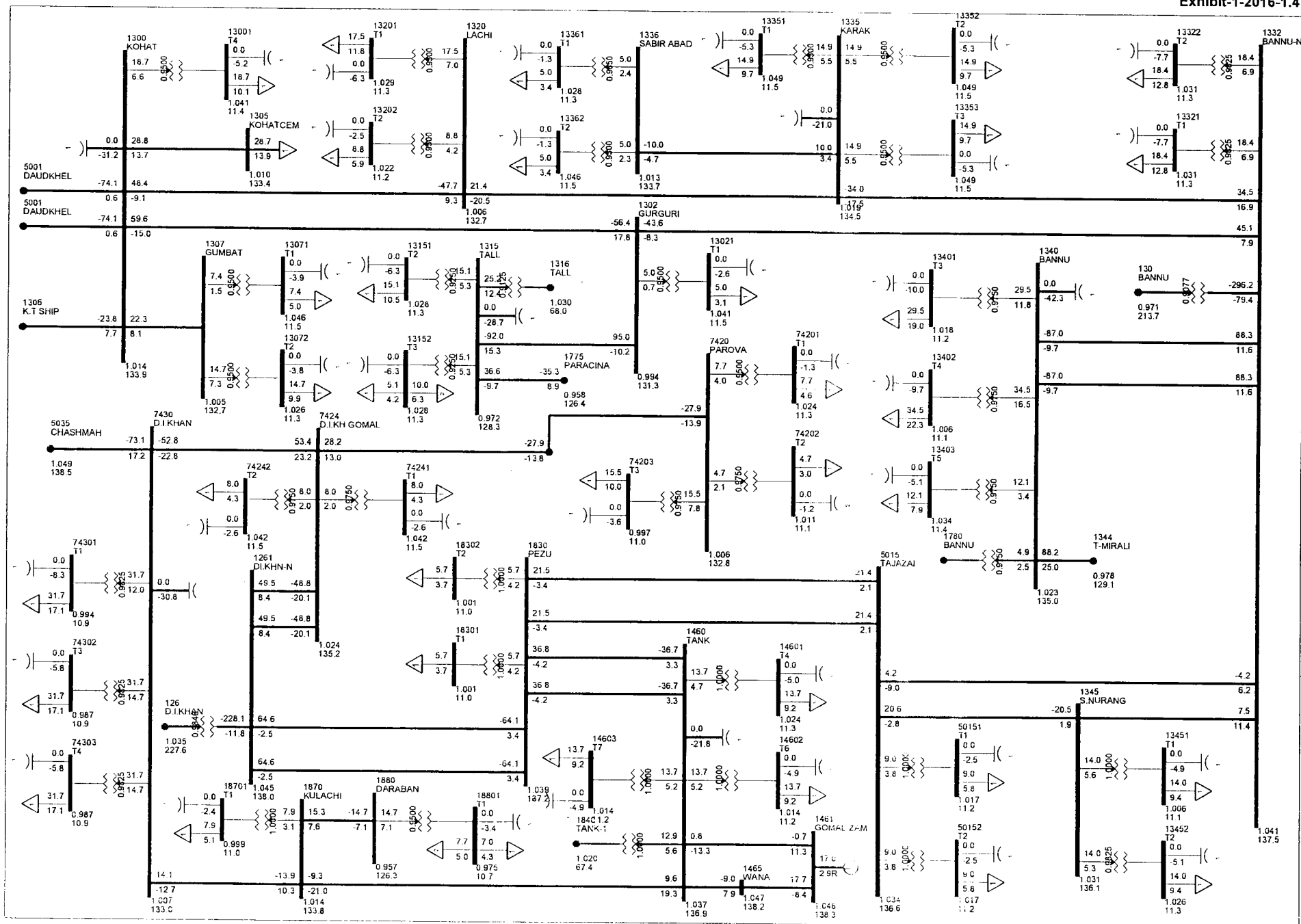
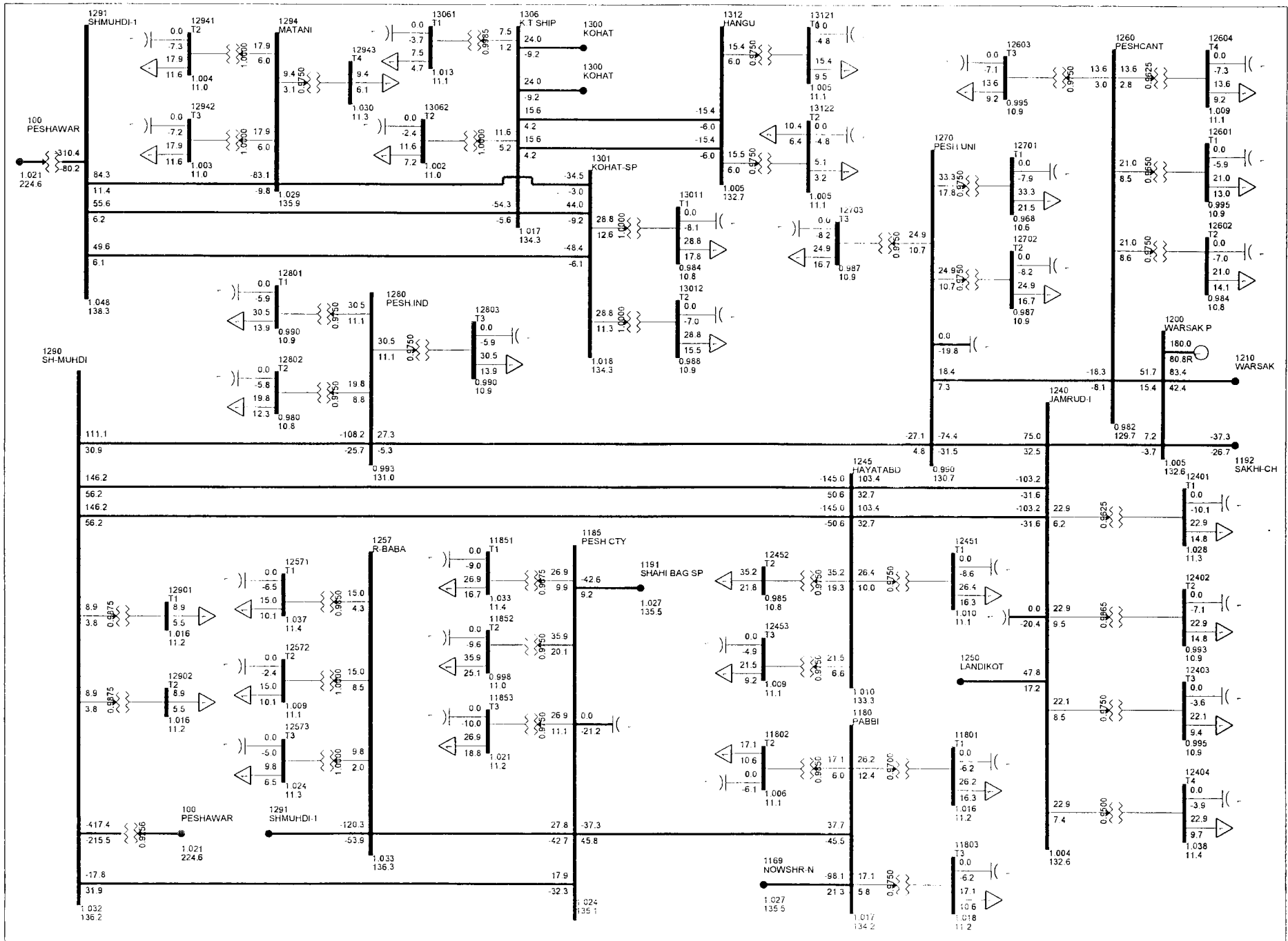


Exhibit-1-2016-1.4



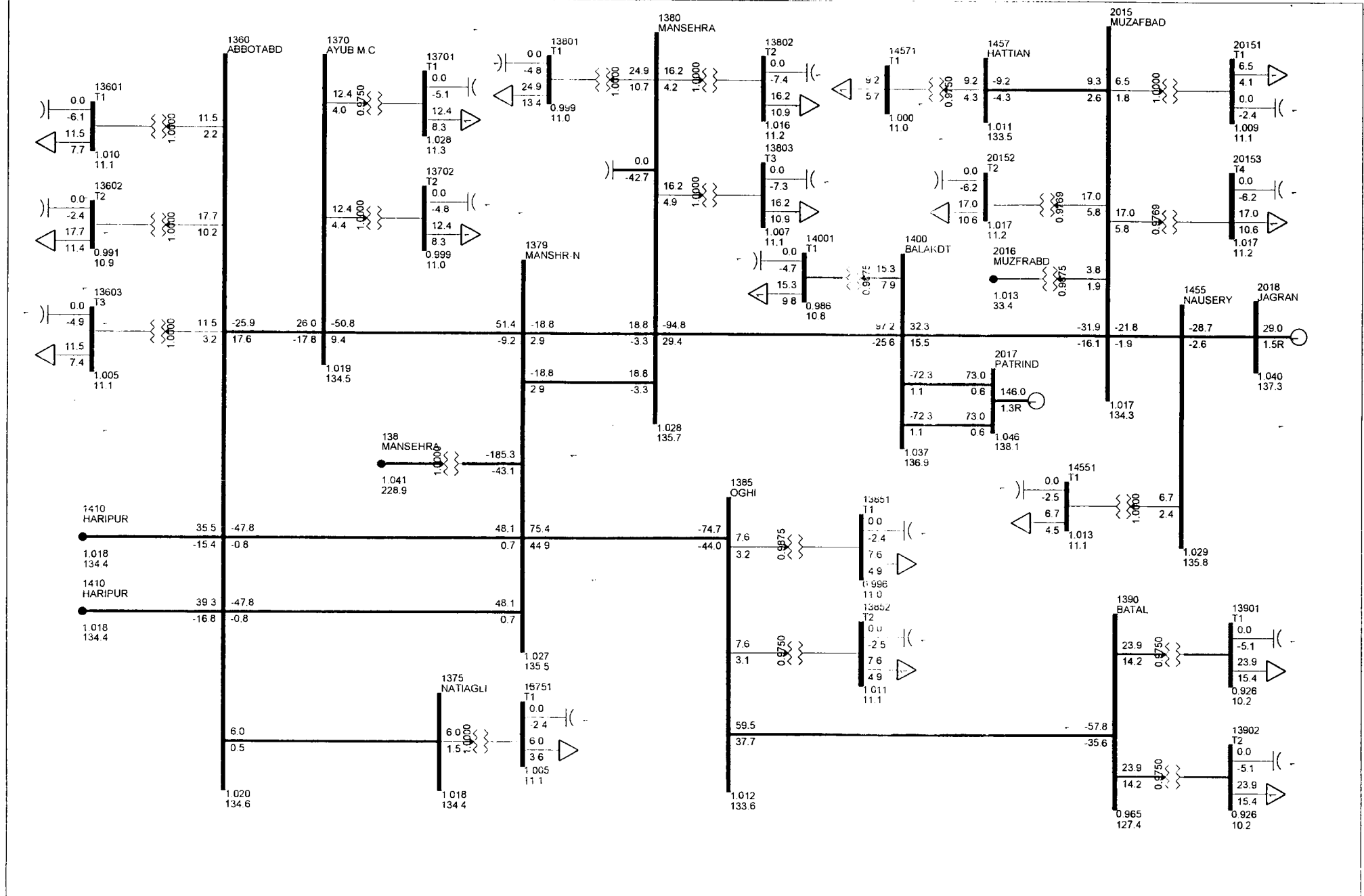
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE

Exhibit-1-2016-1.5



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE

Exhibit-1-2016-1.6



PESCO LOAD FLOW STUDY FOR TRANCHE-III YEAR 2016: BASE CASE

Exhibit-1-2016-1.7

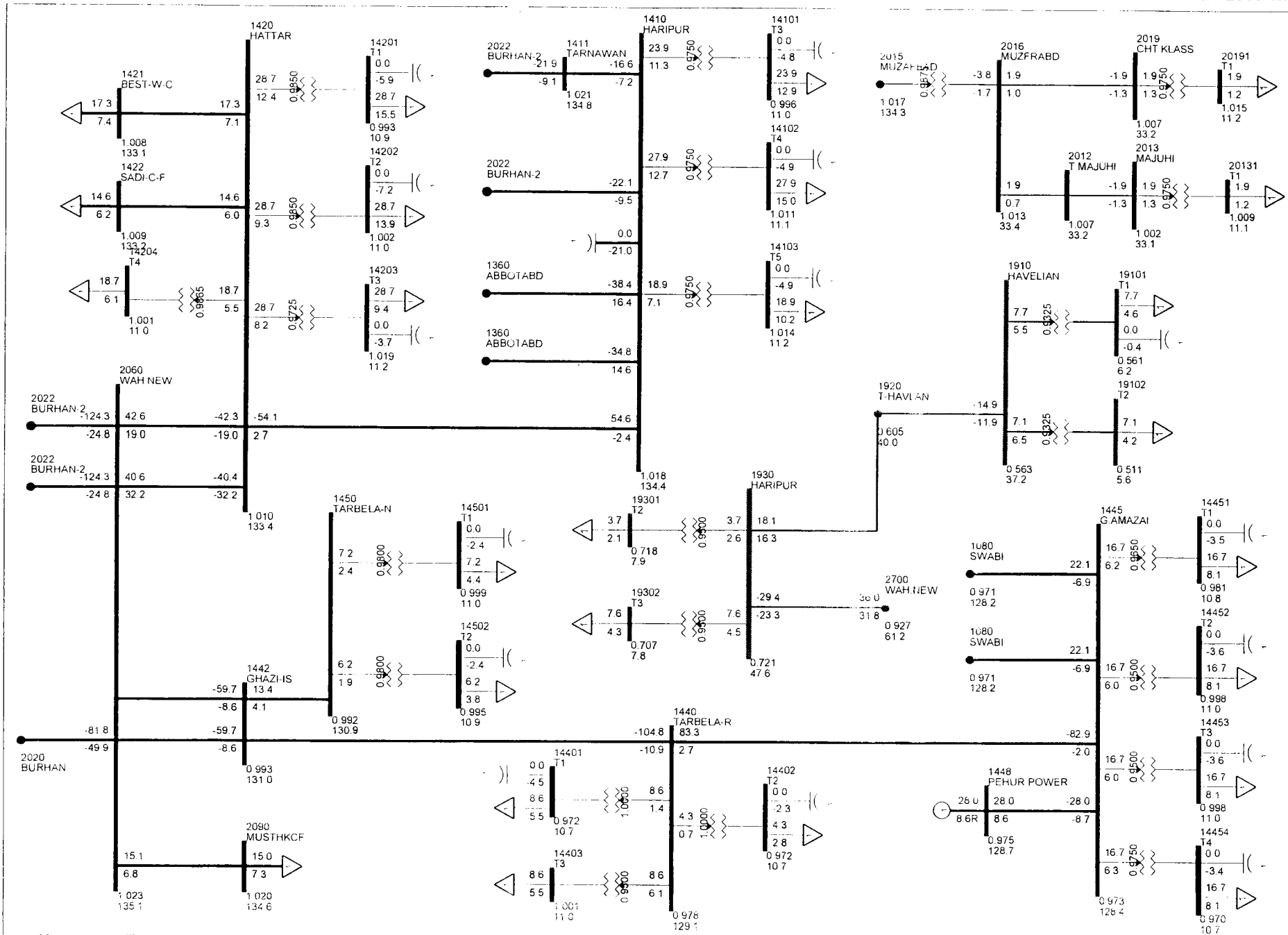
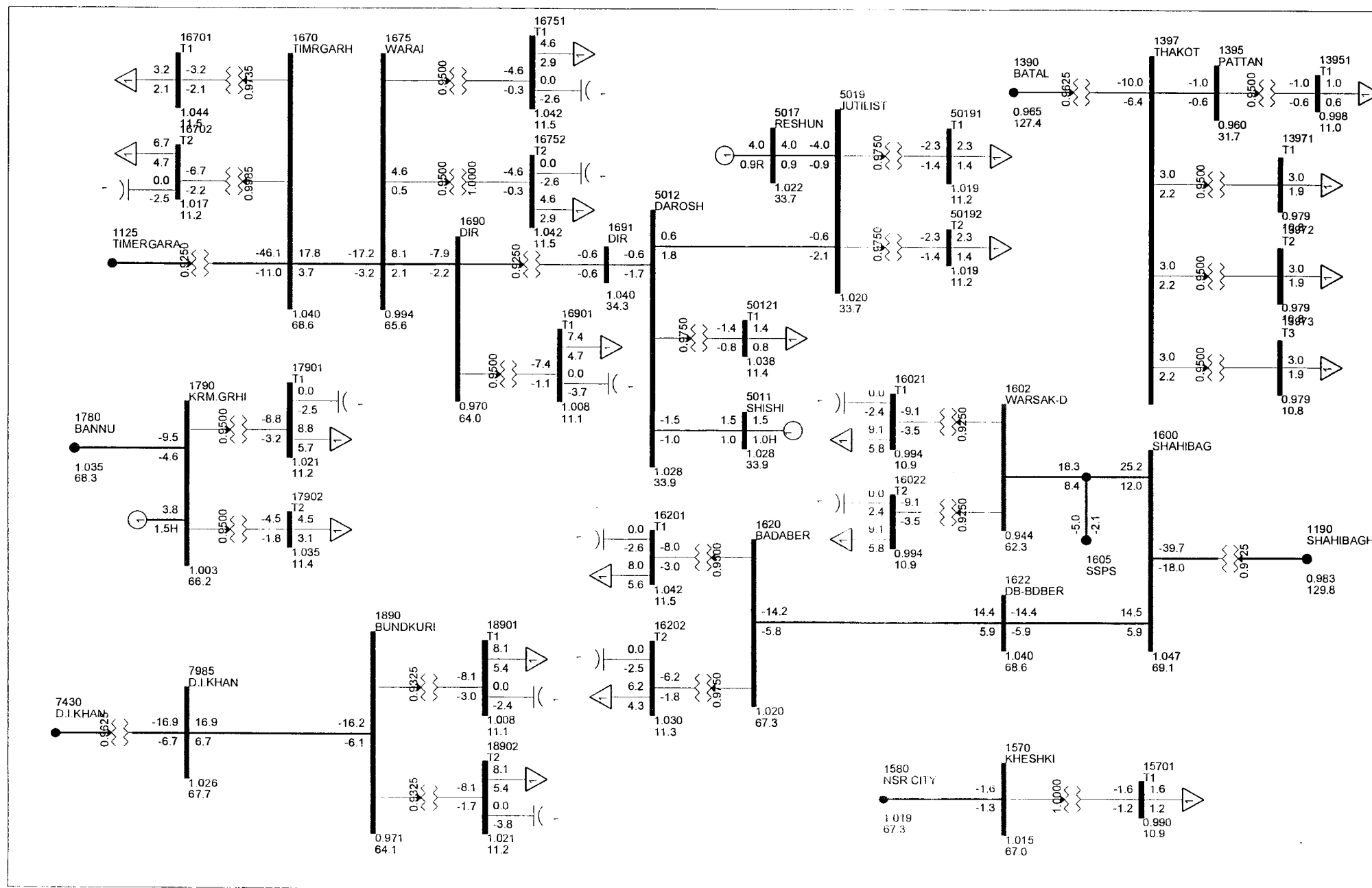


Exhibit-1-2016-1.8



PESCO IGTD 2016 losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 12:23

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

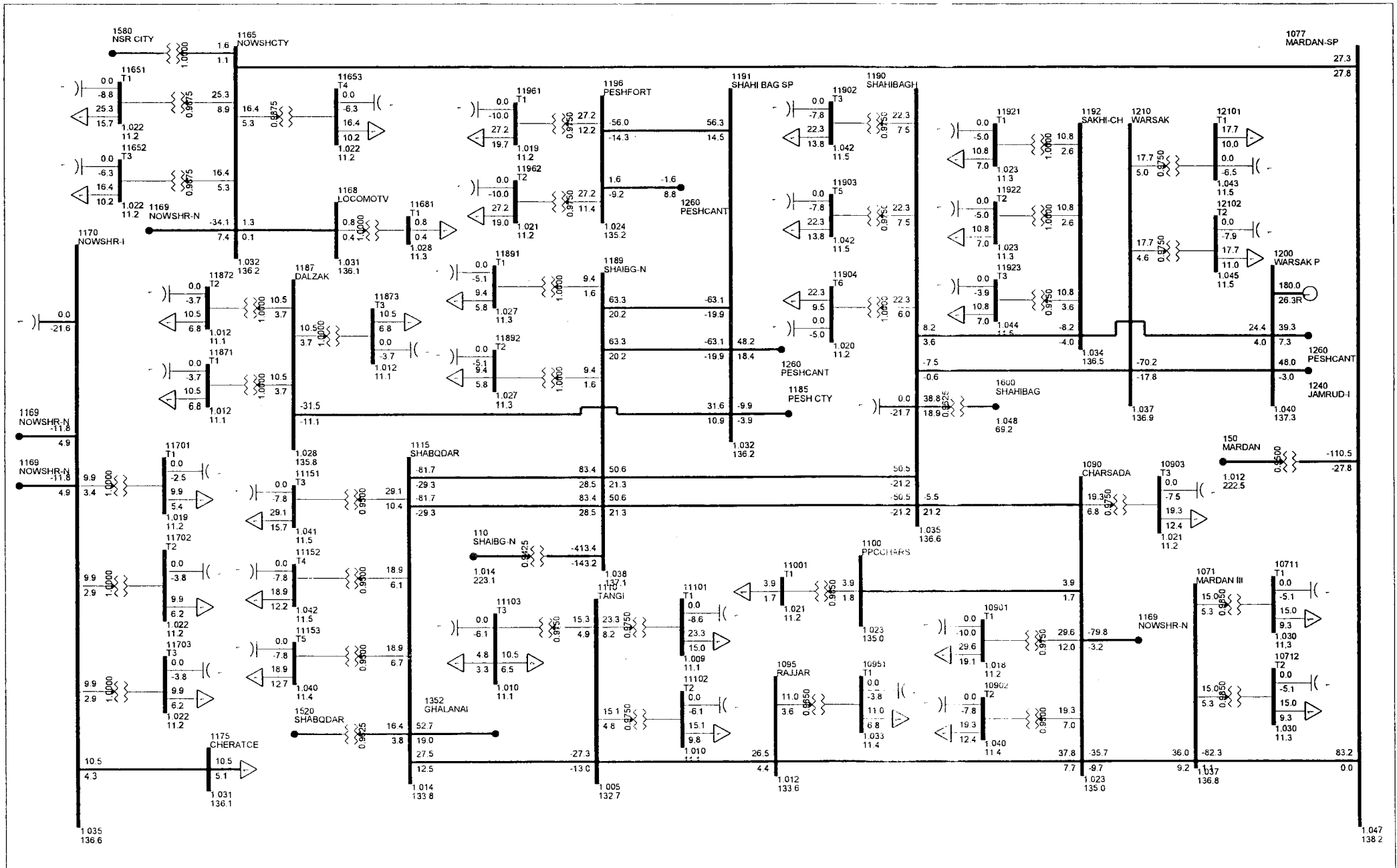
YEAR 2016: BASE CASE

IN MW/MVAR

INTERCHANGE-		FROM	TO	LOAD	TO		-NET		
TO TIES	DESIRED	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA + LOADS	--X NET INT	RATION	TO AREA	SHUNT	DEVICES	SHUNT CHARGING	LOSSES	LINES	
1 -2420.8	722.3 0.0	3038.2	0.0	0.0	0.0	0.0	104.9	-2542.3	
PESCO -369.2	123.7	1843.3	-1405.7	0.0	0.0	215.8	771.0	-941.5	
COLUMN -2420.8	722.3 0.0	3038.2	0.0	0.0	0.0	0.0	104.9	-2542.3	
TOTALS -869.2	123.7	1843.3	-1405.7	0.0	0.0	215.8	771.0	-941.5	

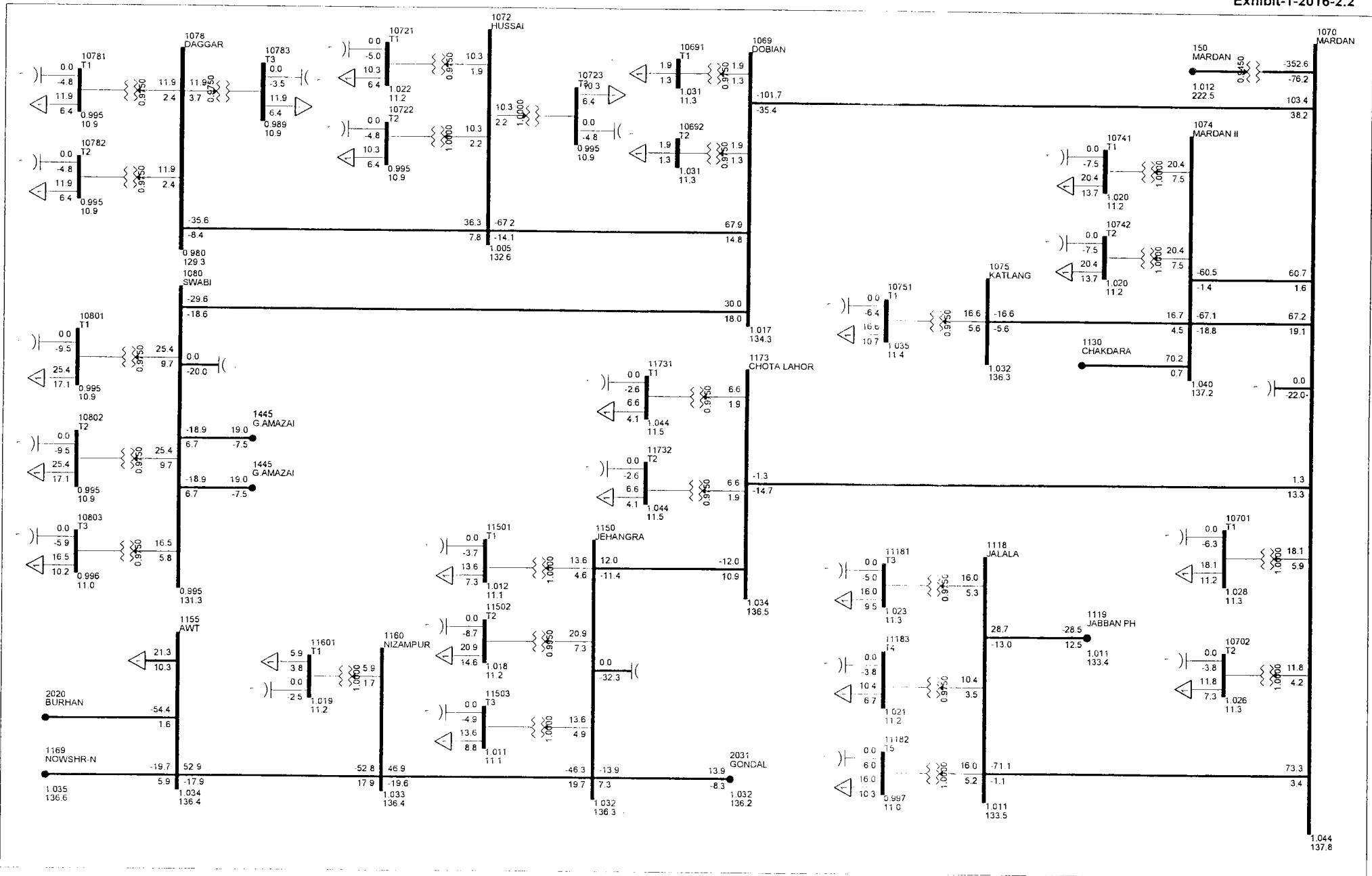
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE WITH REINFORCEMENT

Exhibit-1-2016-2.1



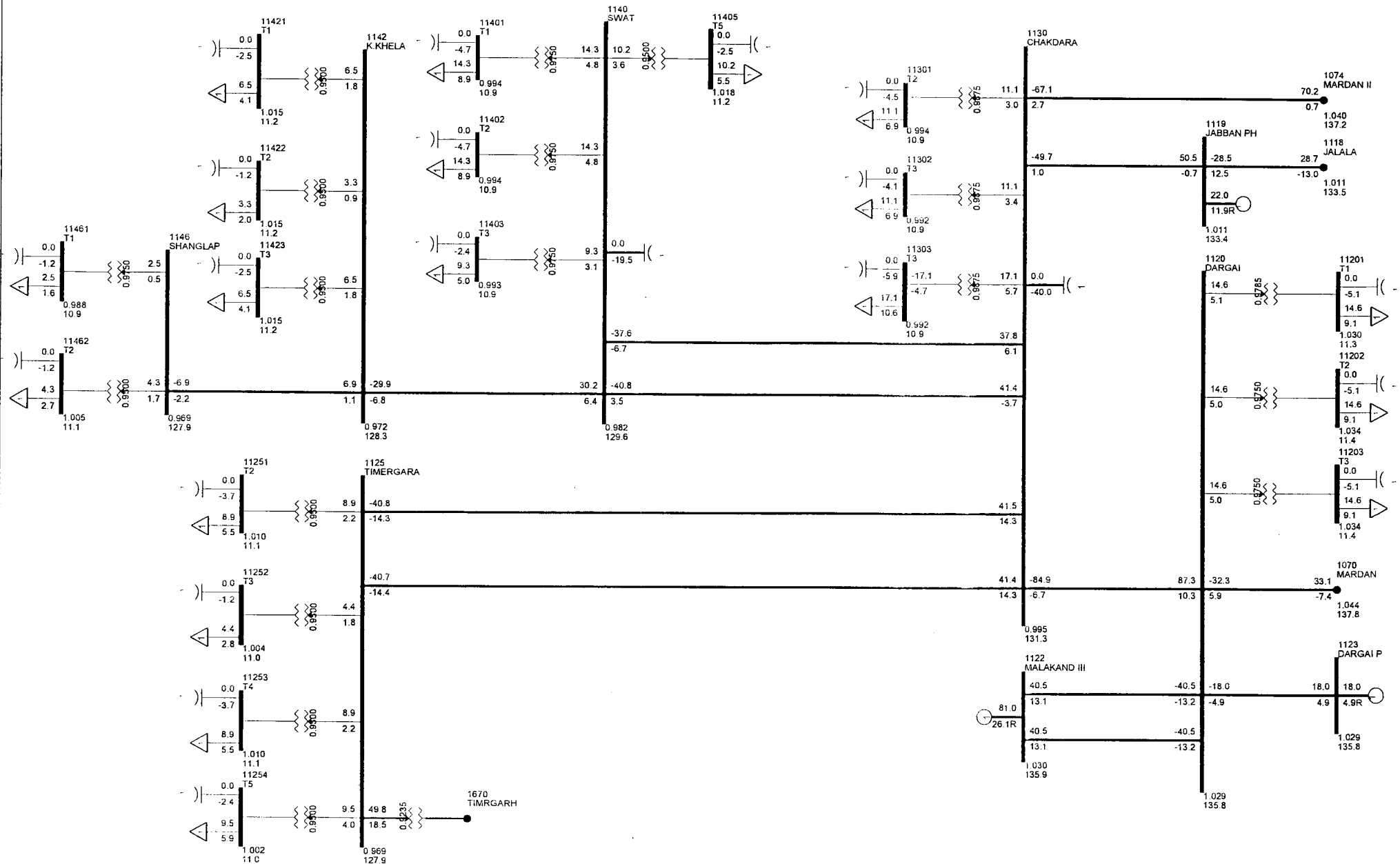
**PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN
YEAR 2016: BASE CASE WITH REINFORCEMENT**

Exhibit-1-2016-2.2



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE WITH REINFORCEMENT

Exhibit-1-2016-2.3



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE WITH REINFORCEMENT

Exhibit-1-2016-2.4

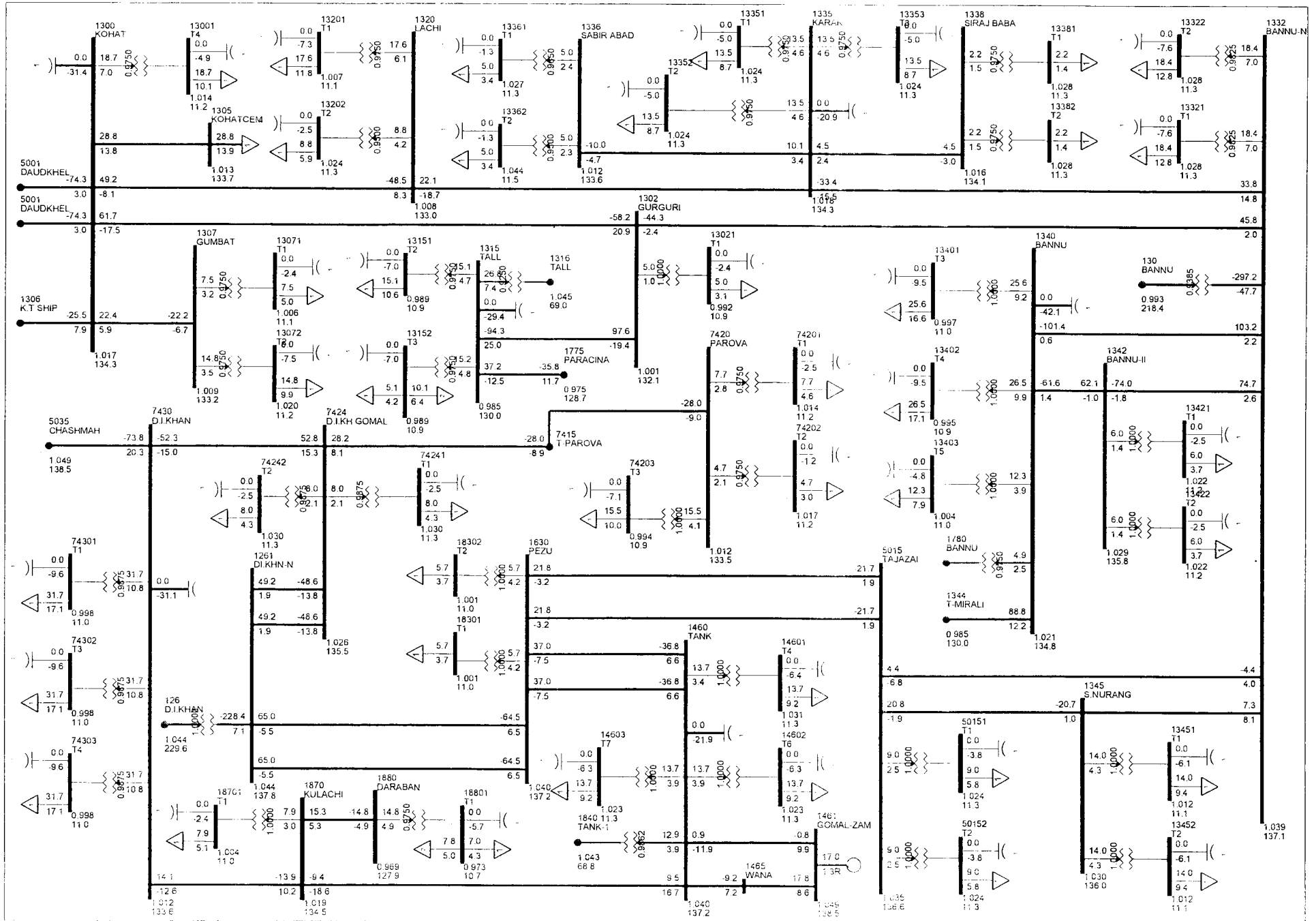
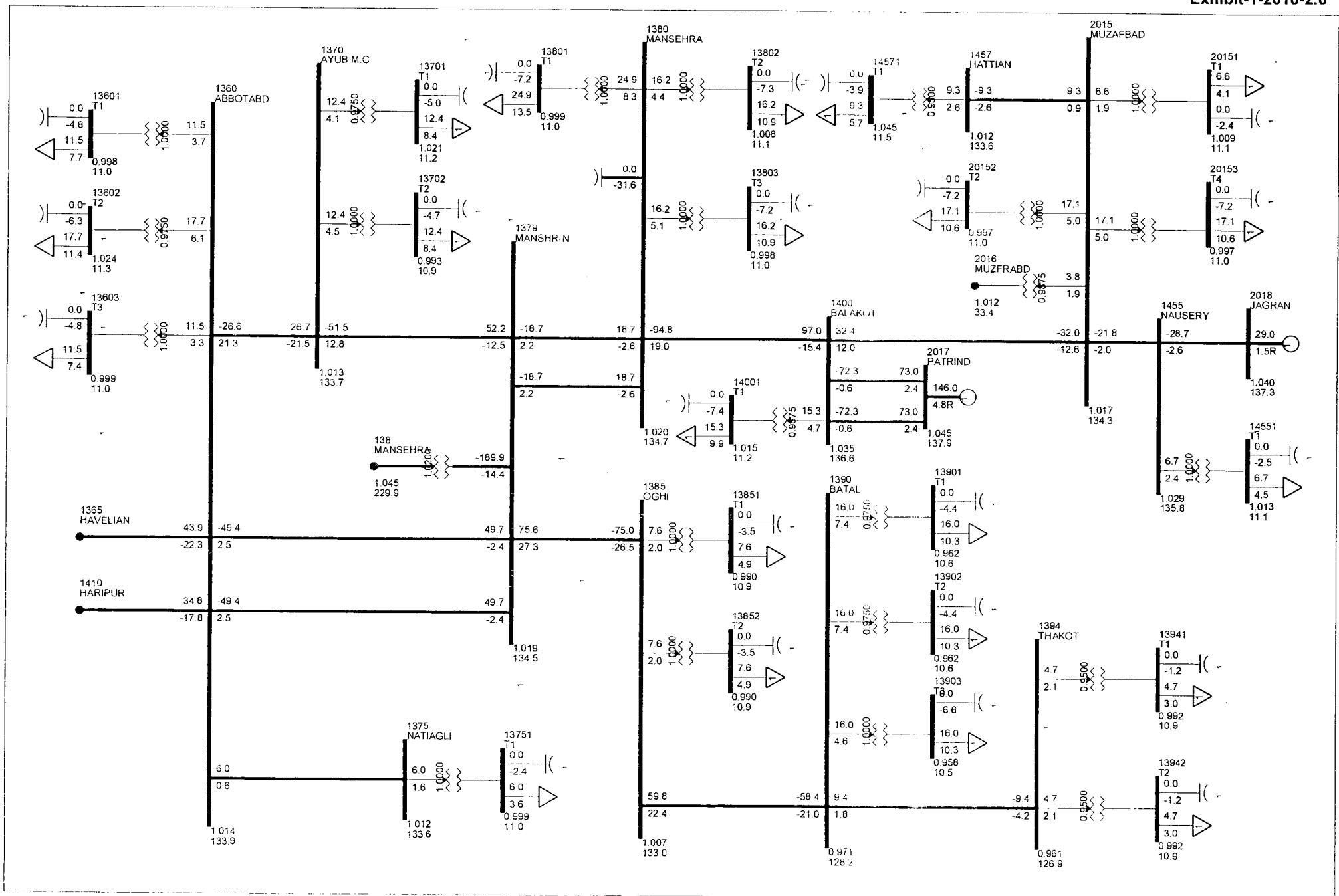
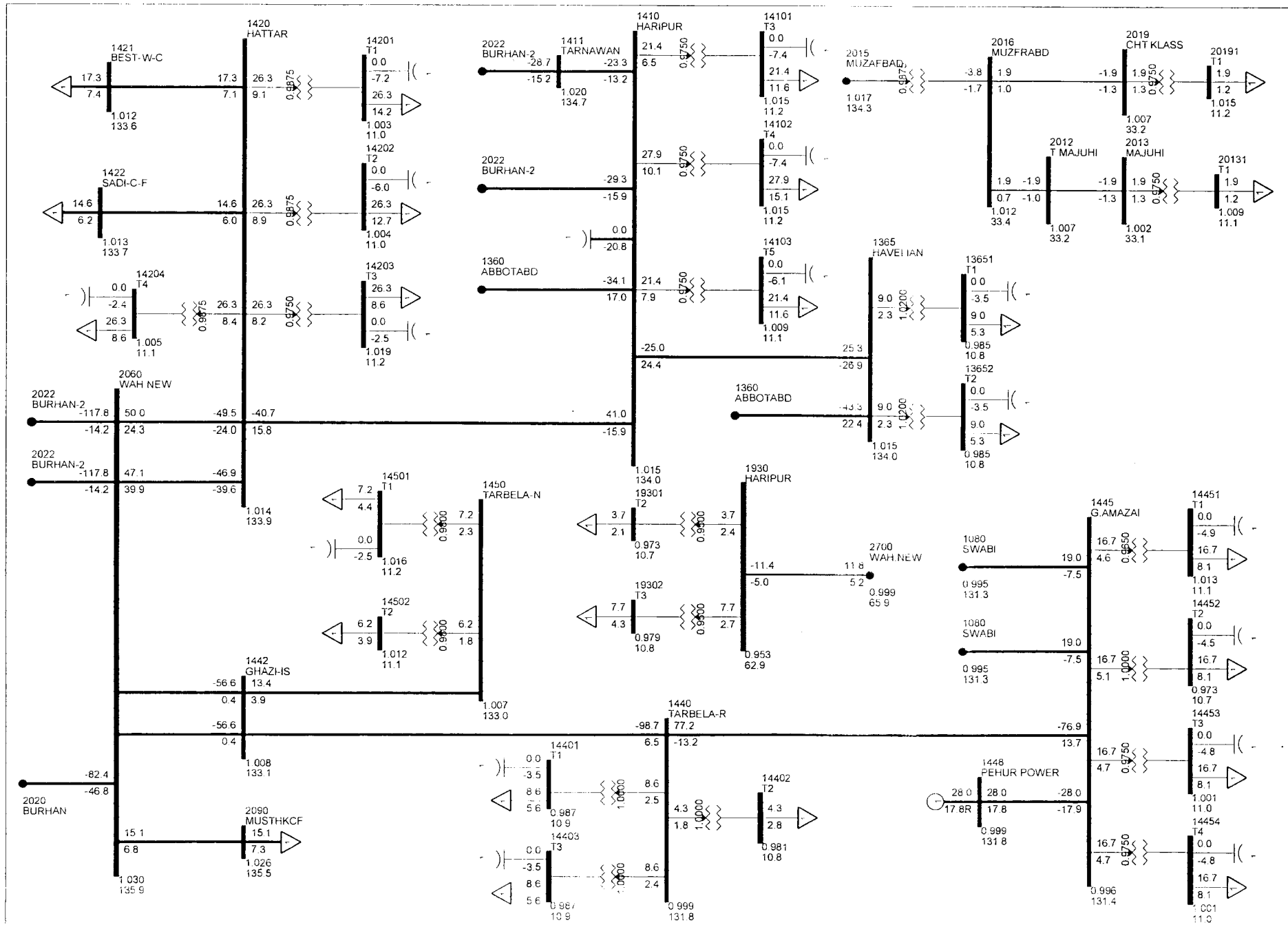


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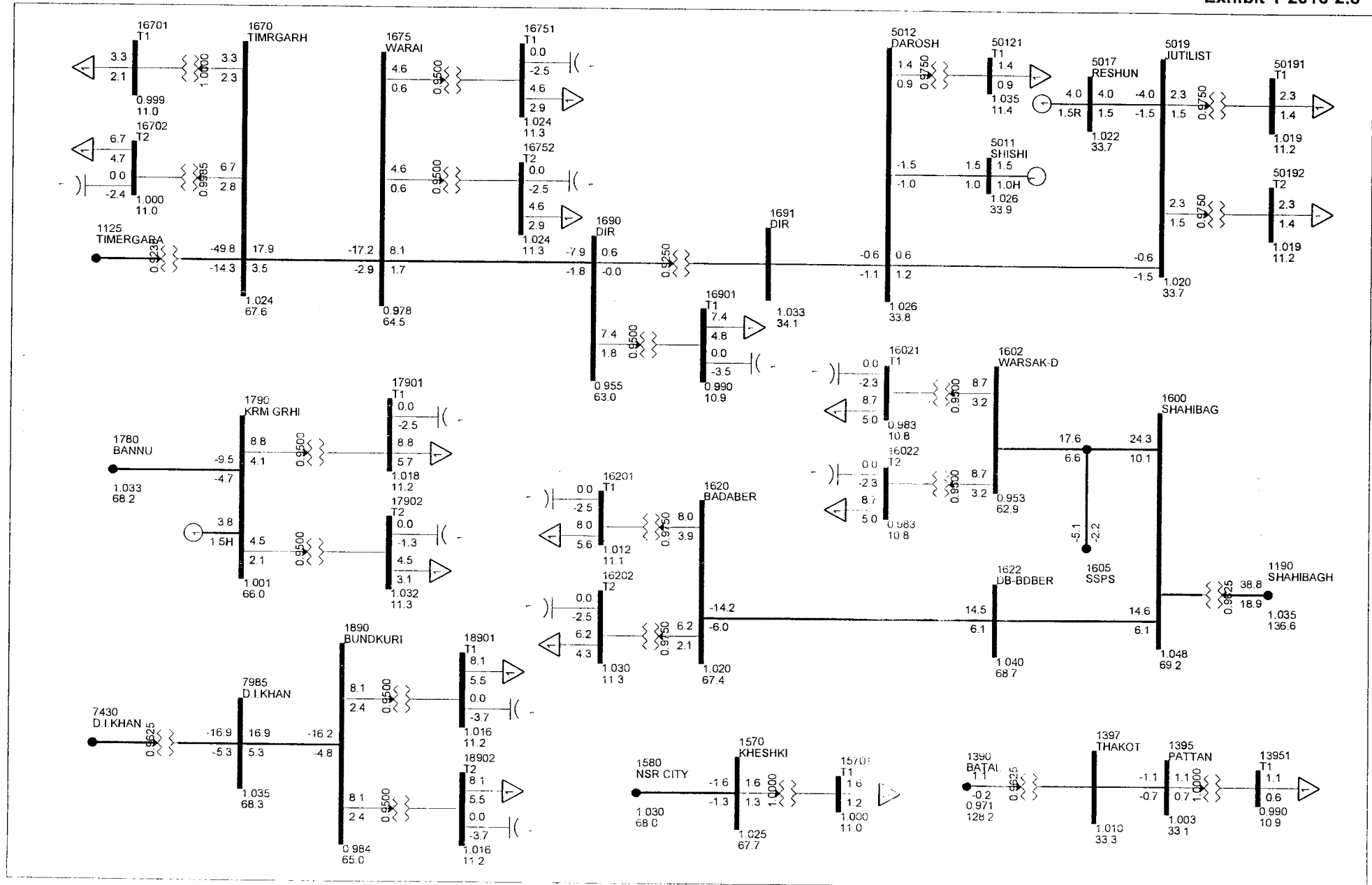
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE WITH REINFORCEMENT

Exhibit-1-2016-2.7



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2016: BASE CASE WITH REINFORCEMENT

Exhibit-1-2016-2.8



PESCO IGTD 2016 with R Losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 11:04

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

YEAR 2016: BASE CASE WITH REINFORCEMENT

IN MW/MVAR

INTERCHANGE-	FROM	TO	LOAD	TO					-NET
TO TIES	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE	
X-- AREA + LOADS	--X NET INT	RATION TO AREA	SHUNT	DEVICES	SHUNT CHARGING	LOSSES	LINES		
1 -2432.0	722.3 0.0	3069.2	0.0	0.0	0.0	0.0	85.1	-2555.3	
PESCO -673.8	106.1	1855.4	-1545.7	0.0	0.0	226.8	697.0	-746.1	
COLUMN -2432.0	722.3 0.0	3069.2	0.0	0.0	0.0	0.0	85.1	-2555.3	
TOTALS -673.8	106.1	1855.4	-1545.7	0.0	0.0	226.8	697.0	-746.1	

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE WITH REINFORCEMENT

Exhibit-1-2017-2.1

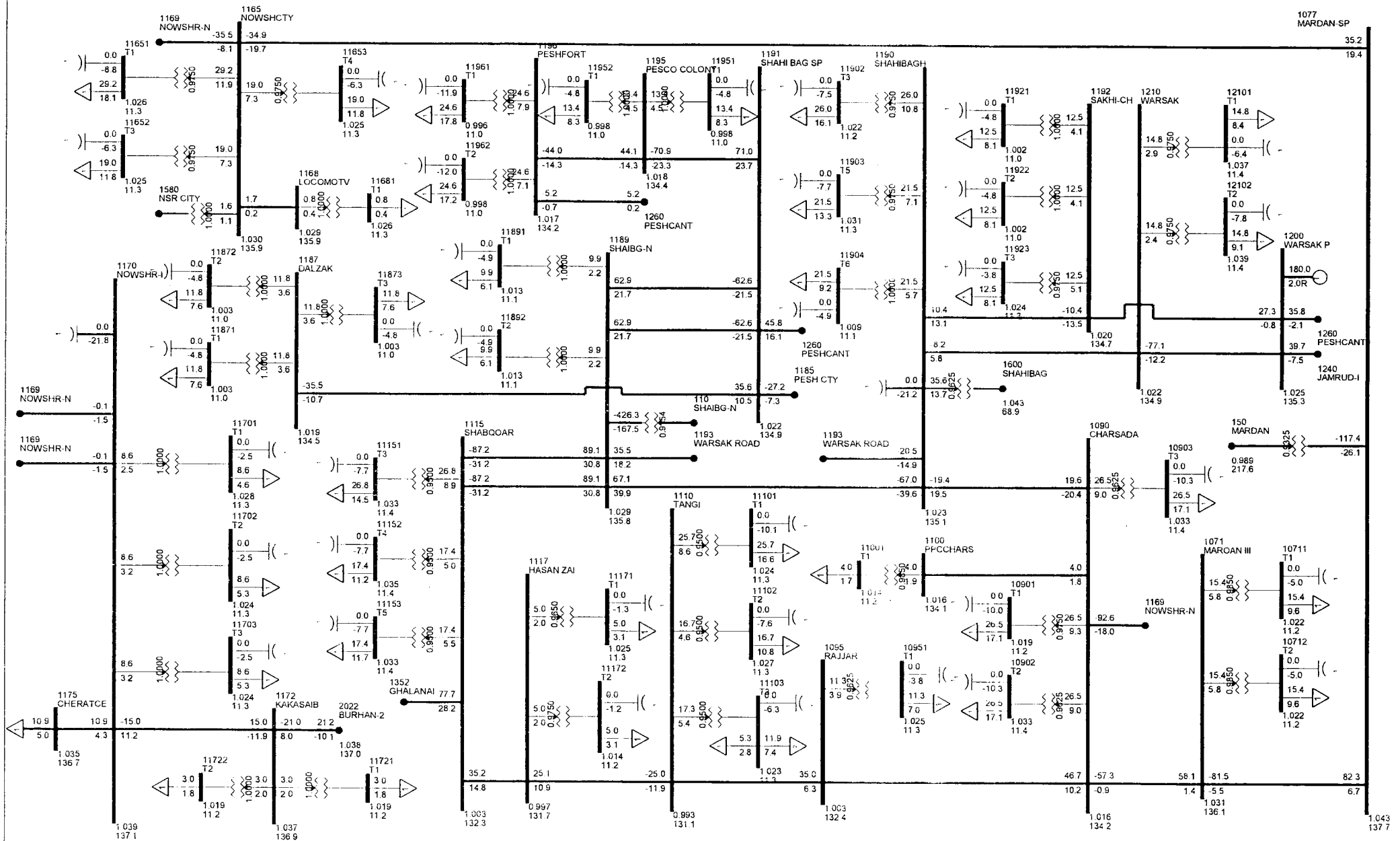


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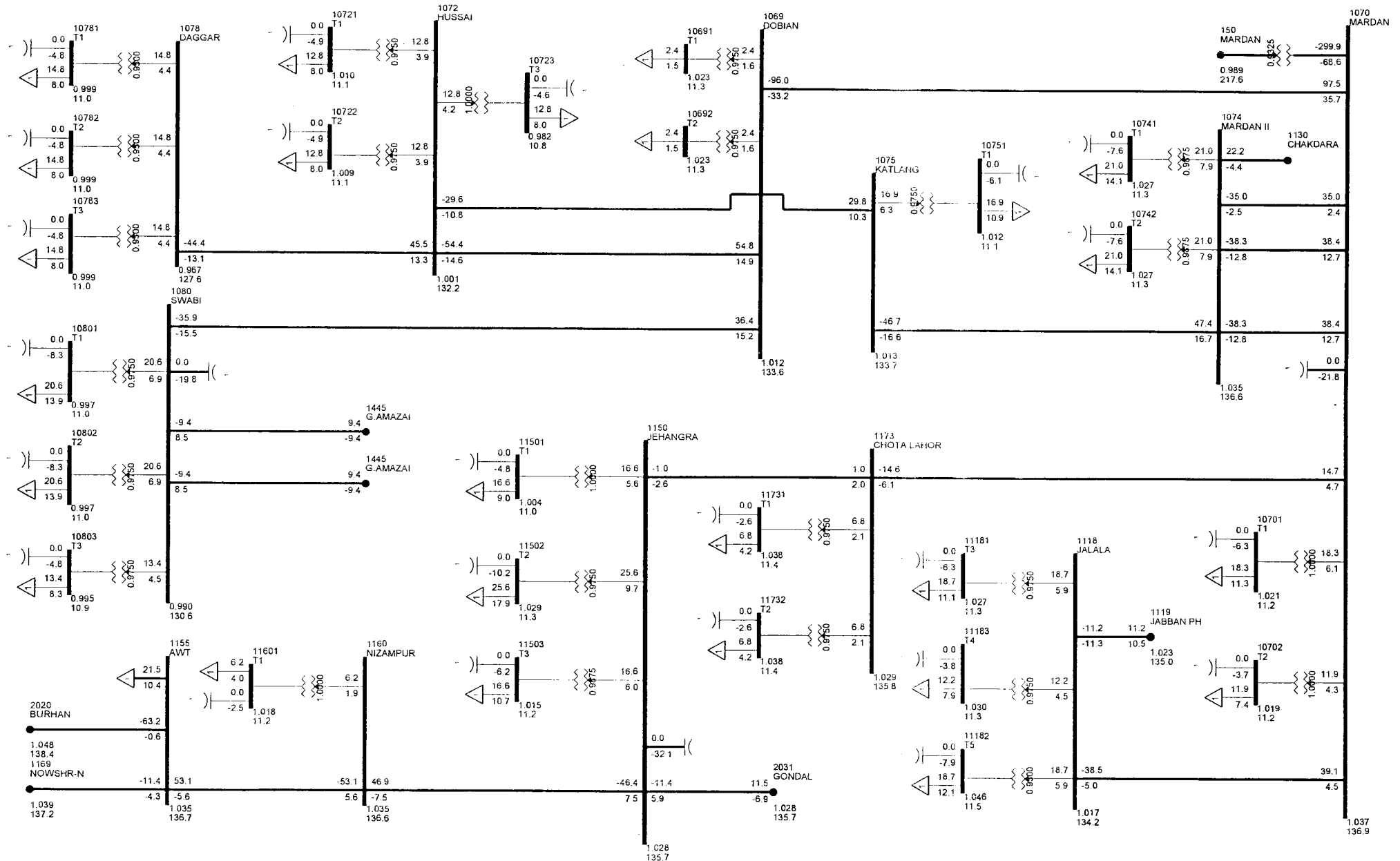
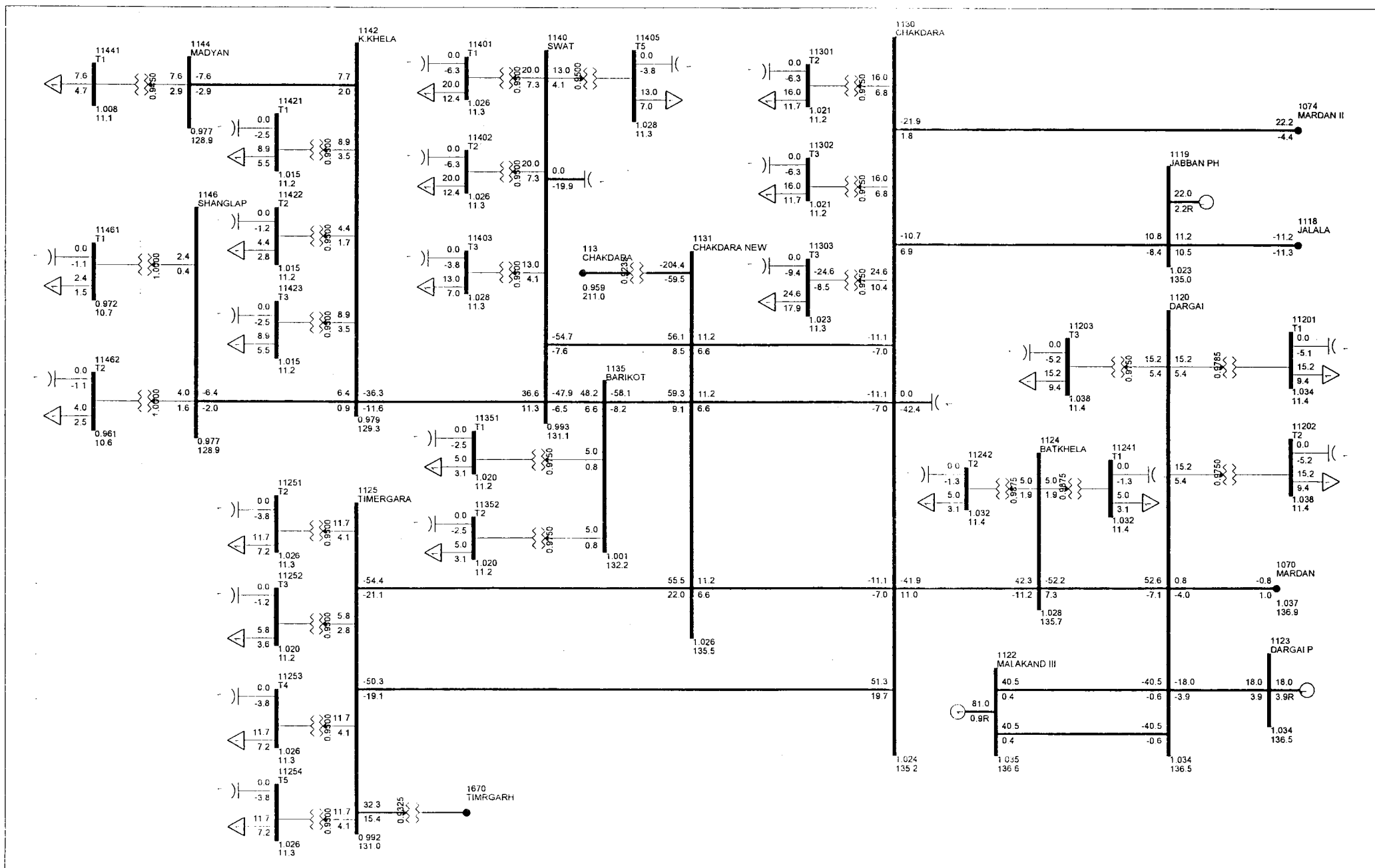
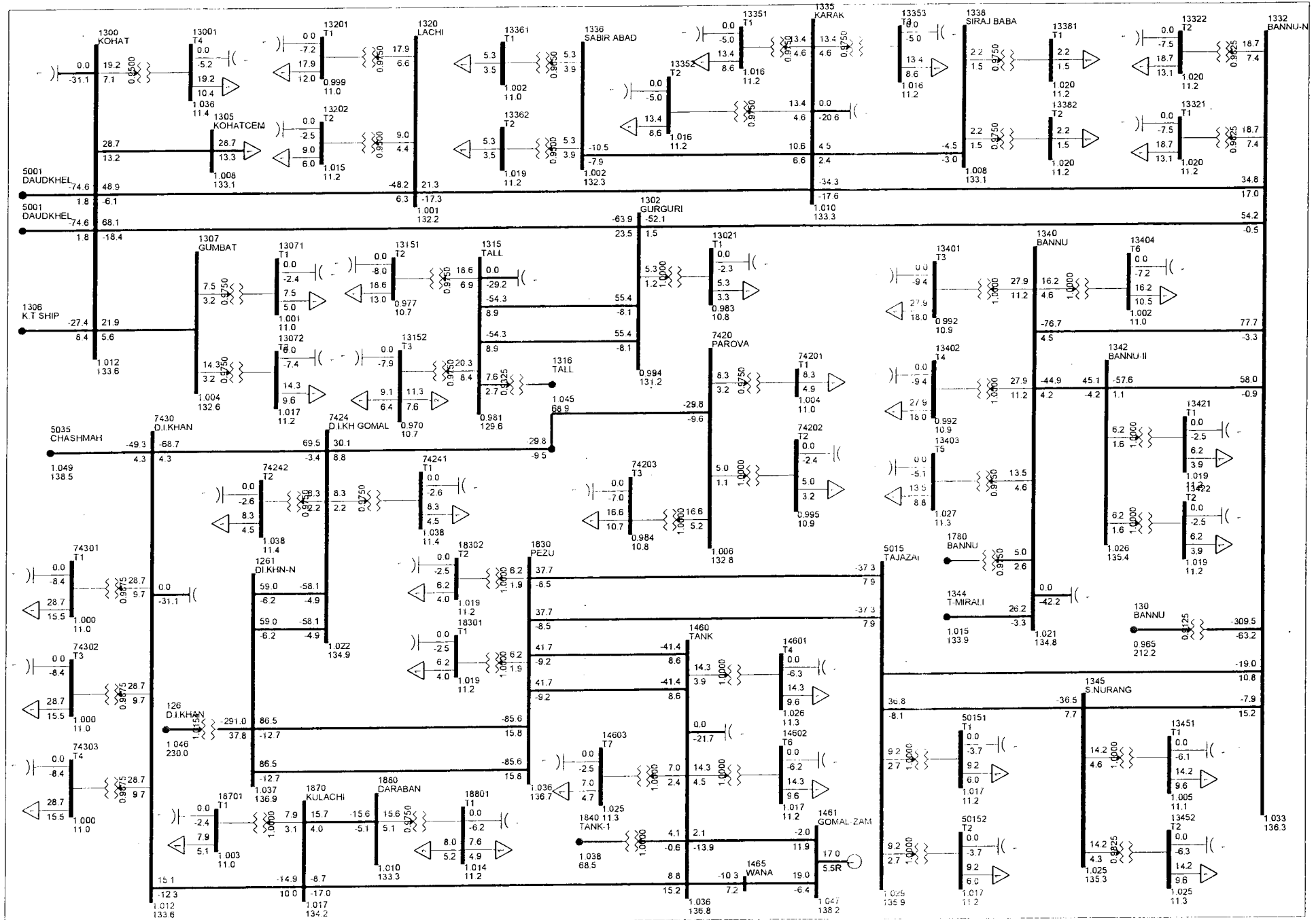


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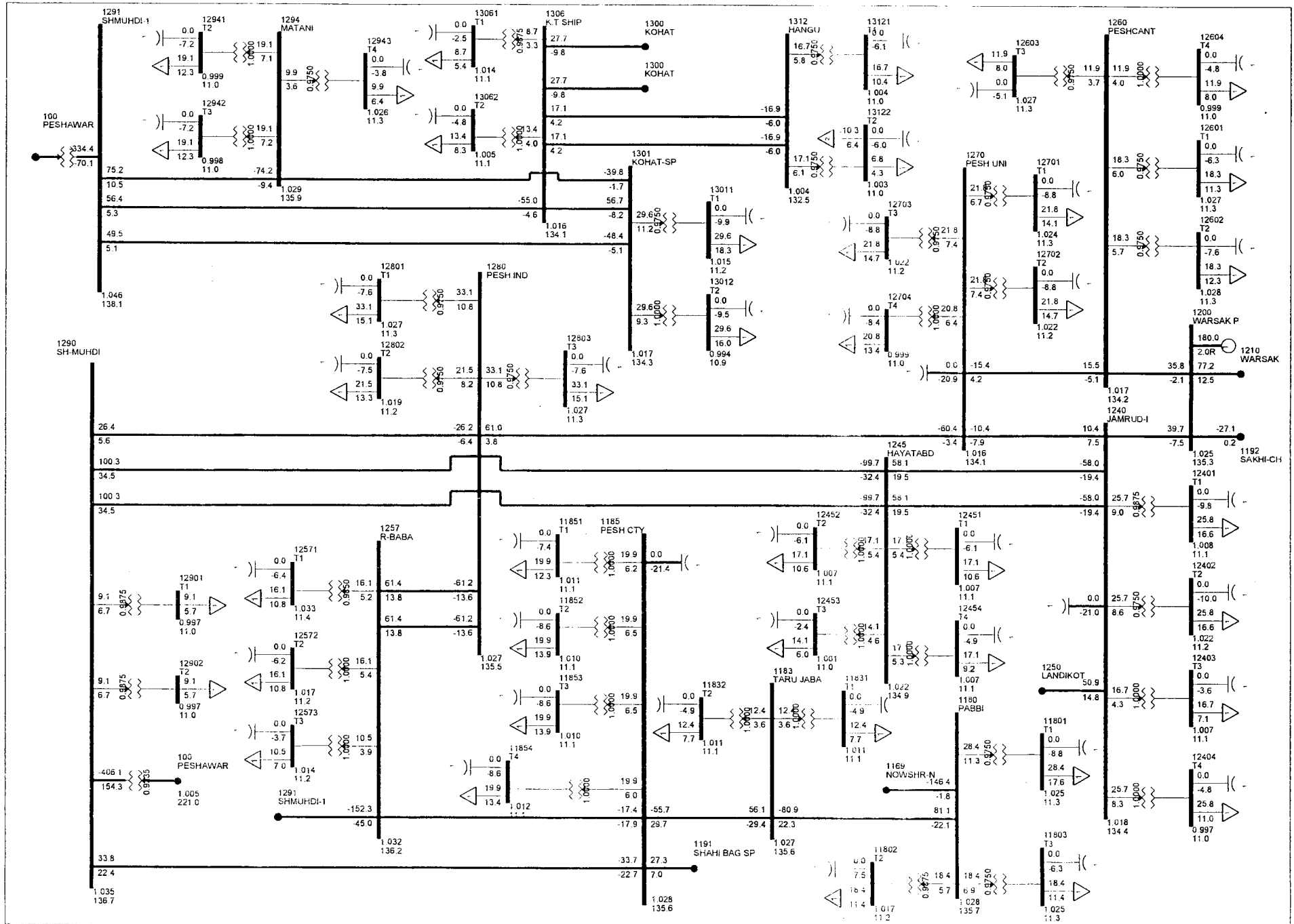
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE WITH REINFORCEMENT

Exhibit-1-2017-2.4



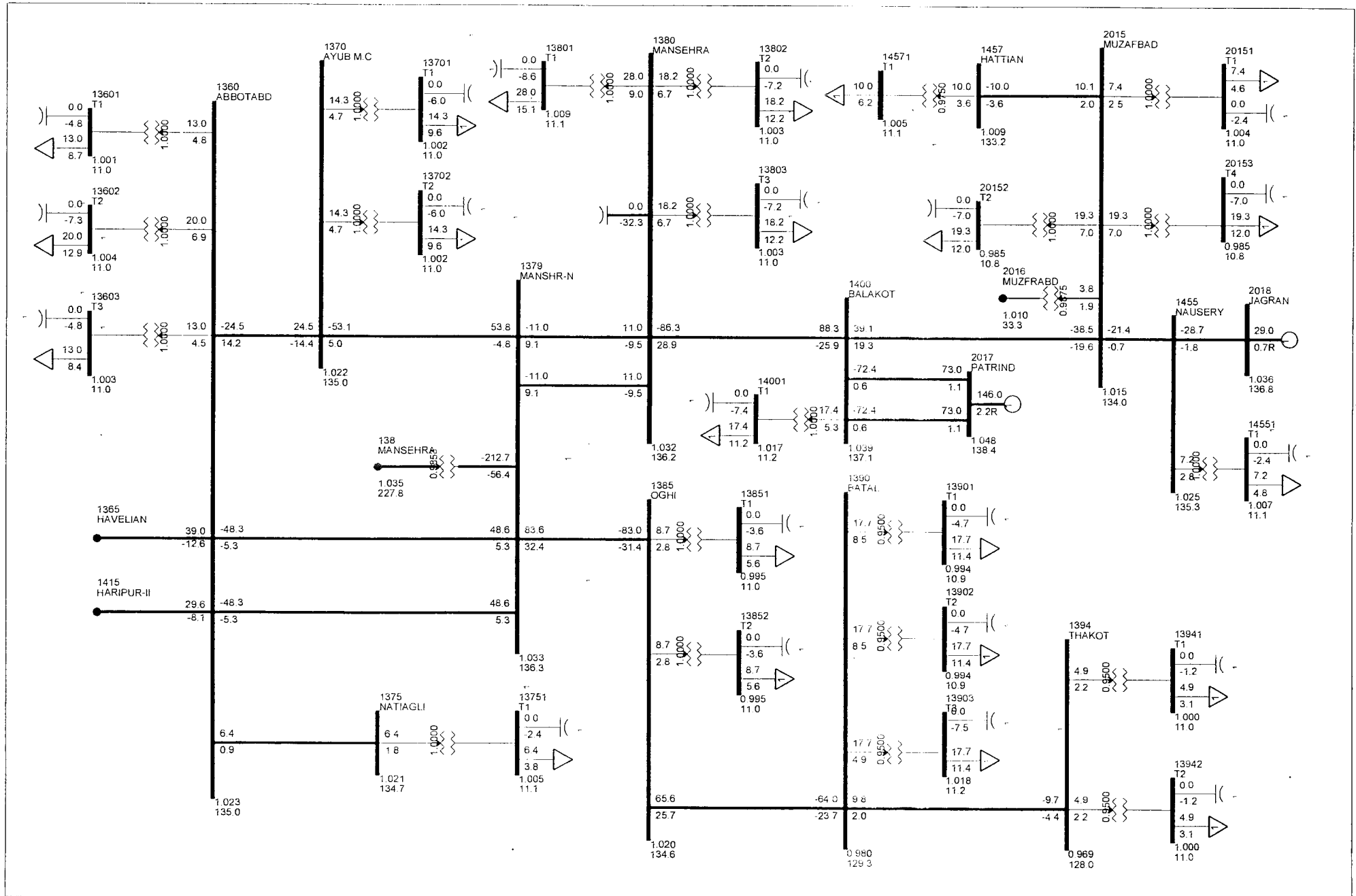
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE WITH REINFORCEMENT

Exhibit-1-2017-2.5



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE WITH REINFORCEMENT

Exhibit-1-2017-2.6



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE WITH REINFORCEMENT

Exhibit-1-2017-2.7

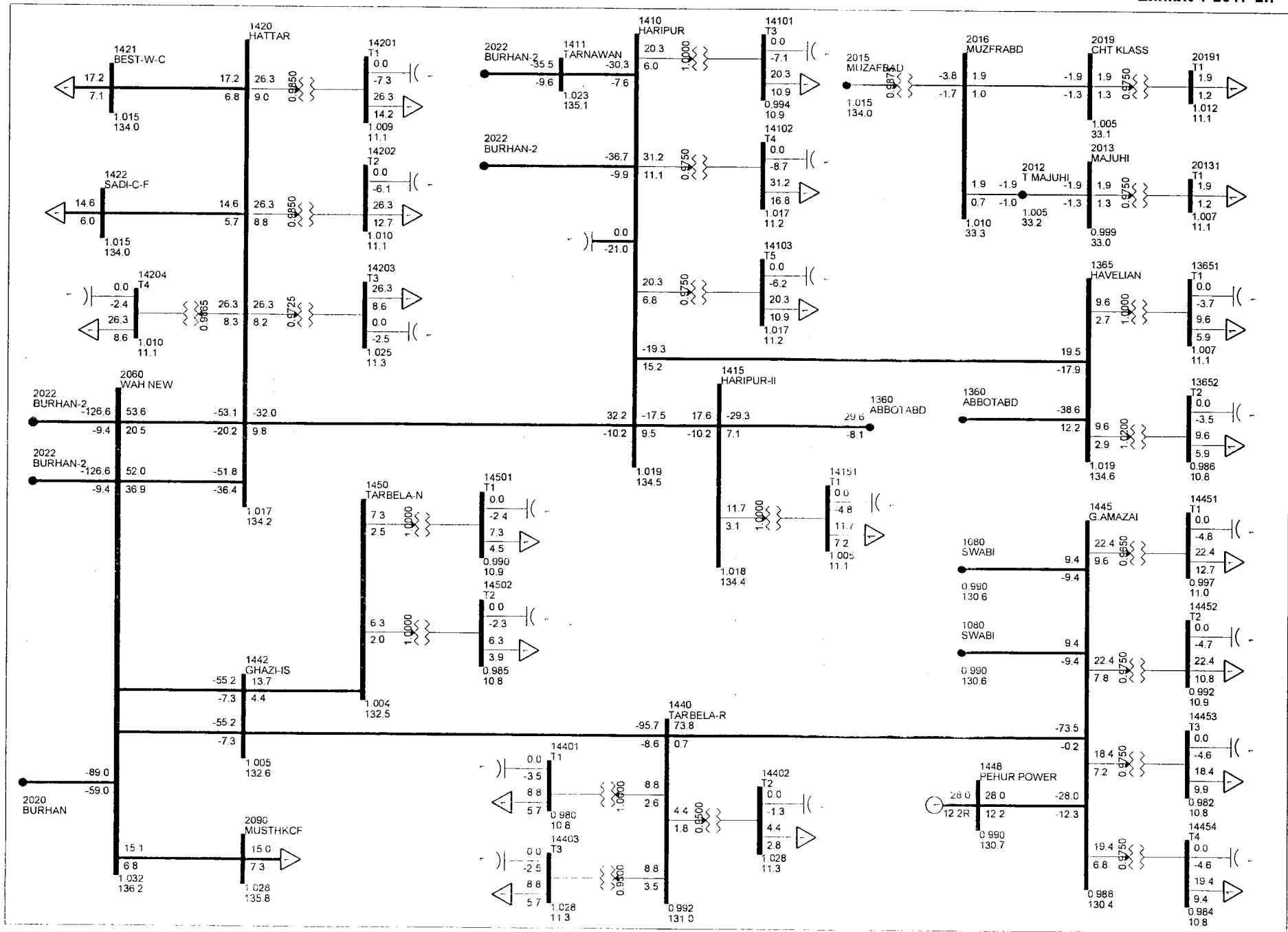
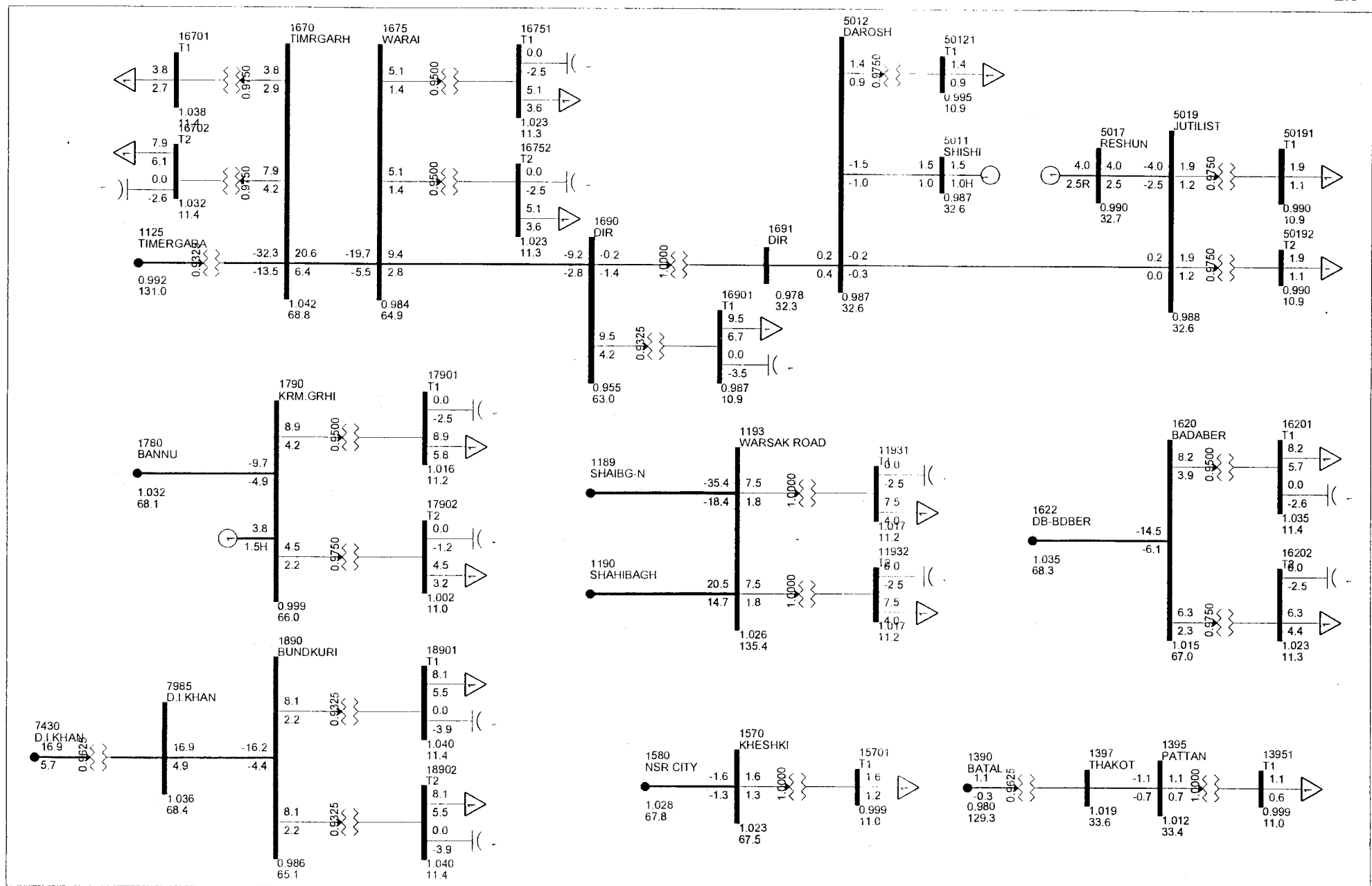


Exhibit-1-2017-2.8



PESCO IGTD 2017 WITH R losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 14:52

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

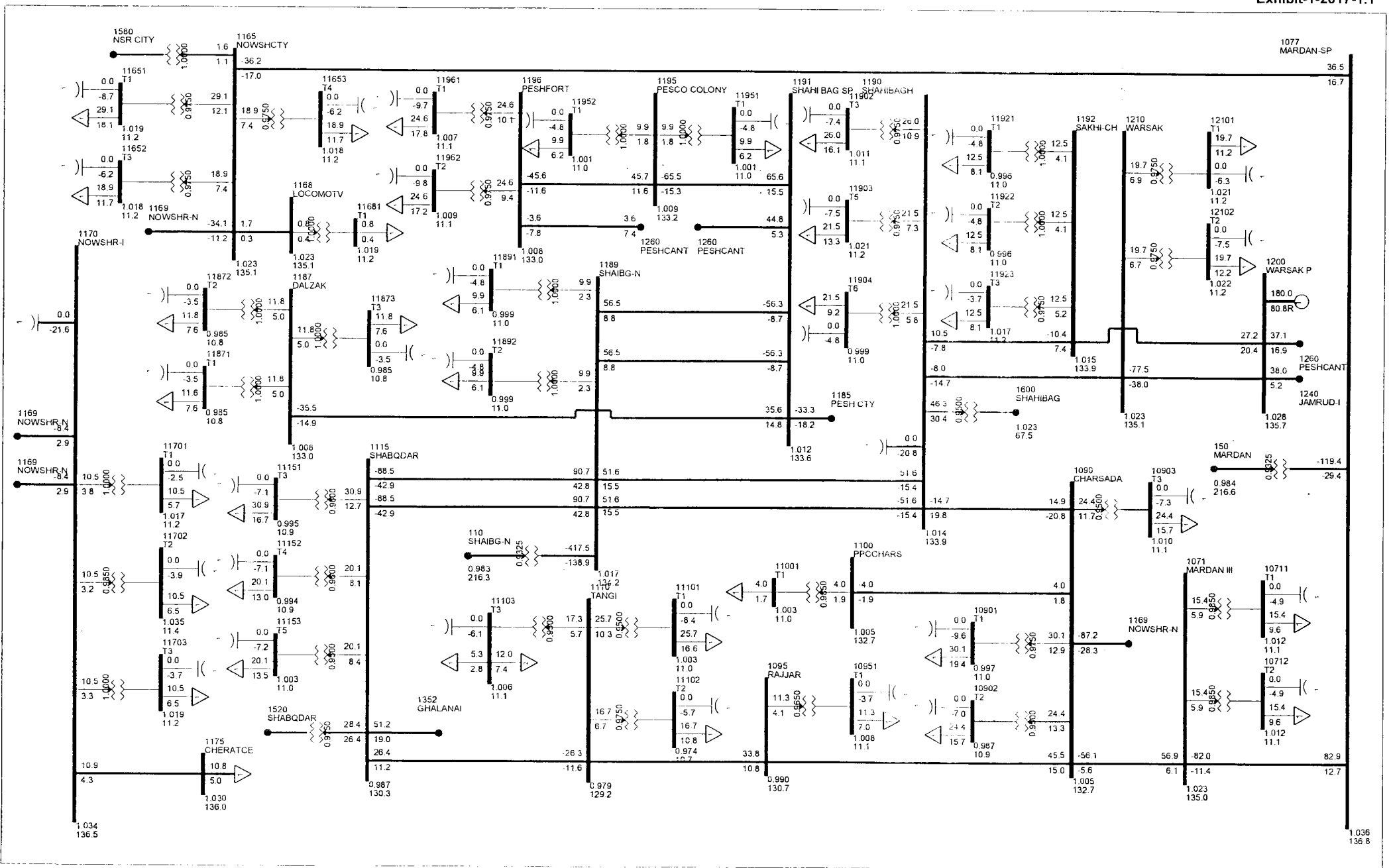
AREA TOTALS

YEAR 2017: BASE CASE WITH REINFORCEMENT

IN MW/MVAR

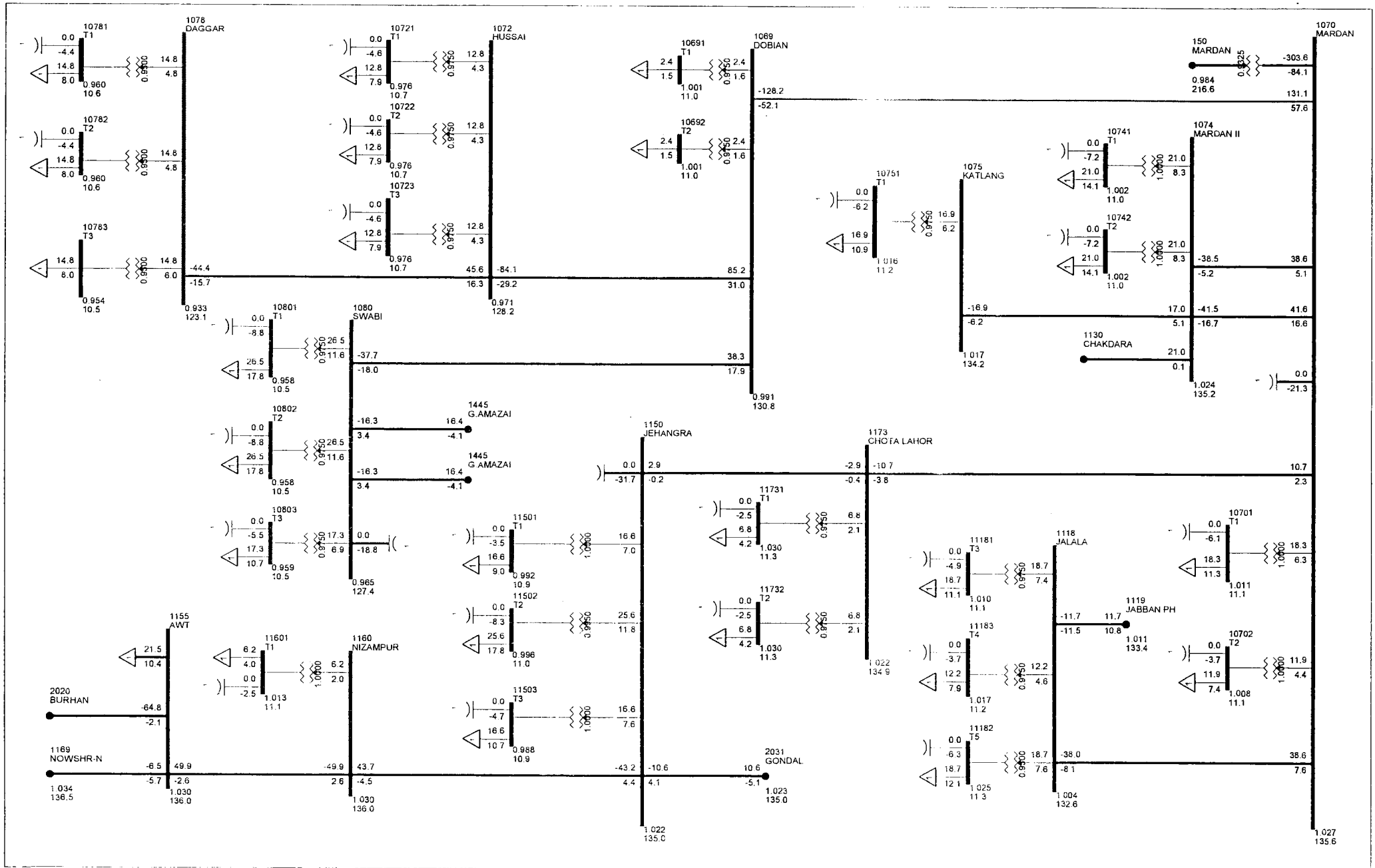
INTERCHANGE-		FROM	TO LOAD	TO					-NET
TO TIES	DESIRED	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA + LOADS	--X NET INT	RATION	TO AREA	SHUNT	DEVICES	SHUNT CHARGING		LOSSES	LINES
1 -2705.3	722.3 0.0	3350.0	0.0	0.0	0.0	0.0	0.0	78.2	-2814.5
PESCO -872.6	42.1	2036.6	-1628.0	0.0	0.0	235.6	741.7	-942.0	
COLUMN -2705.8	722.3 0.0	3350.0	0.0	0.0	0.0	0.0	0.0	78.2	-2814.5
TOTALS -872.6	42.1	2036.6	-1628.0	0.0	0.0	235.6	741.7	-942.0	

Exhibit-1-2017-1.1



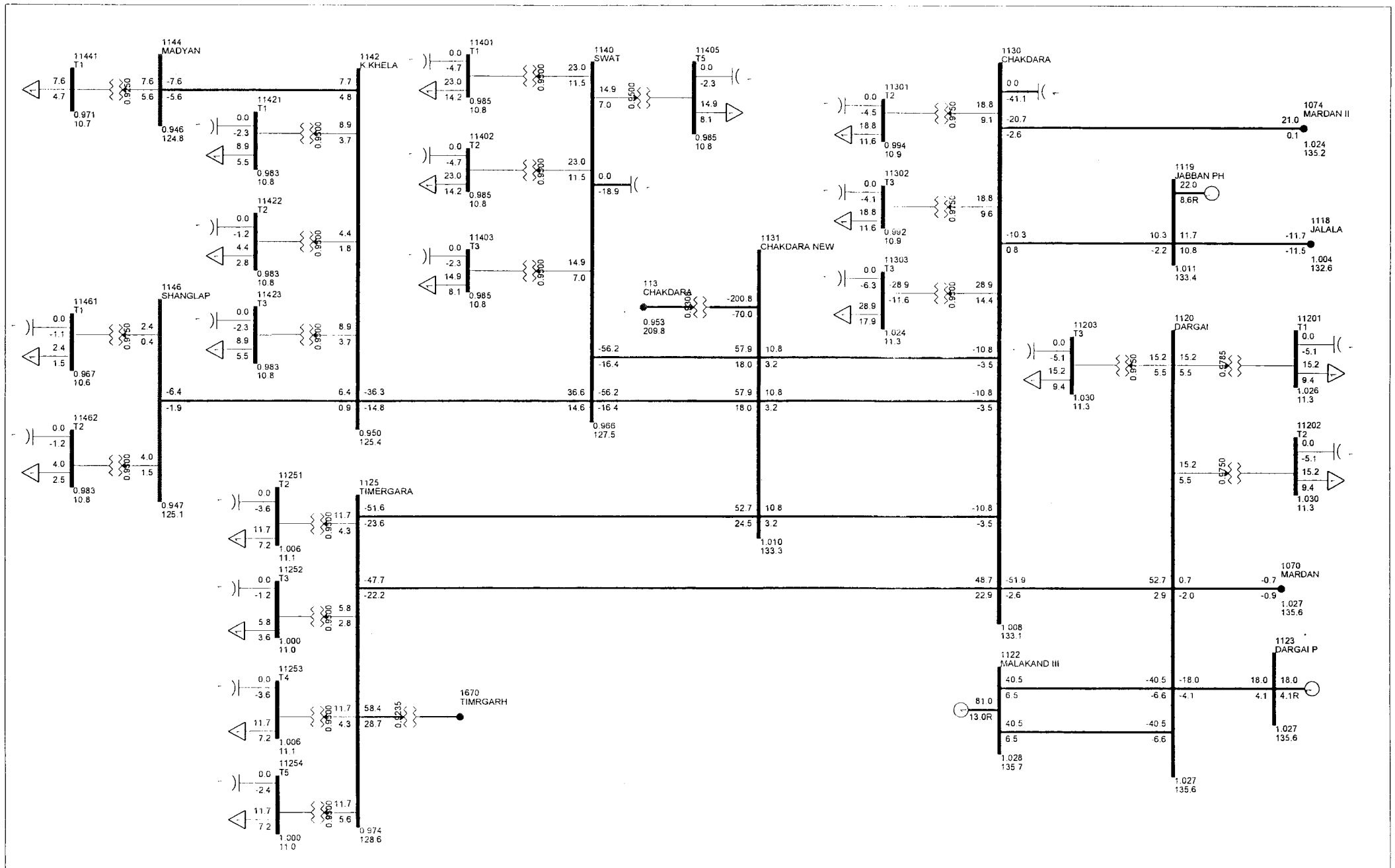
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.2



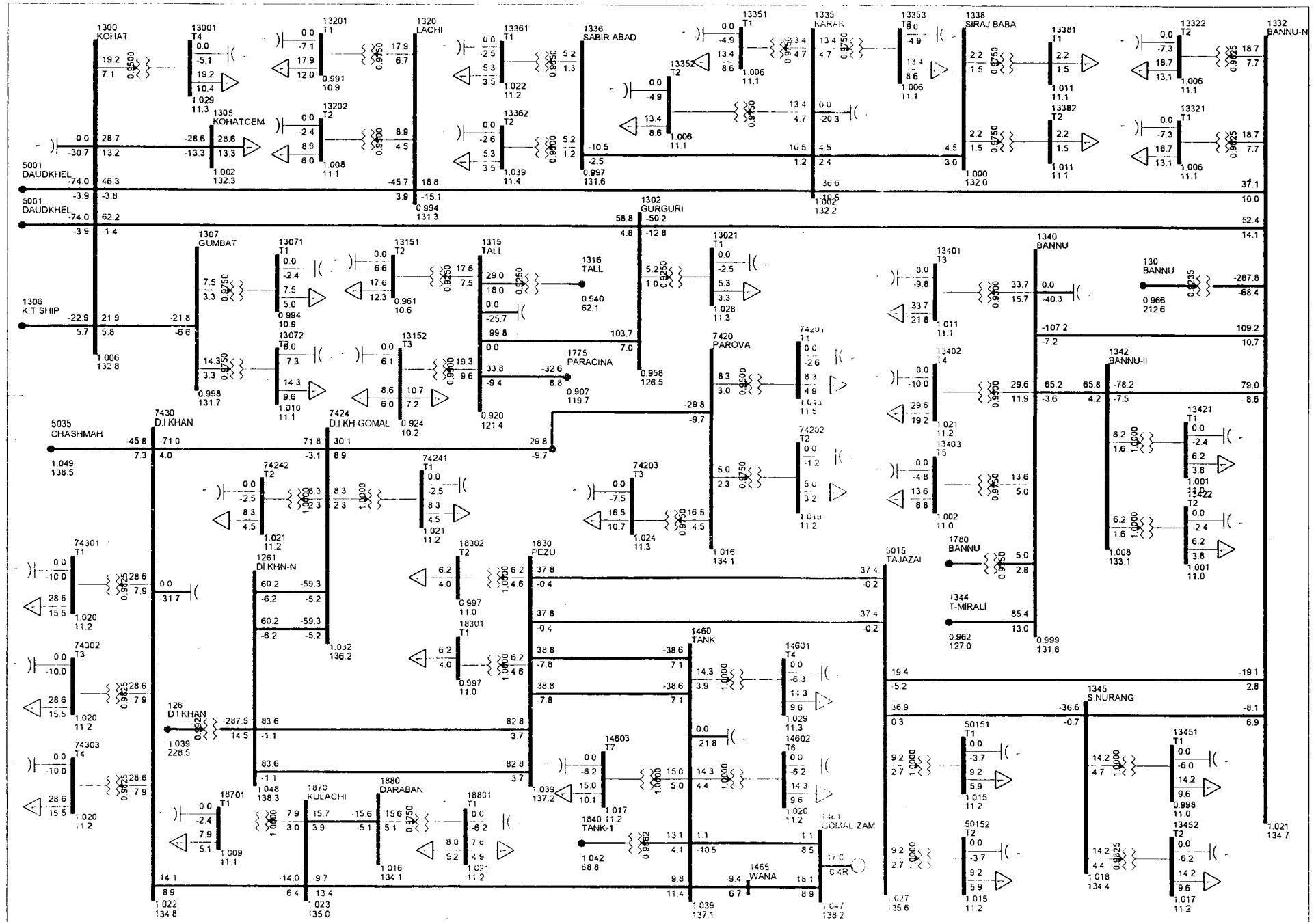
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.3



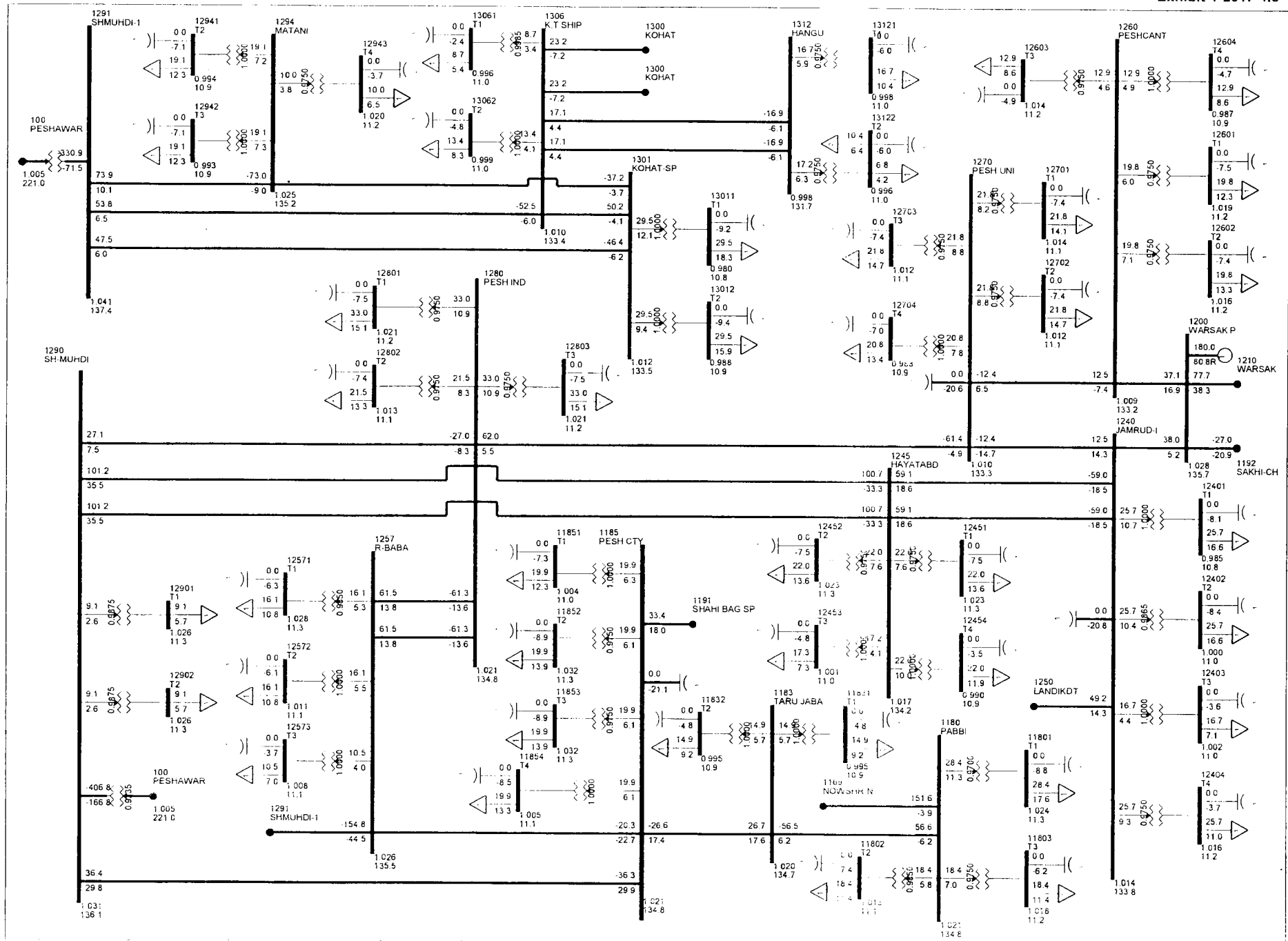
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.4



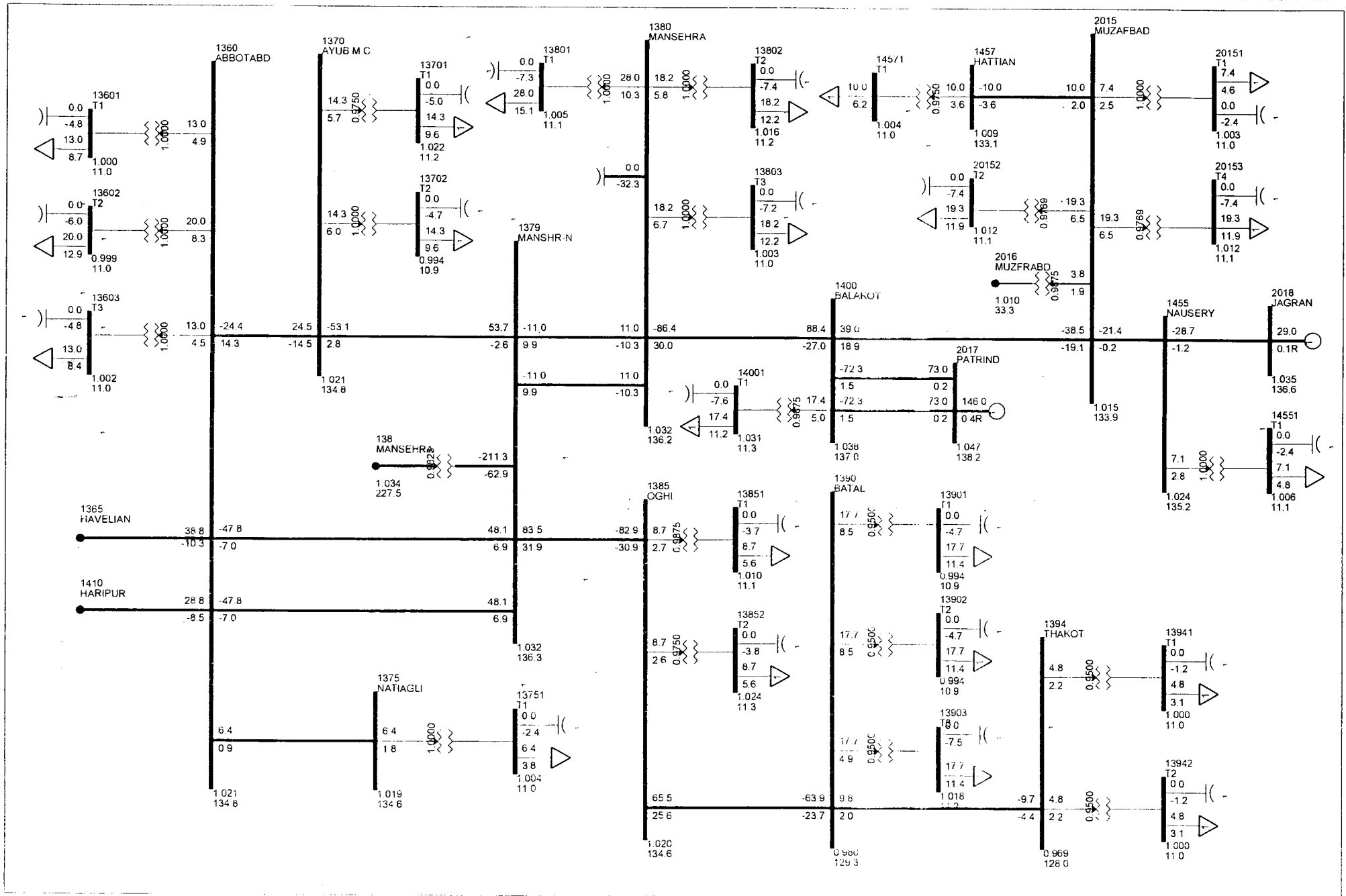
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.5



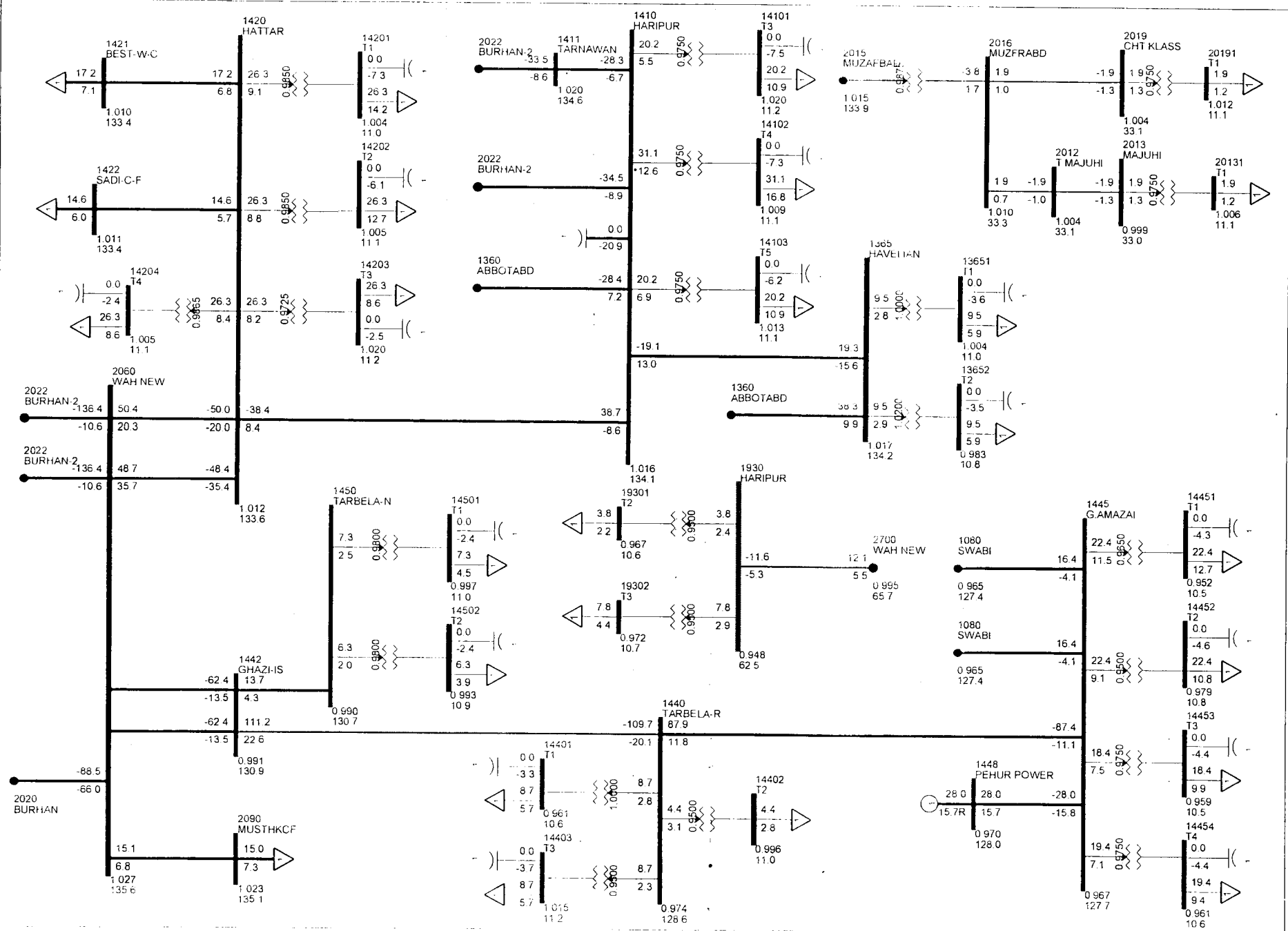
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.6



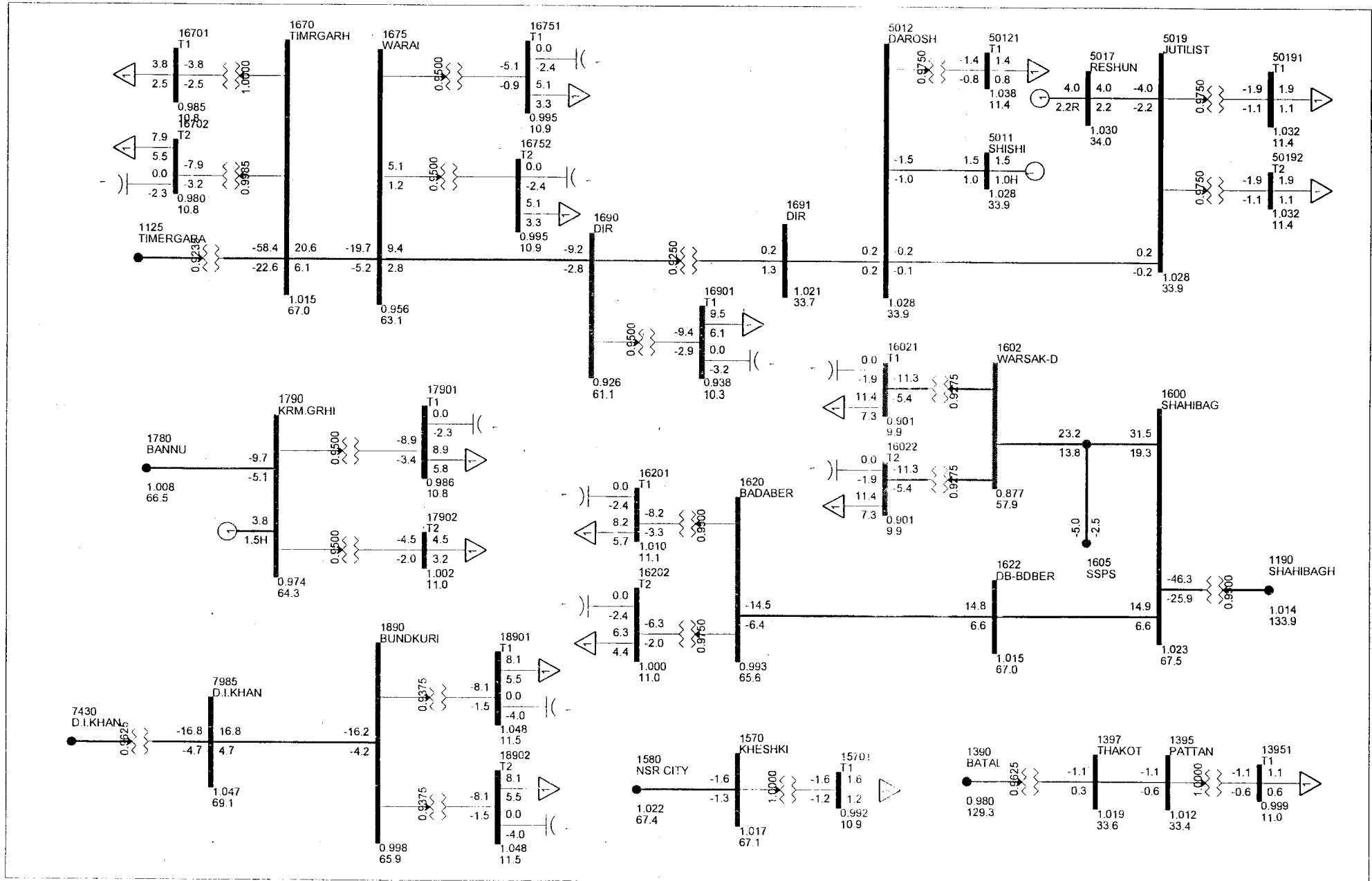
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.7



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2017: BASE CASE

Exhibit-1-2017-1.8



PESCO IGTD 2017 losses .

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 14:26

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

YEAR 2017: BASE CASE

IN MW/MVAR

INTERCHANGE-		FROM	TO LOAD	TO					-NET
TO TIES	DESIRED	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA + LOADS	--X NET INT	RATION	TO AREA	SHUNT	DEVICES	SHUNT CHARGING		LOSSES	LINES
1 -2718.7	722.3 0.0	3350.1	0.0	0.0	0.0	0.0	0.0	90.9	-2860.6
PESCO -939.0	134.6	2031.1	-1530.5	0.0	0.0	228.4		801.5	-1026.2
COLUMN -2718.7	722.3 0.0	3350.1	0.0	0.0	0.0	0.0	0.0	90.9	-2860.6
TOTALS -939.0	134.6	2031.1	-1530.5	0.0	0.0	228.4		801.5	-1026.2

PESCO IGTD 2016 with R Losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JAN 21 2014 11:04

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

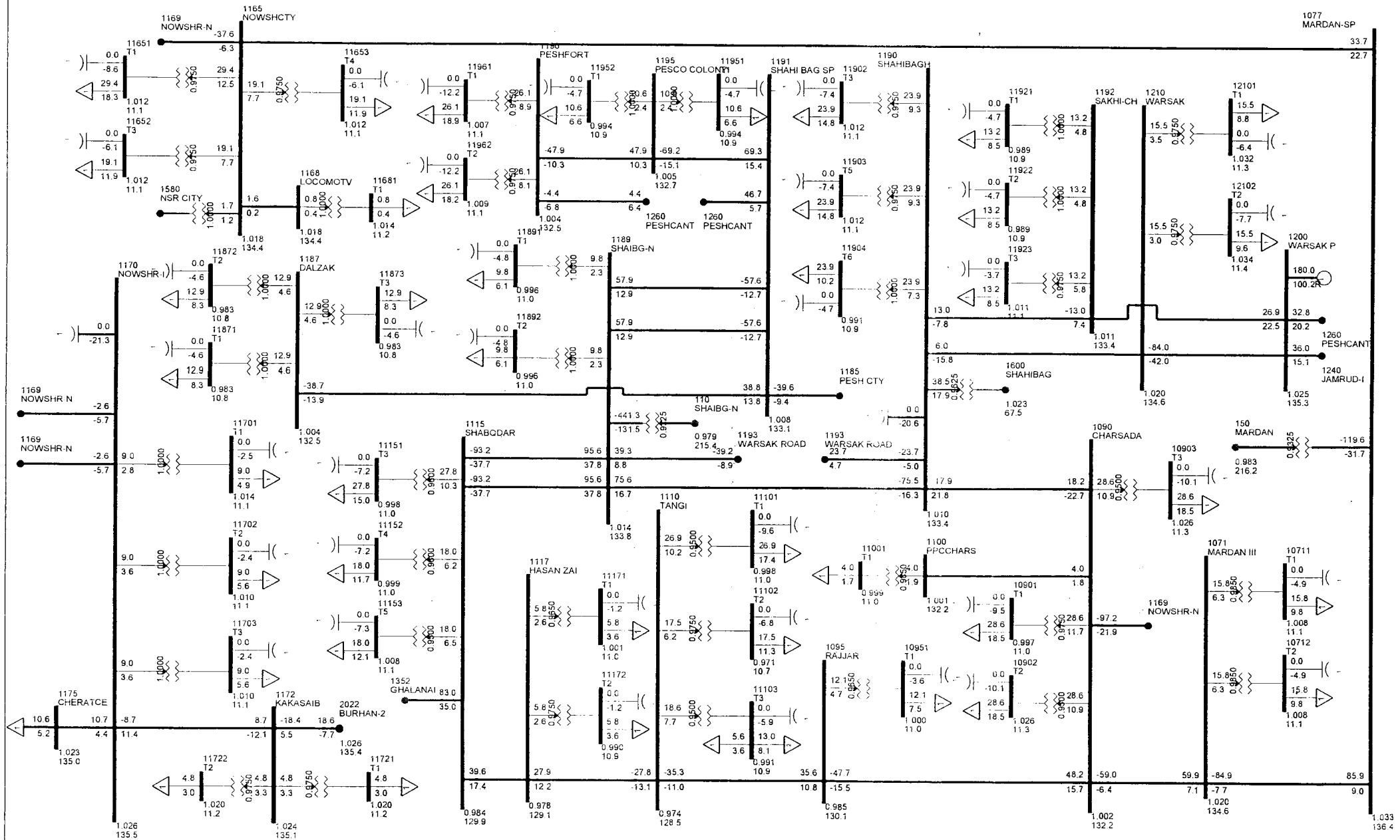
YEAR 2016: BASE CASE WITH REINFORCEMENT

IN MW/MVAR

INTERCHANGE-	FROM	TO	LOAD	TO					-NET
TO TIES	GENE- DESIRED	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE	
X-- AREA + LOADS	--X NET INT	RATION TO AREA	SHUNT	DEVICES	SHUNT	CHARGING	LOSSES	LINES	
1 -2432.0	722.3 0.0	3069.2	0.0	0.0	0.0	0.0	85.1	-2555.3	
PESCO -673.8	106.1	1855.4	-1545.7	0.0	0.0	226.8	697.0	-746.1	
COLUMN -2432.0	722.3 0.0	3069.2	0.0	0.0	0.0	0.0	85.1	-2555.3	
TOTALS -673.8	106.1	1855.4	-1545.7	0.0	0.0	226.8	697.0	-746.1	

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE

Exhibit-1-2018-1.1



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE

Exhibit-1-2018-1.2

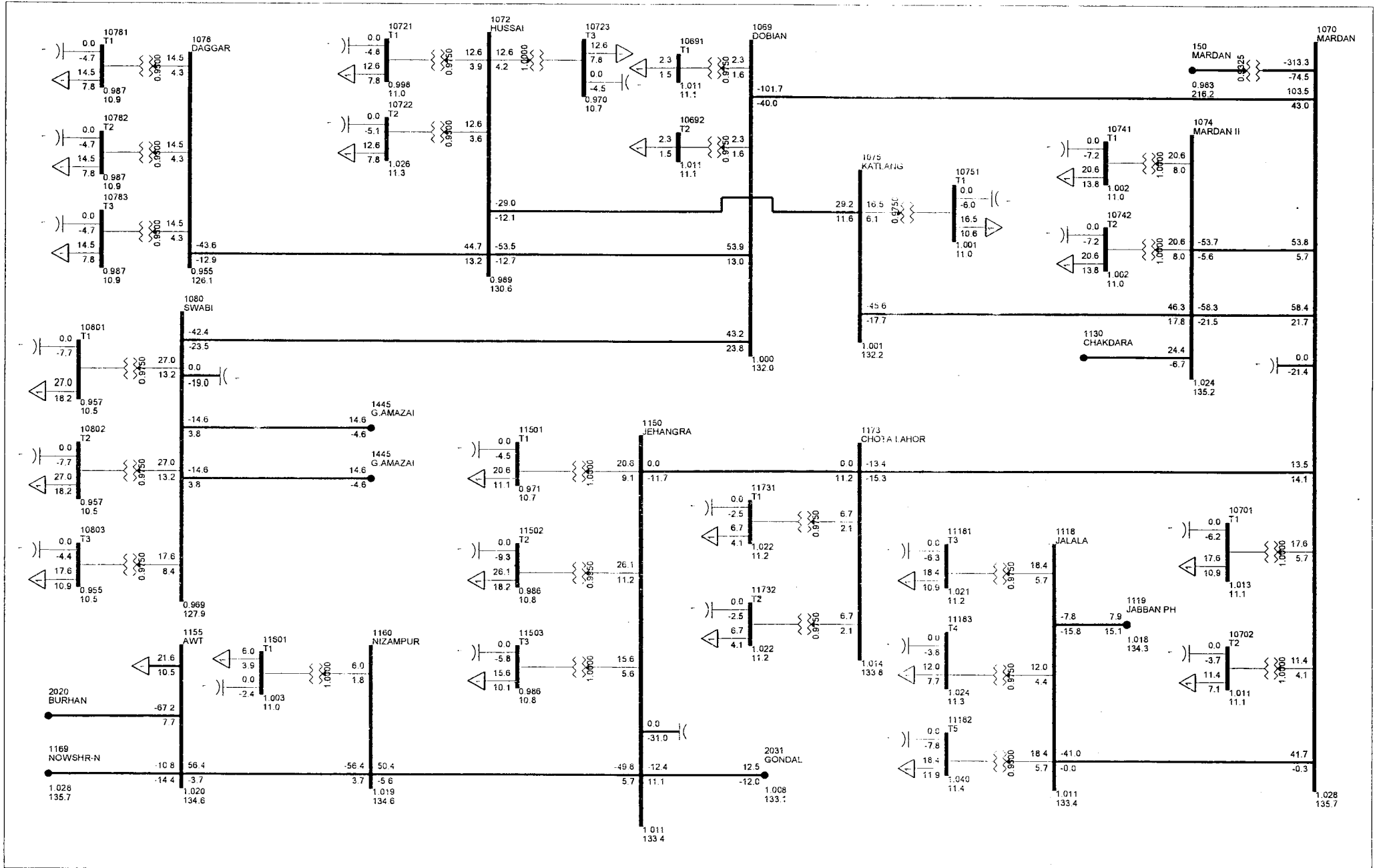
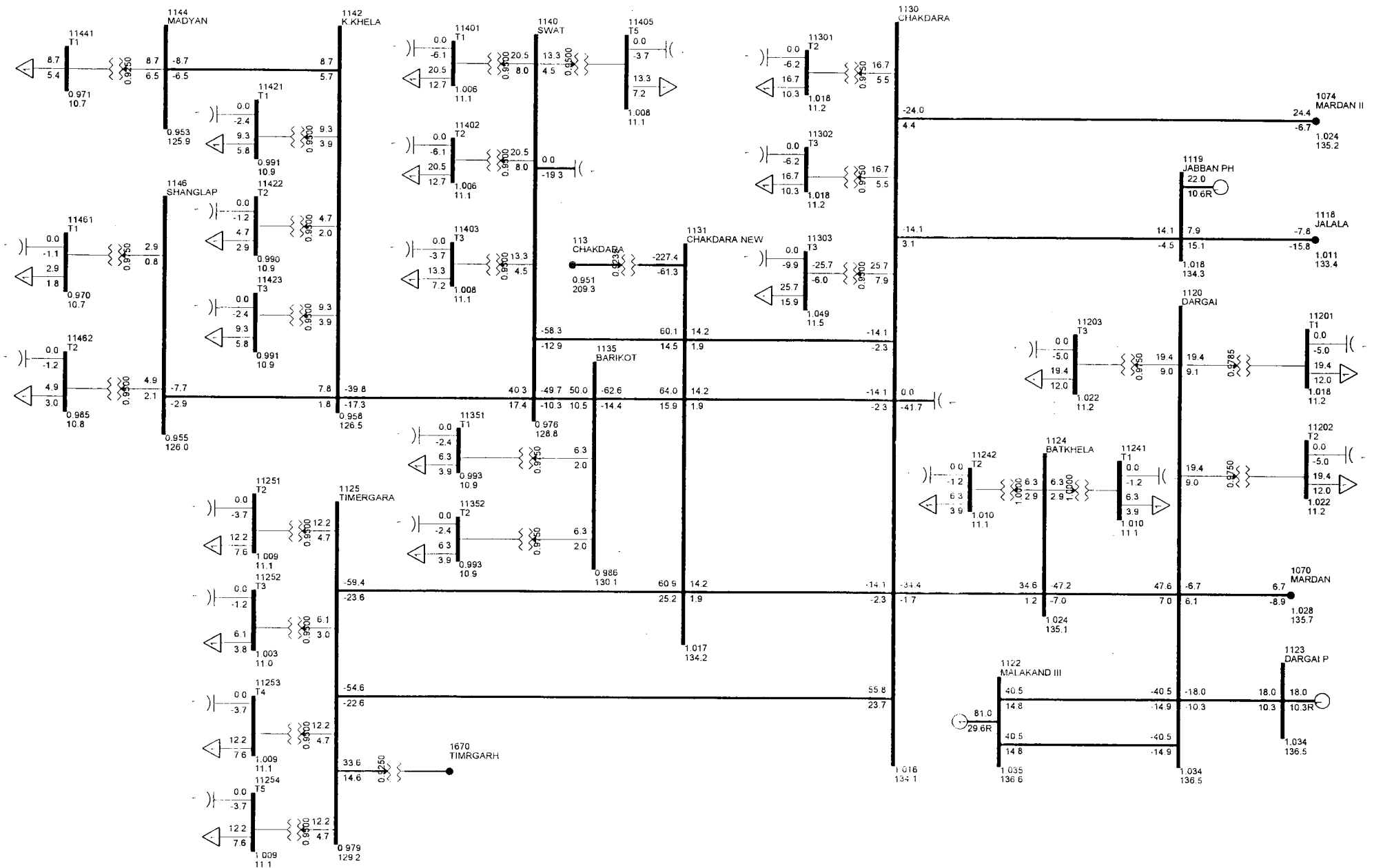


Exhibit-1-2018-1.3



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE

Exhibit-1-2018-1.4

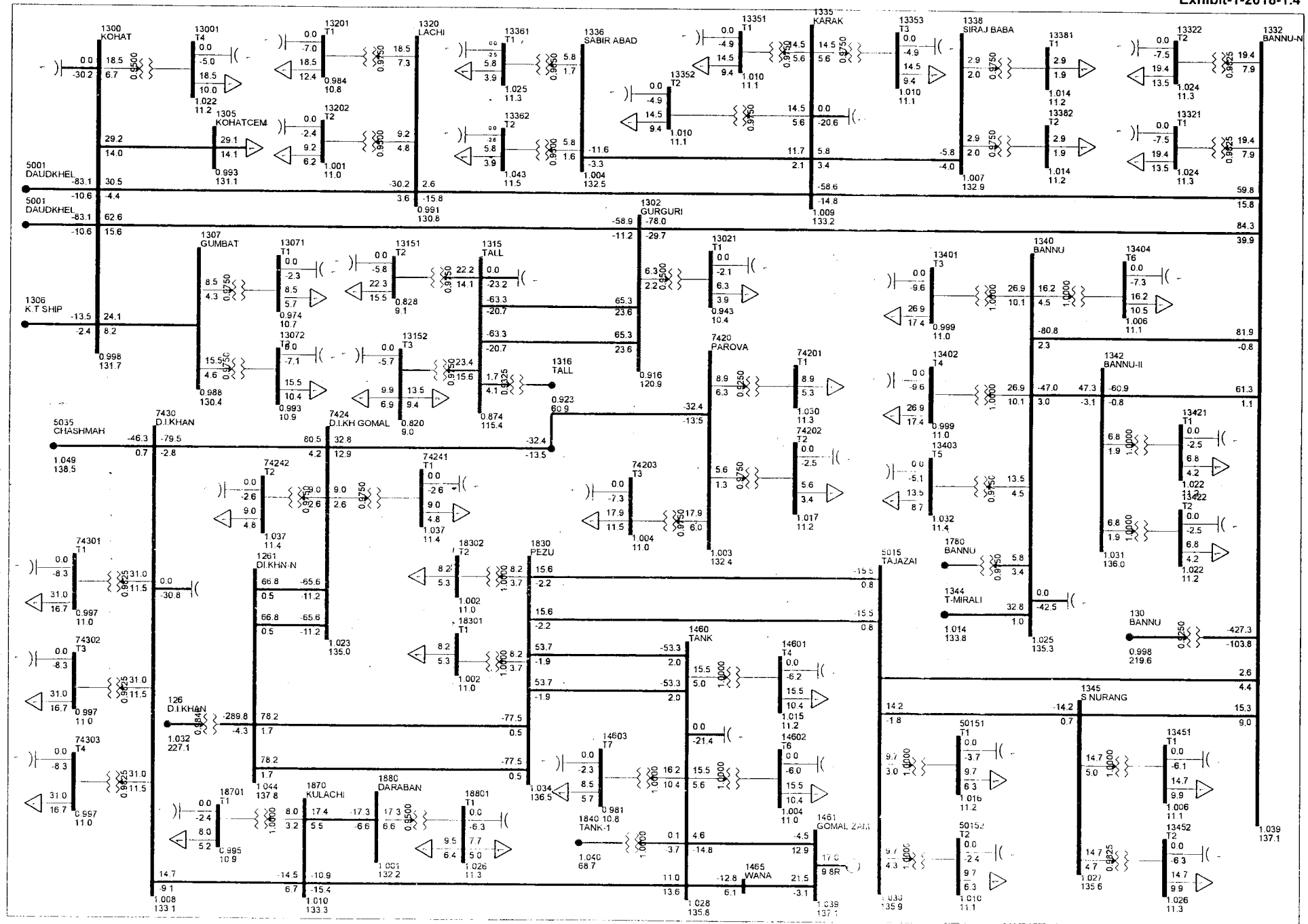
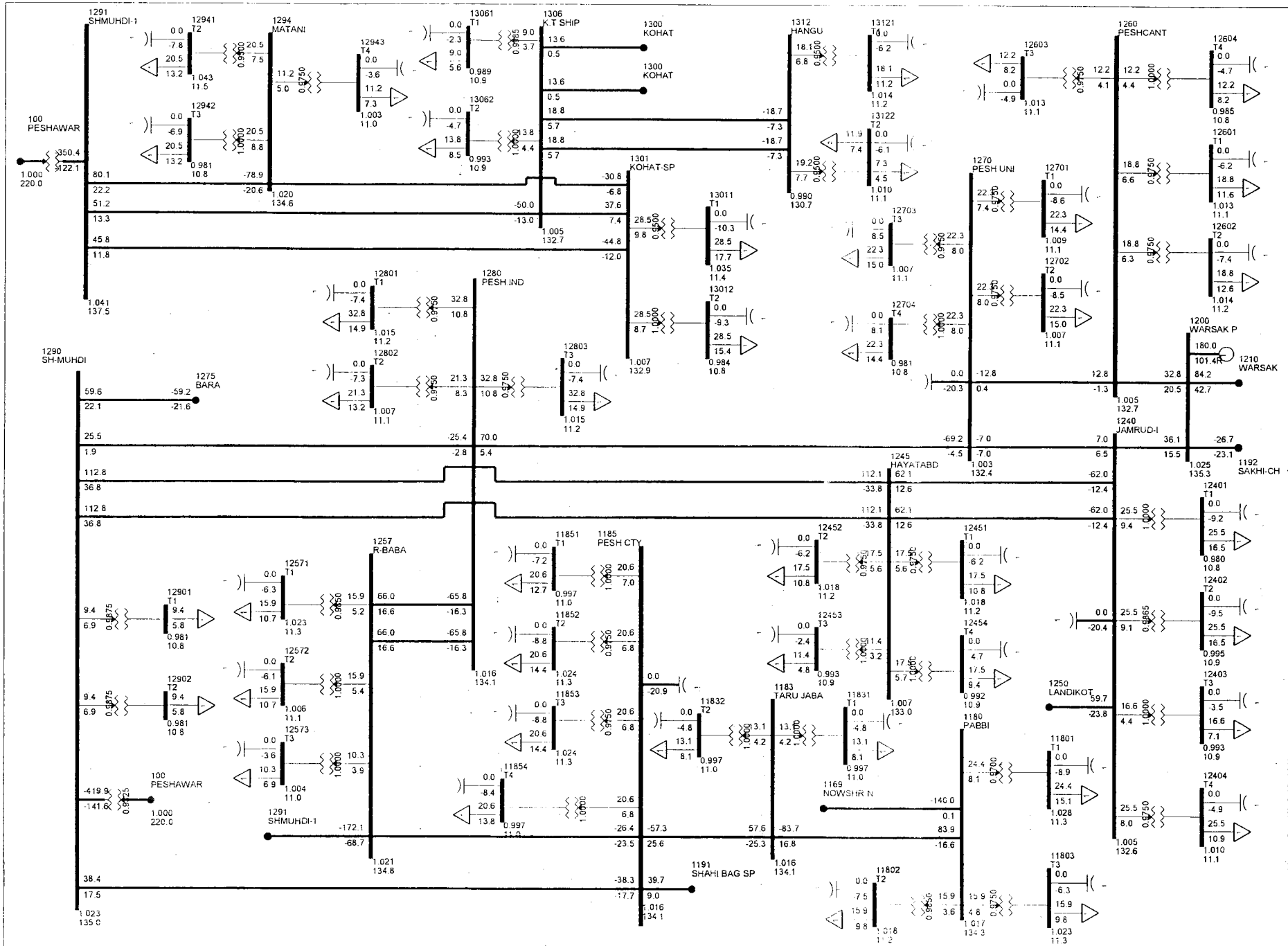


Exhibit-1-2018-1.5



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE

Exhibit-1-2018-1.6

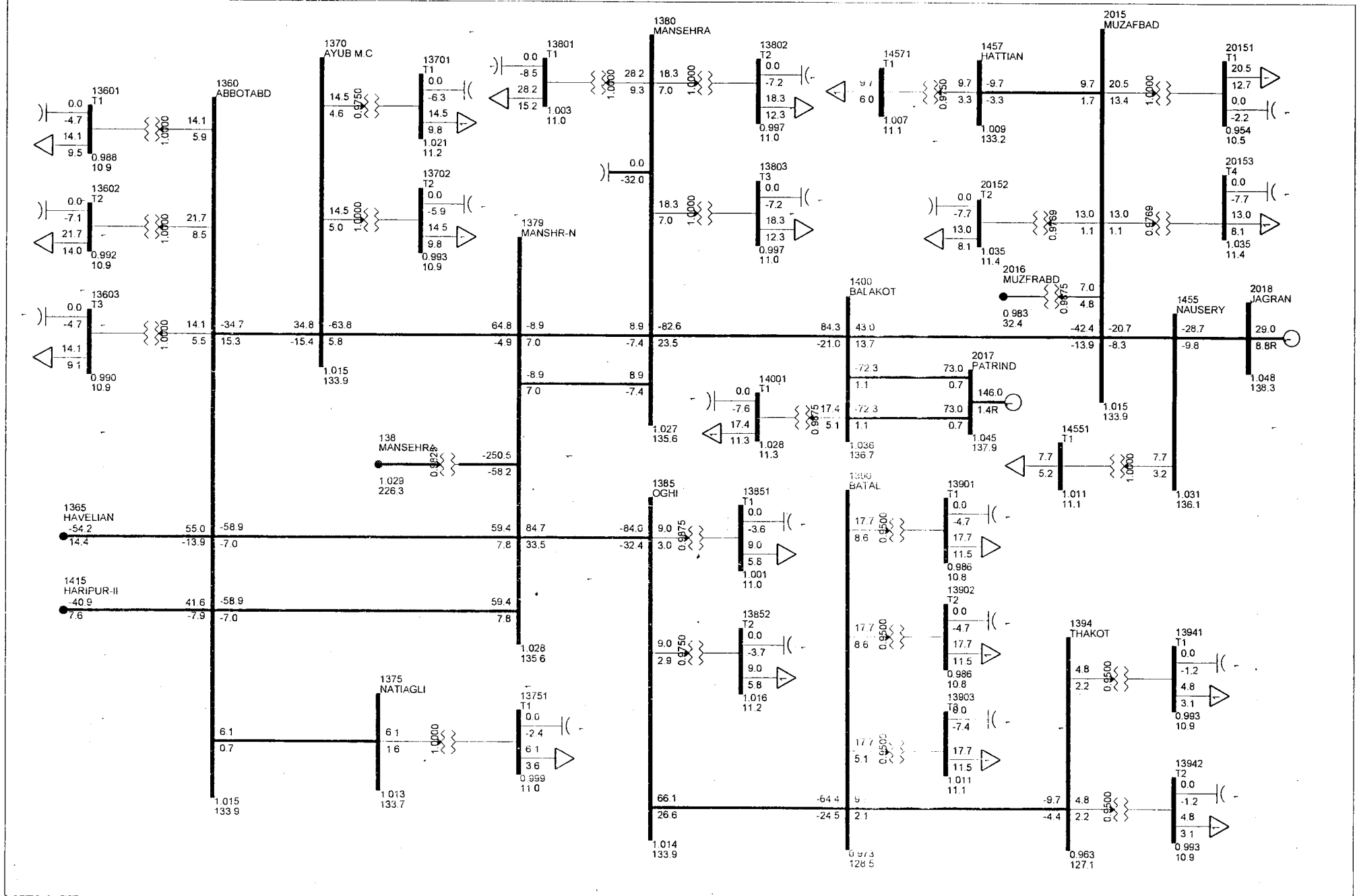
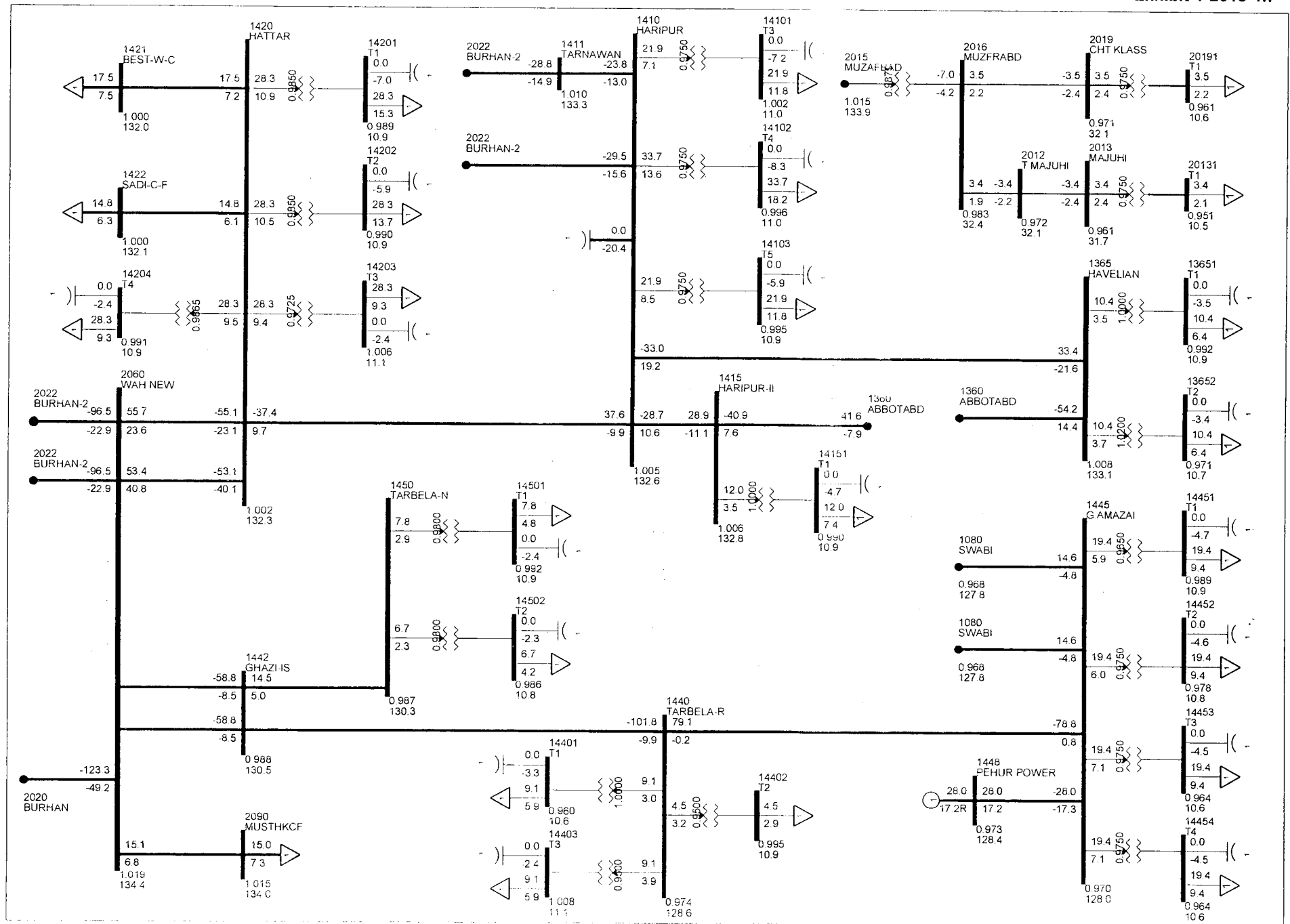
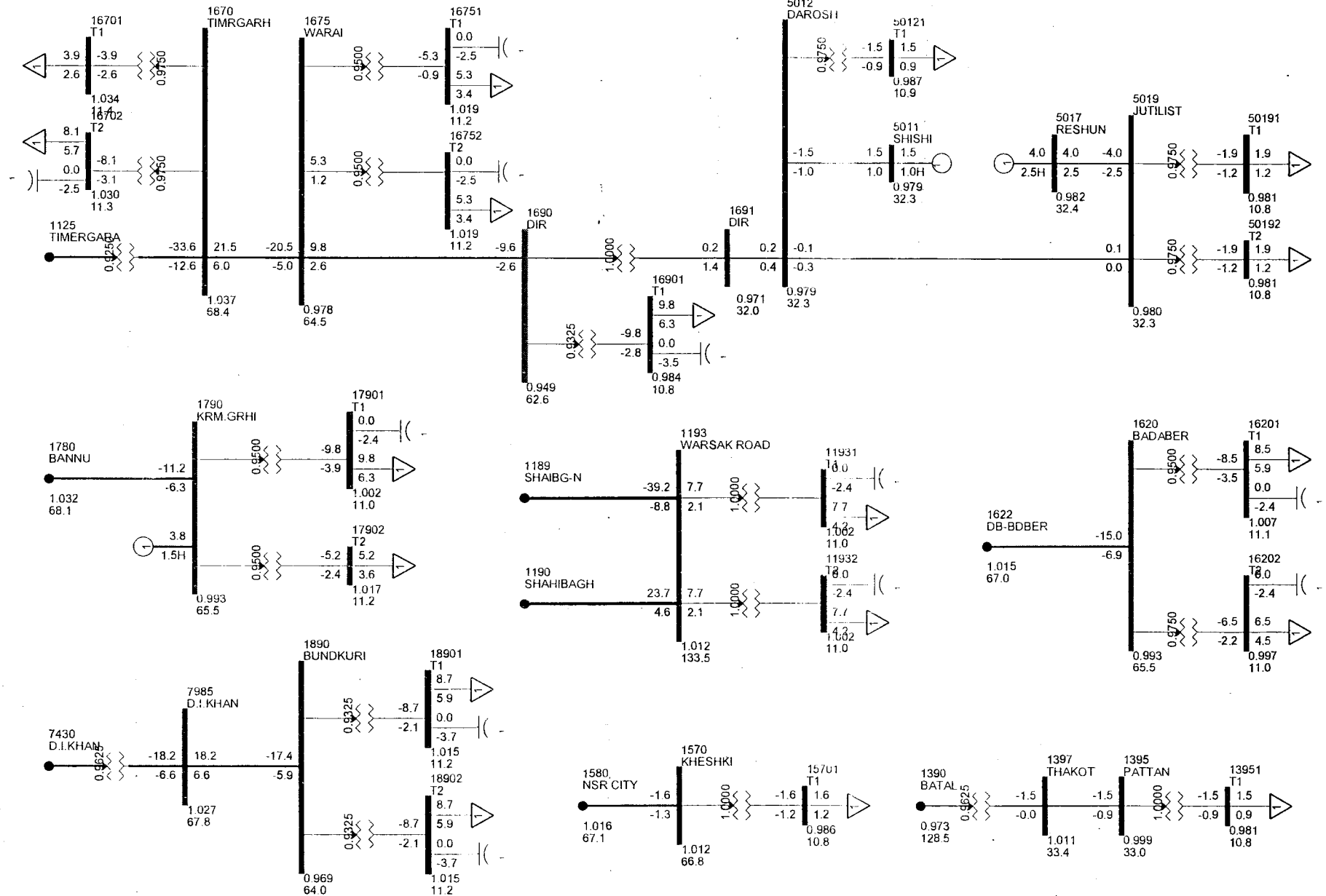


Exhibit-1-2018-1.7



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE

Exhibit-1-2018-1.8



PESCO IGTD 2018 Losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 21:16

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

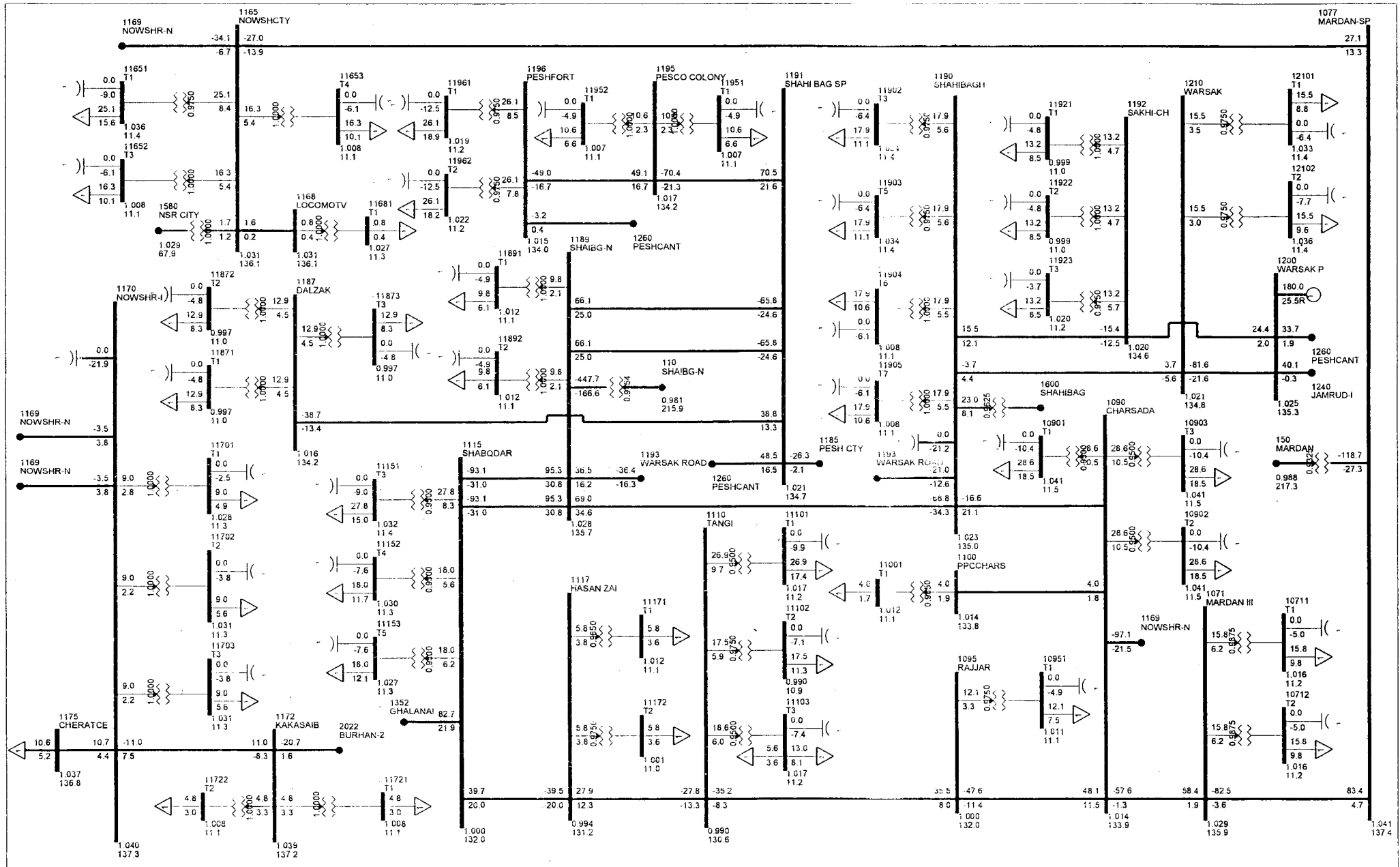
YEAR 2018: BASE CASE

IN MW/MVAR

INTERCHANGE-	FROM	TO LOAD	TO						
TO TIES	GENE- DESIRED	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE	
X-- AREA + LOADS	--X NET INT	RATION TO AREA	SHUNT	DEVICES	SHUNT	CHARGING	LOSSES	LINES	
1 -2734.3	844.3 0.0	3483.4	0.0	0.0	0.0	0.0	95.2	-2855.9	
PESCO -977.0	228.6	2111.5	-1584.0	0.0	0.0	232.4	910.6	-1055.3	
COLUMN -2734.3	844.3 0.0	3483.4	0.0	0.0	0.0	0.0	95.2	-2855.9	
TOTALS -977.0	228.6	2111.5	-1584.0	0.0	0.0	232.4	910.6	-1055.3	

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE WITH REINFORCEMENT

Exhibit-1-2018-2.1



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE WITH REINFORCEMENT

Exhibit-1-2018-2.2

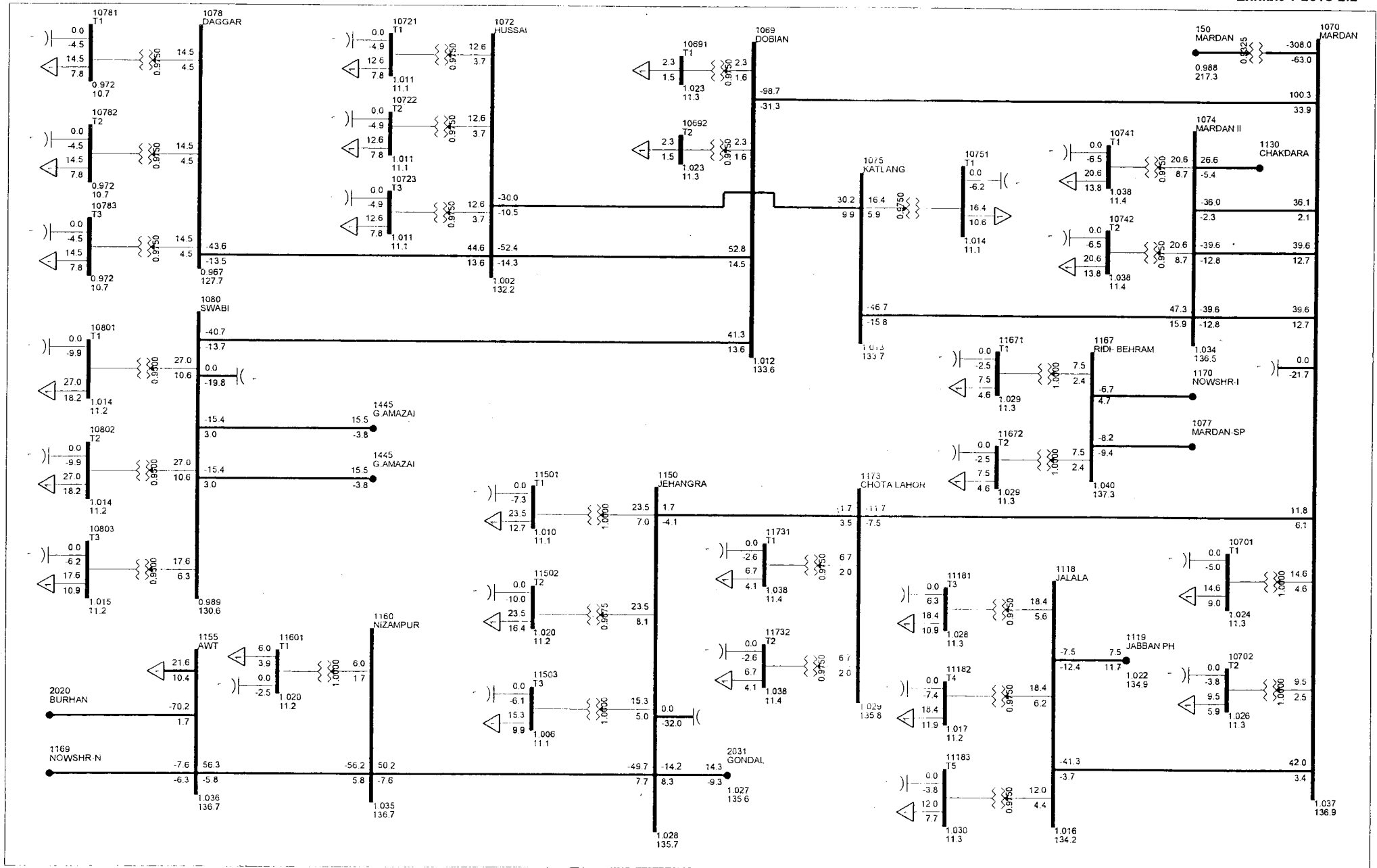
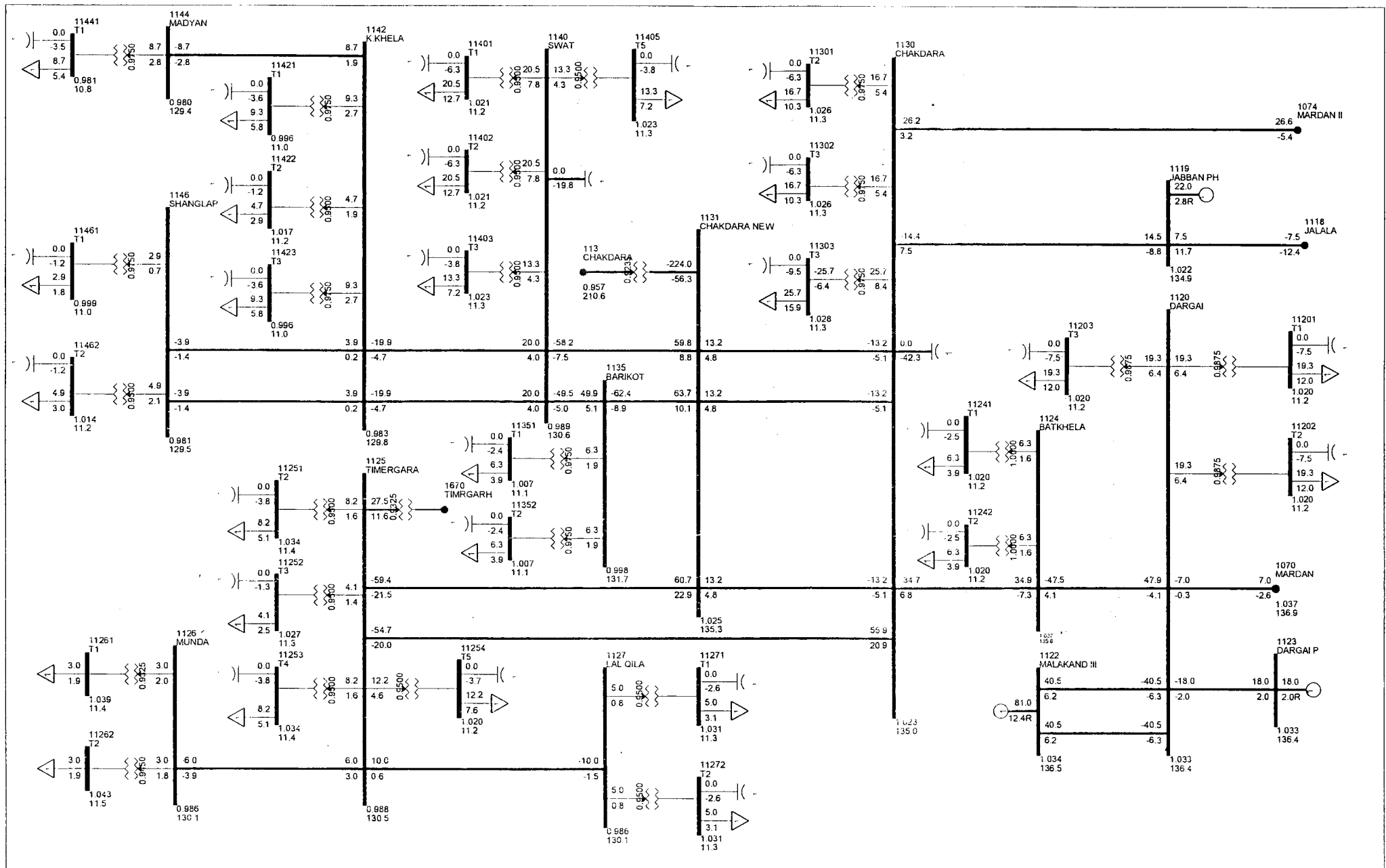
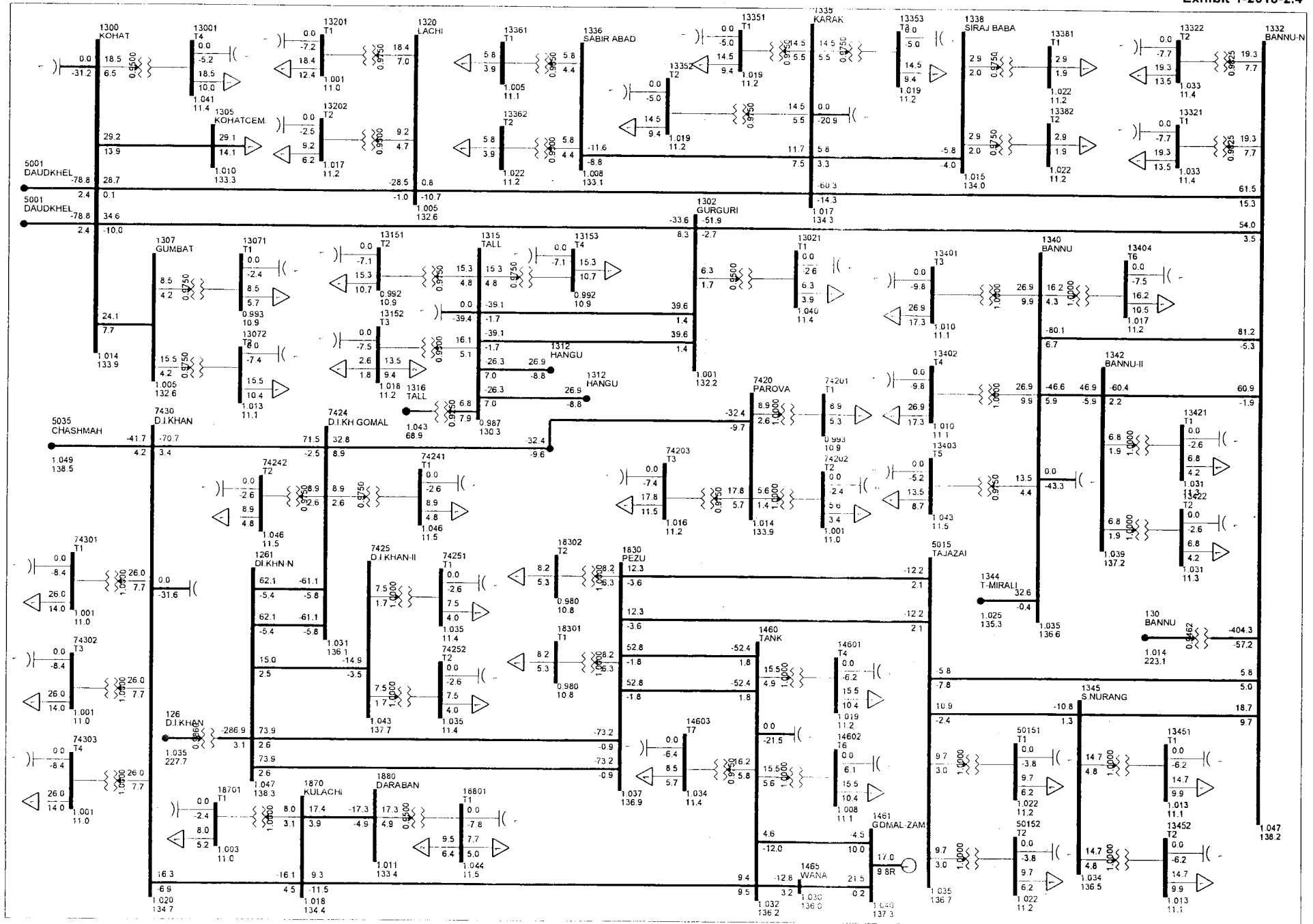


Exhibit-1-2018-2.3



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE WITH REINFORCEMENT

Exhibit-1-2018-2.4



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018: BASE CASE WITH REINFORCEMENT

Exhibit-1-2018-2.5

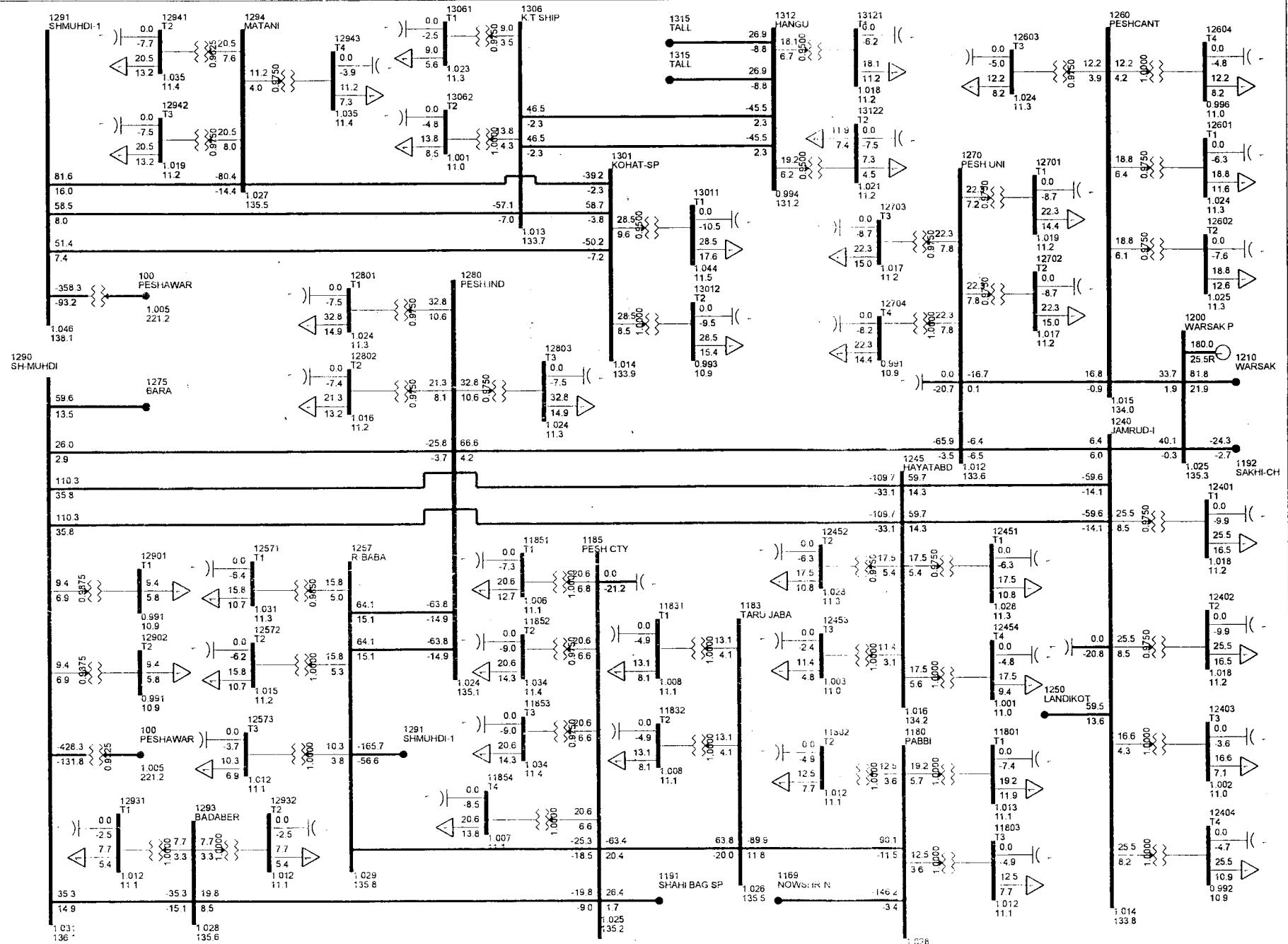


Exhibit-1-2018-2.6

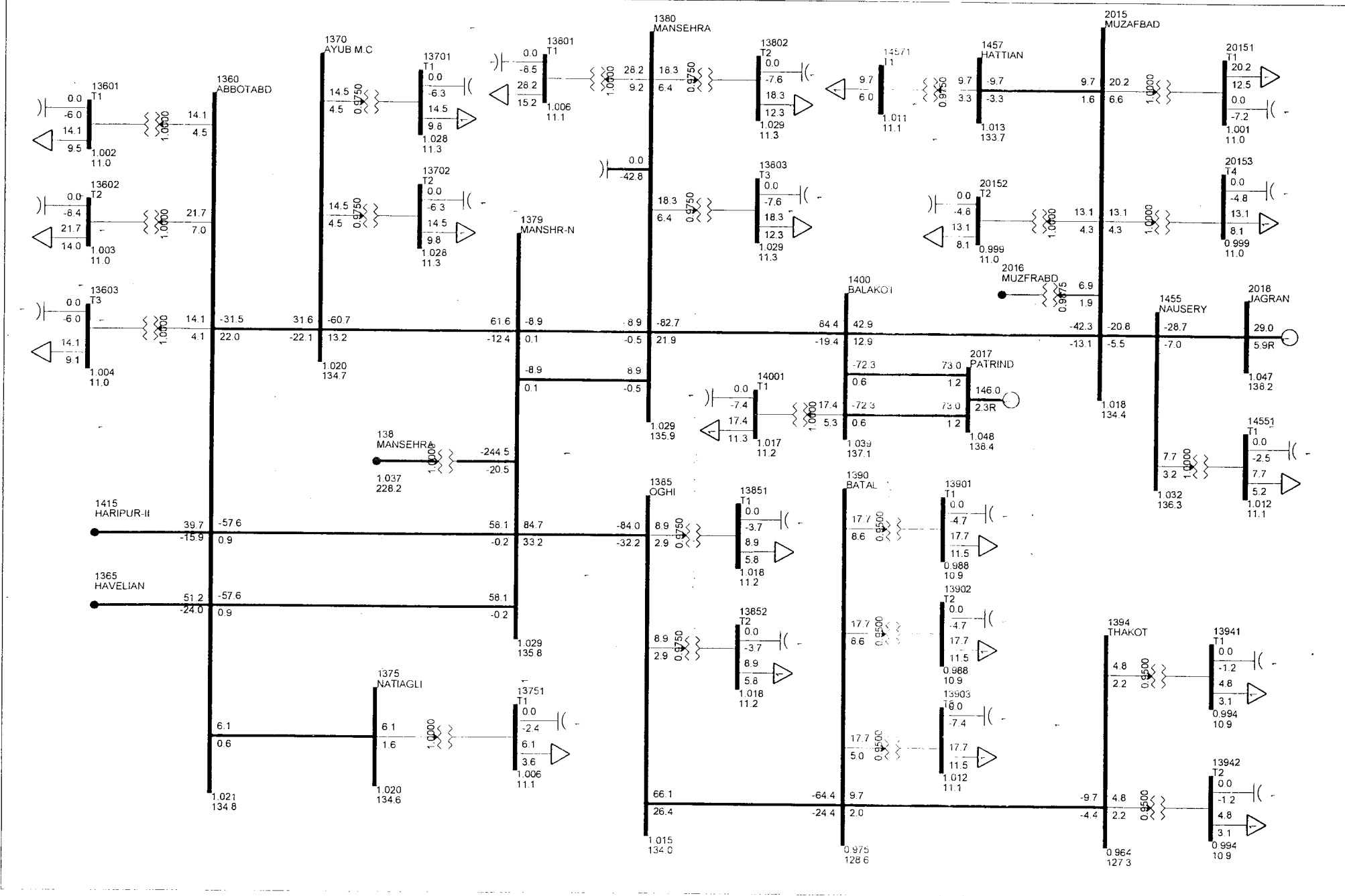


Exhibit-1-2018-2.7

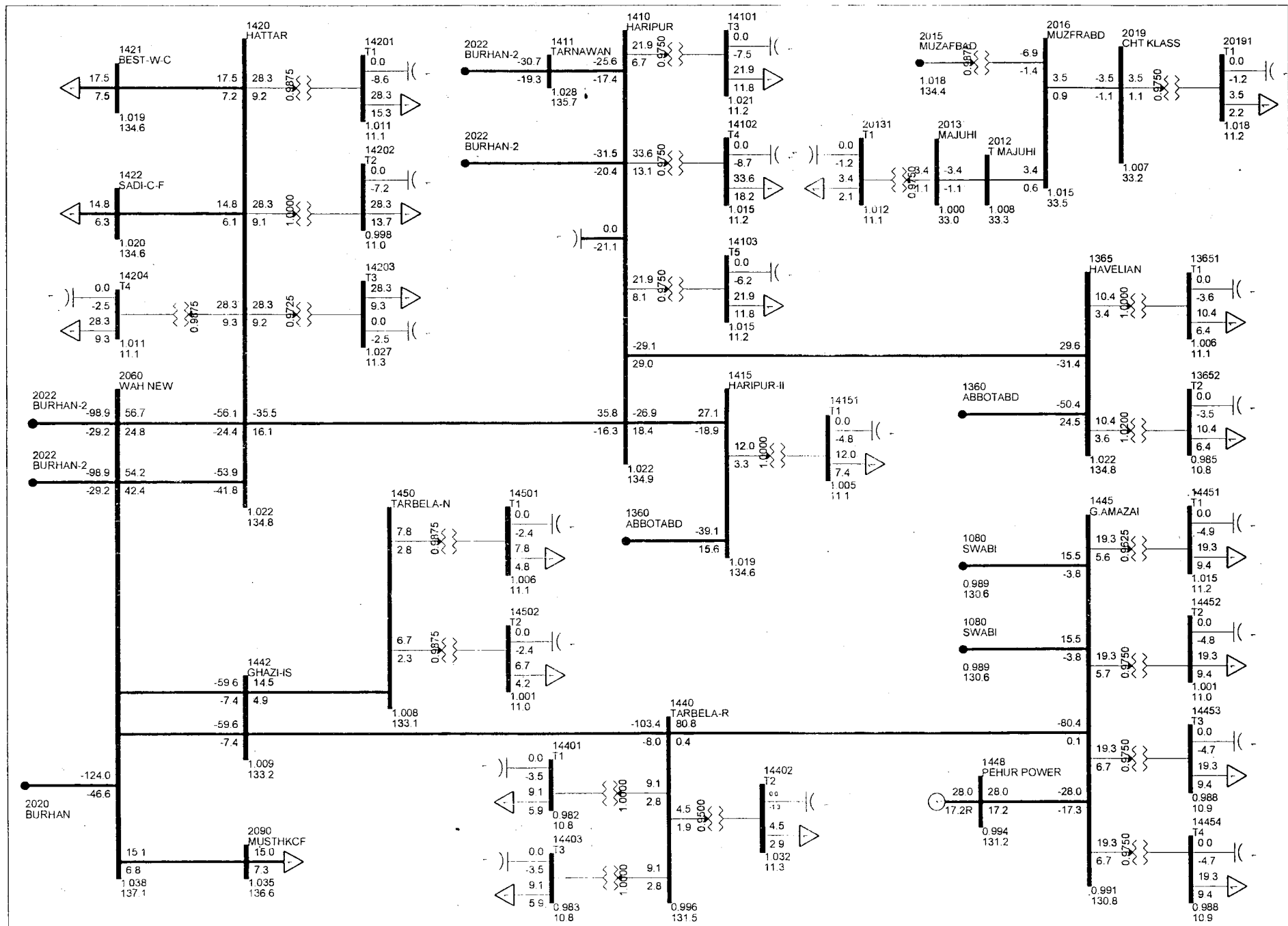
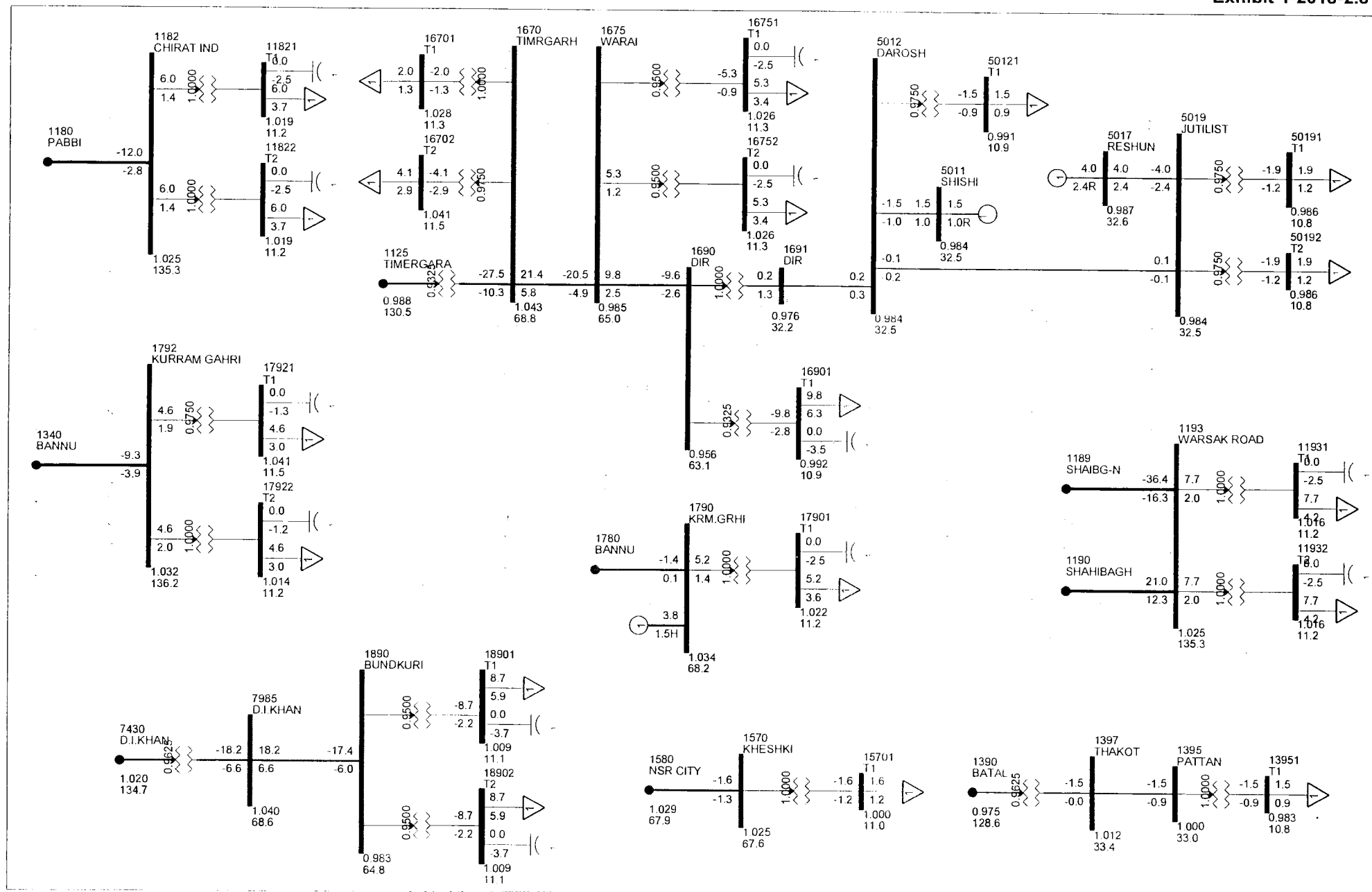


Exhibit-1-2018-2.8



PESCO IGTD with R losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

TUE, JUN 21 2014 21:36

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

AREA TOTALS

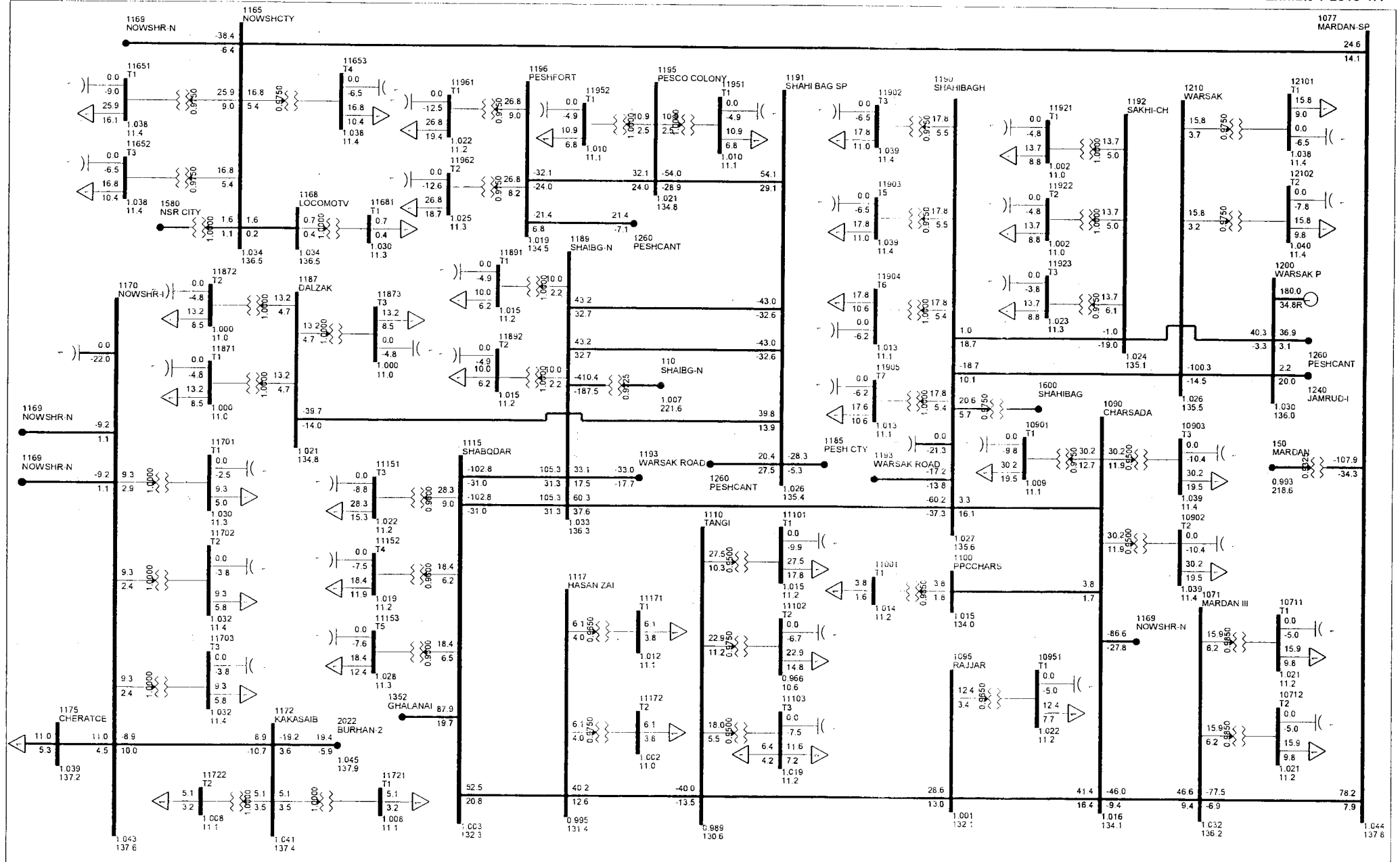
YEAR 2018: BASE CASE WITH REINFORCEMENT

IN MW/MVAR

INTERCHANGE-		FROM	TO	LOAD	TO		-NET		
TO TIES	DESIRED	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA	--X RATION	TO AREA	SHUNT	DEVICES	SHUNT	CHARGING	LOSSES	LINES	
+ LOADS	NET INT								
1	844.3	3483.4	0.0	0.0	0.0	0.0	82.4	-2843.2	
-2721.5	0.0								
PESCO	110.6	2114.5	-1713.0	0.0	0.0	249.2	838.5	-958.5	
-880.2									
COLUMN	844.3	3483.4	0.0	0.0	0.0	0.0	82.4	-2843.2	
-2721.5	0.0								
TOTALS	110.6	2114.5	-1713.0	0.0	0.0	249.2	838.5	-958.5	
-880.2									

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.1



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.2

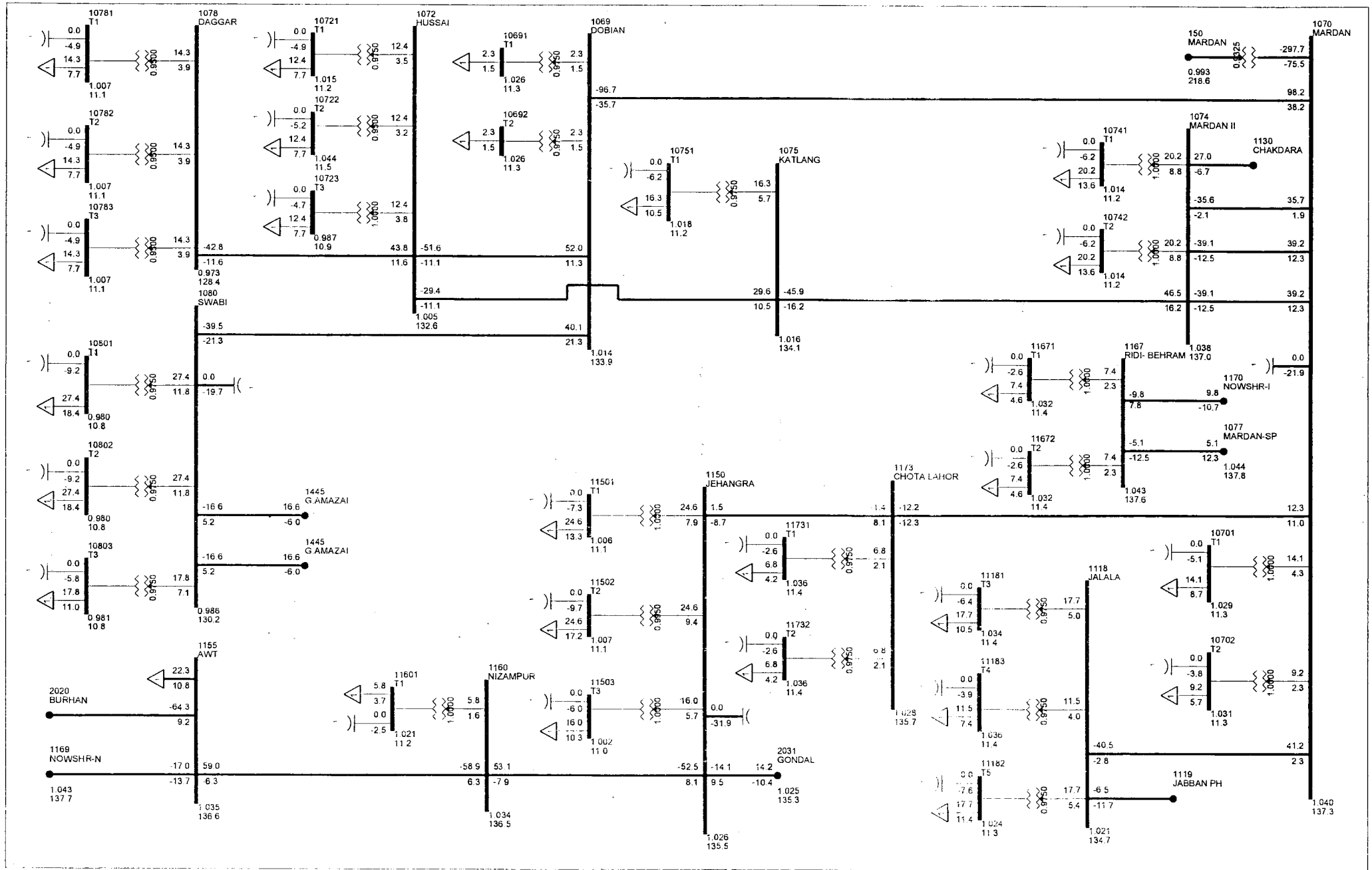
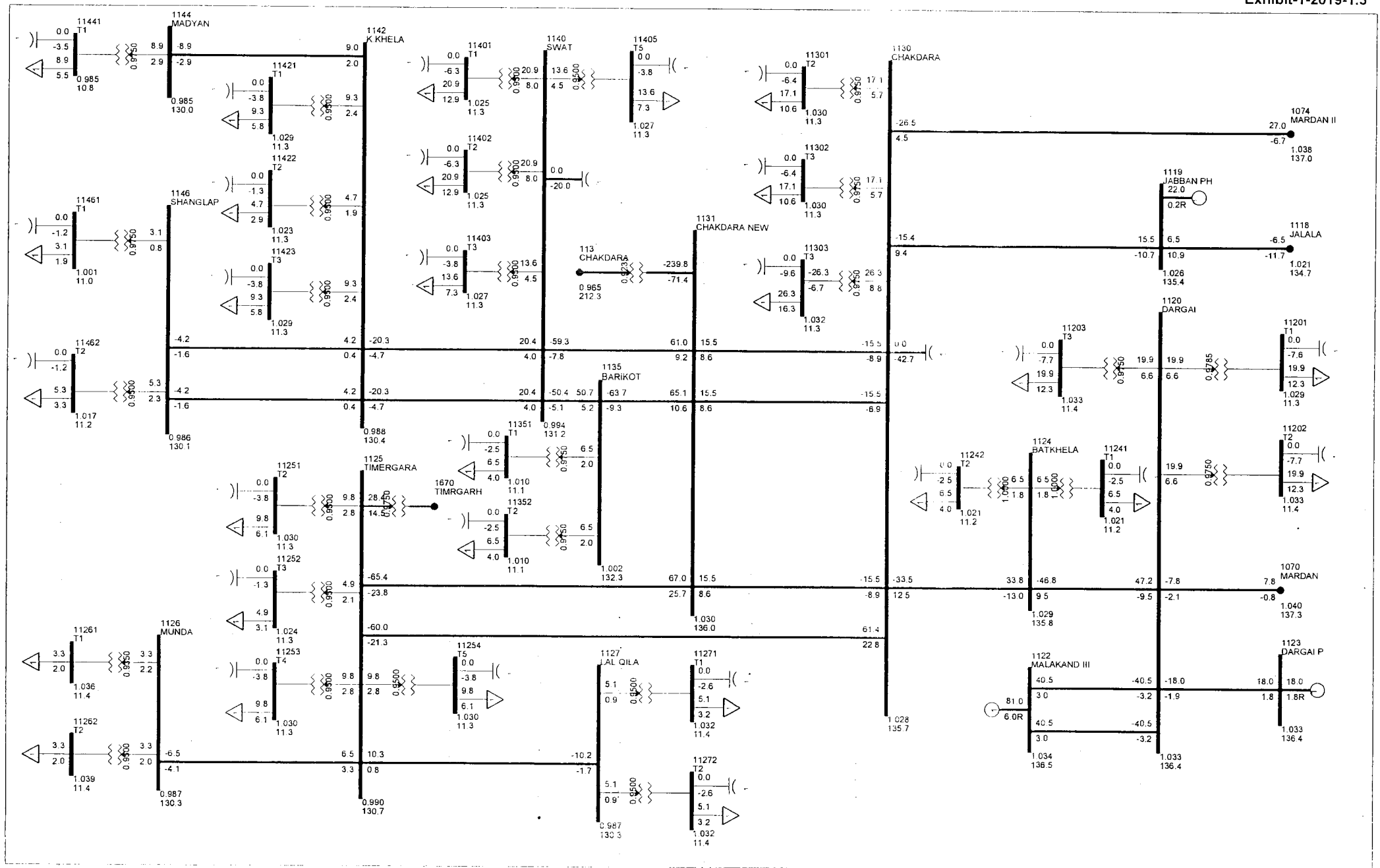
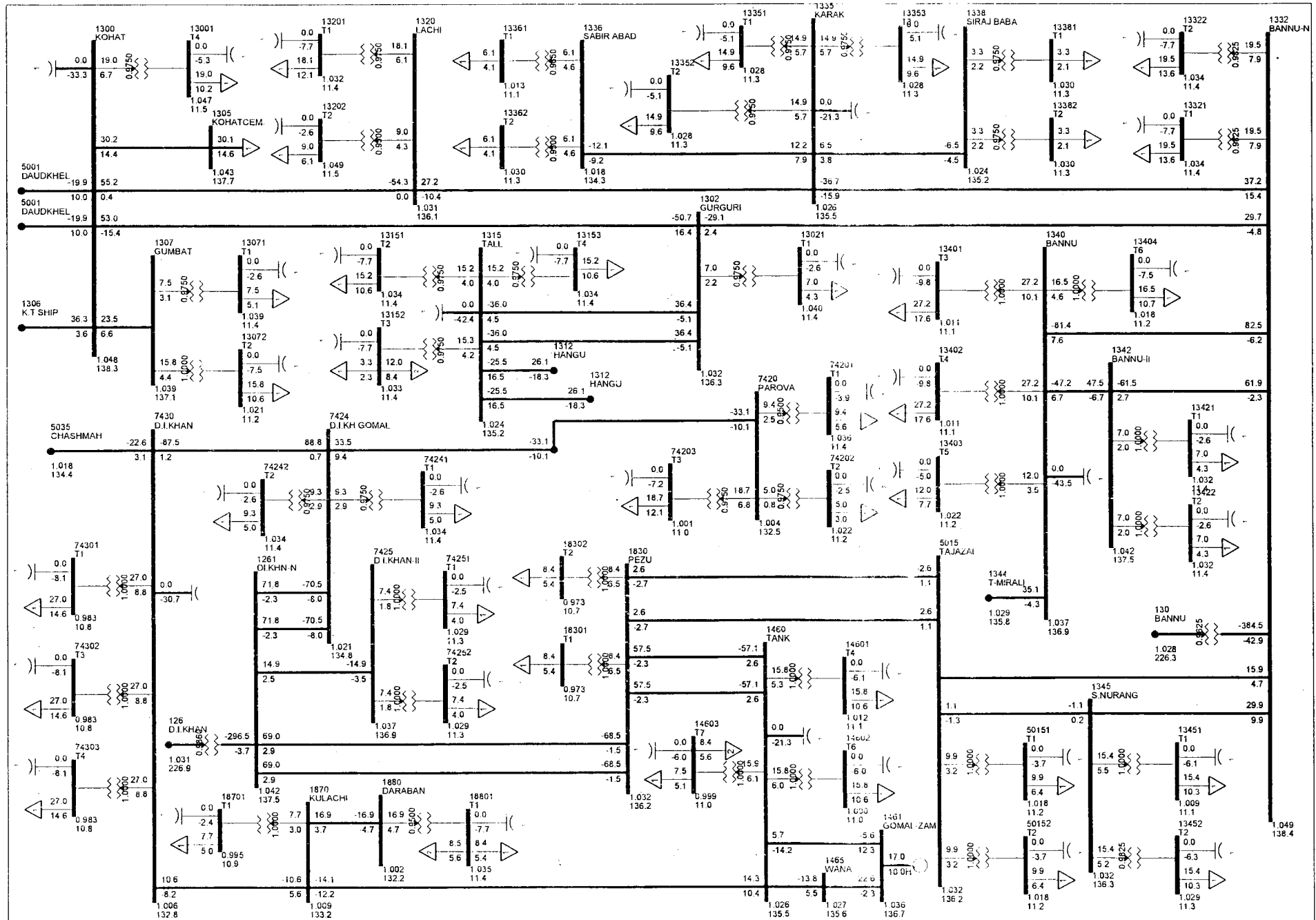


Exhibit-1-2019-1.3



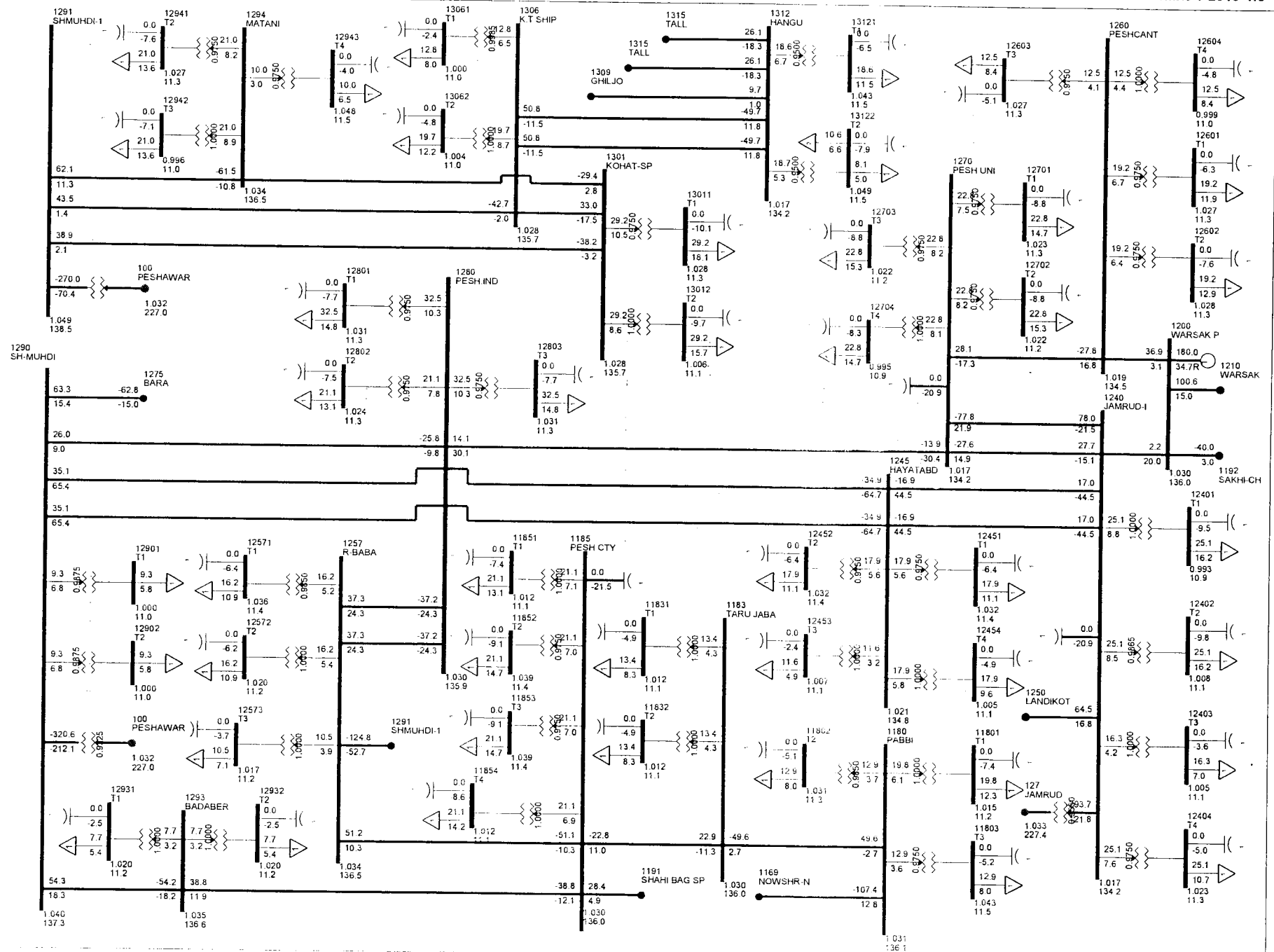
PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.4



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.5



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.6

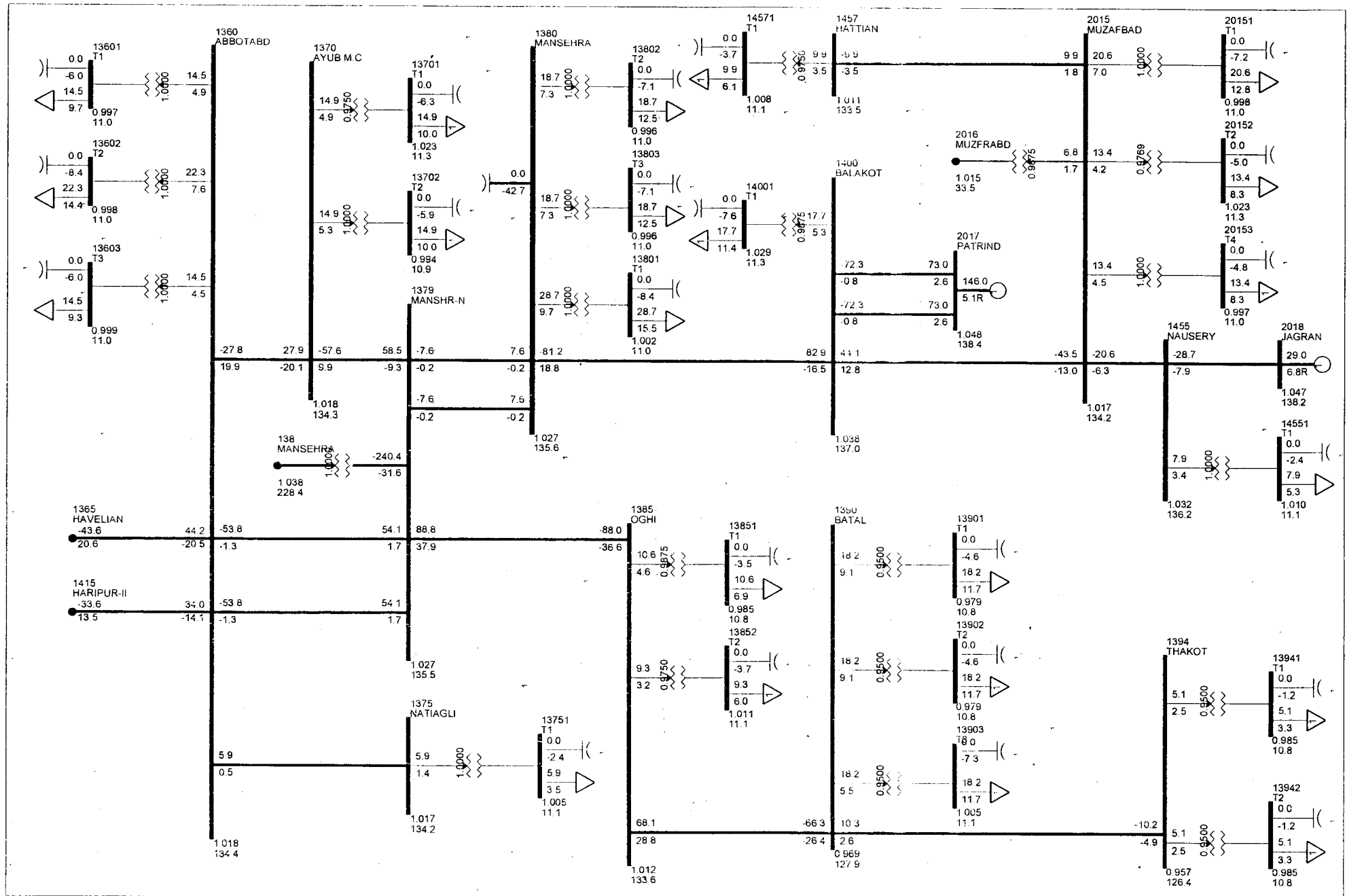
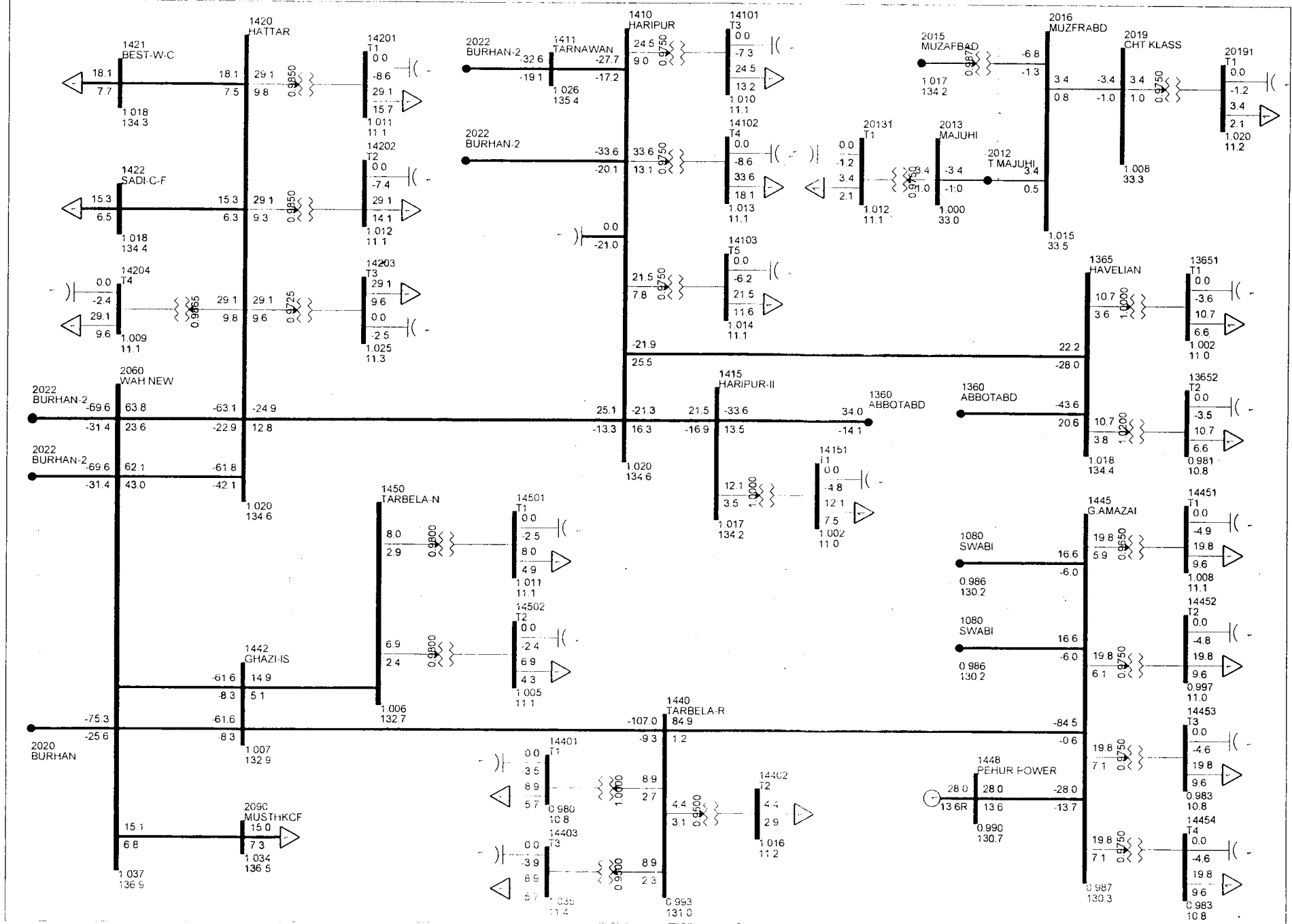
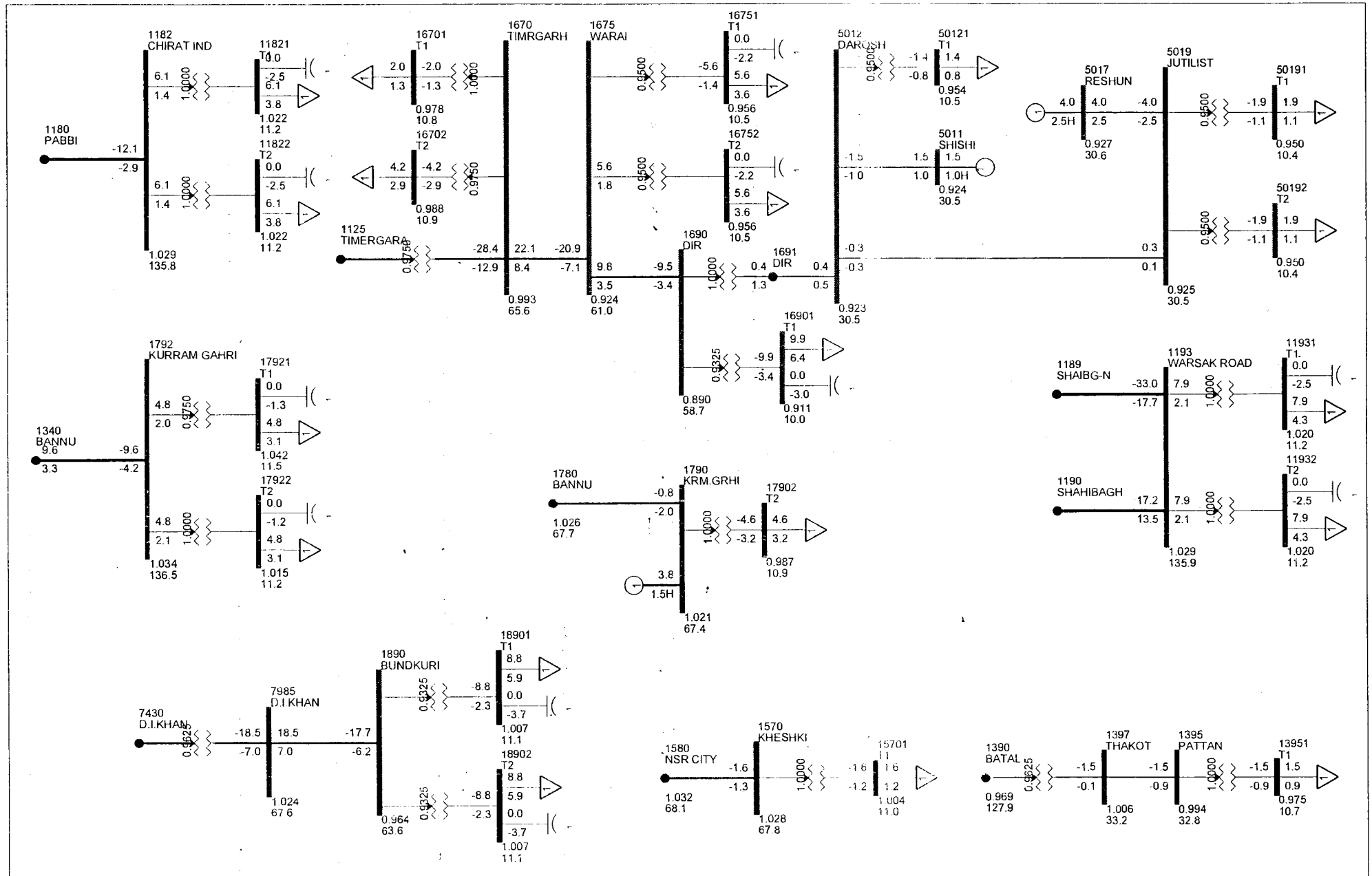


Exhibit-1-2019-1.7



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE

Exhibit-1-2019-1.8



PESCO IGTD 2019 losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

WED, JUN 22 2014 10:08

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

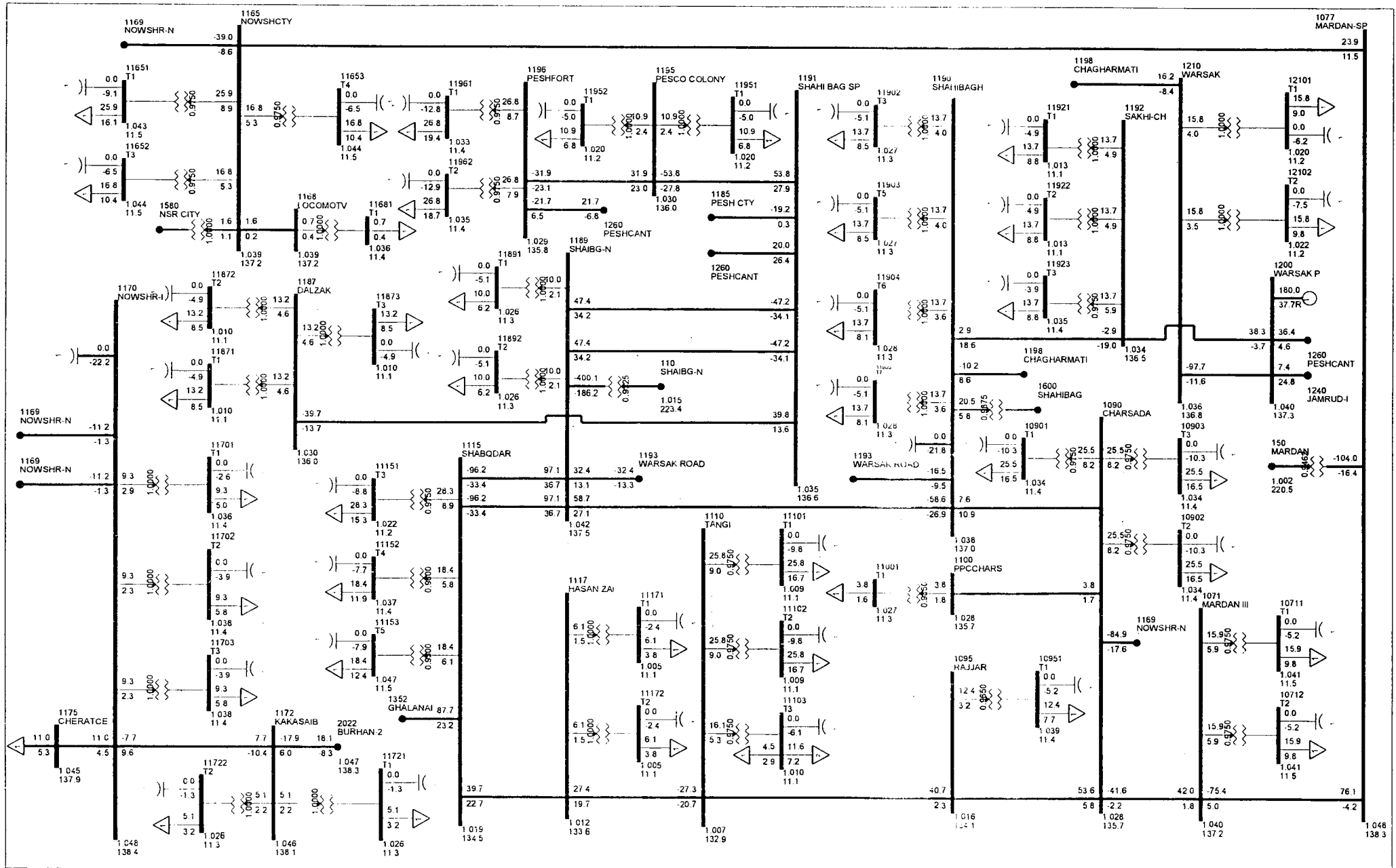
AREA TOTALS

YEAR 2019: BASE CASE

IN MW/MVAR

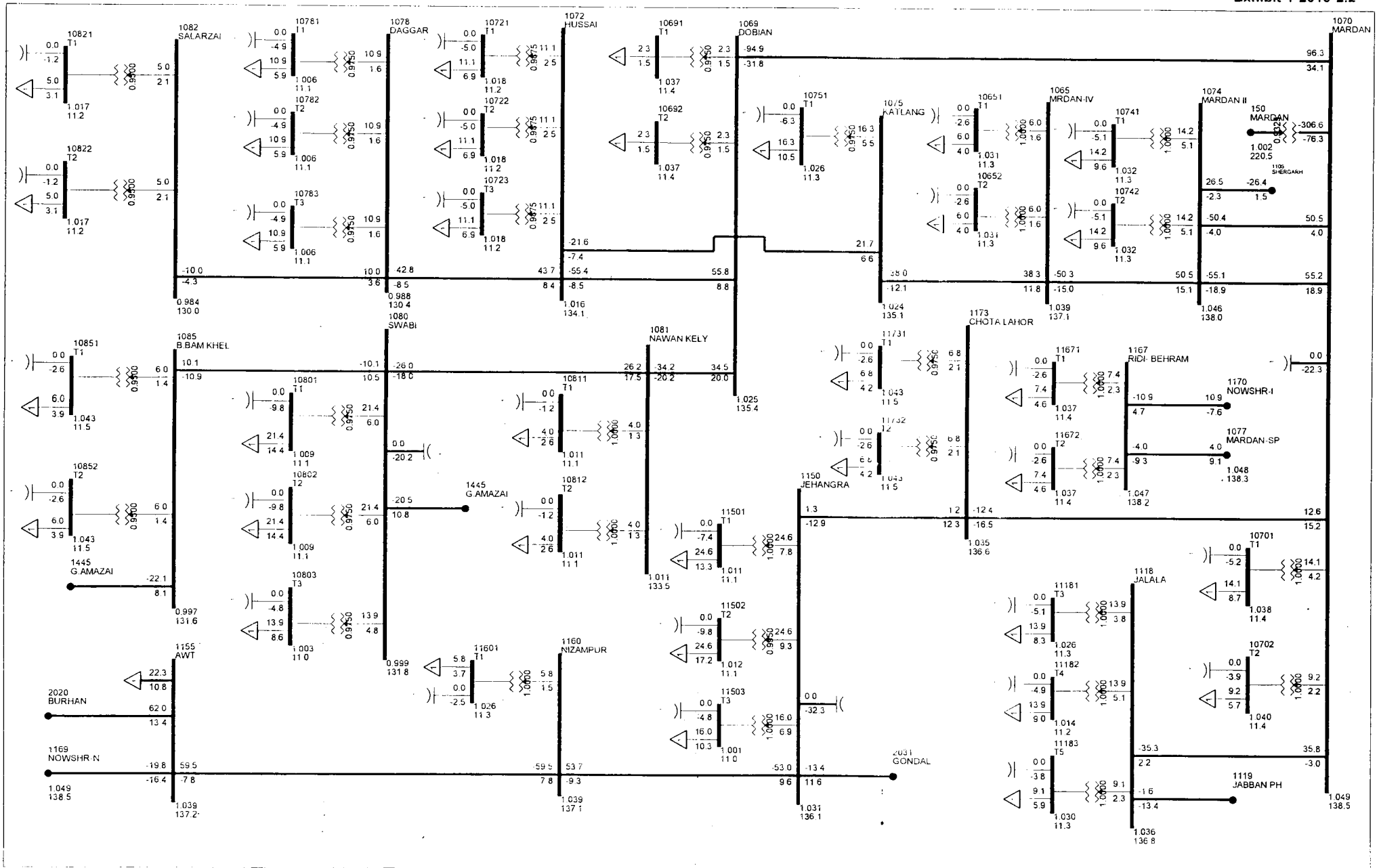
INTERCHANGE-		FROM	TO	LOAD	TO		-NET		
TO TIES	DESIRED	GENE-	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA + LOADS	--X NET INT	RATION	TO AREA	SHUNT	DEVICES	SHUNT CHARGING	LOSSES	LINES	
1 -2871.7	844.3 0.0	3641.6	0.0	0.0	0.0	0.0	74.4	-2907.9	
PESCO -907.9	111.1	2198.2	-1716.5	0.0	0.0	254.6	791.9	-946.7	
COLUMN -2871.7	844.3 0.0	3641.6	0.0	0.0	0.0	0.0	74.4	-2907.9	
TOTALS -907.9	111.1	2198.2	-1716.5	0.0	0.0	254.6	791.9	-946.7	

Exhibit-1-2019-2.1



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE WITH REINFORCEMENT

Exhibit-1-2019-2.2



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE WITH REINFORCEMENT

Exhibit-1-2019-1.3

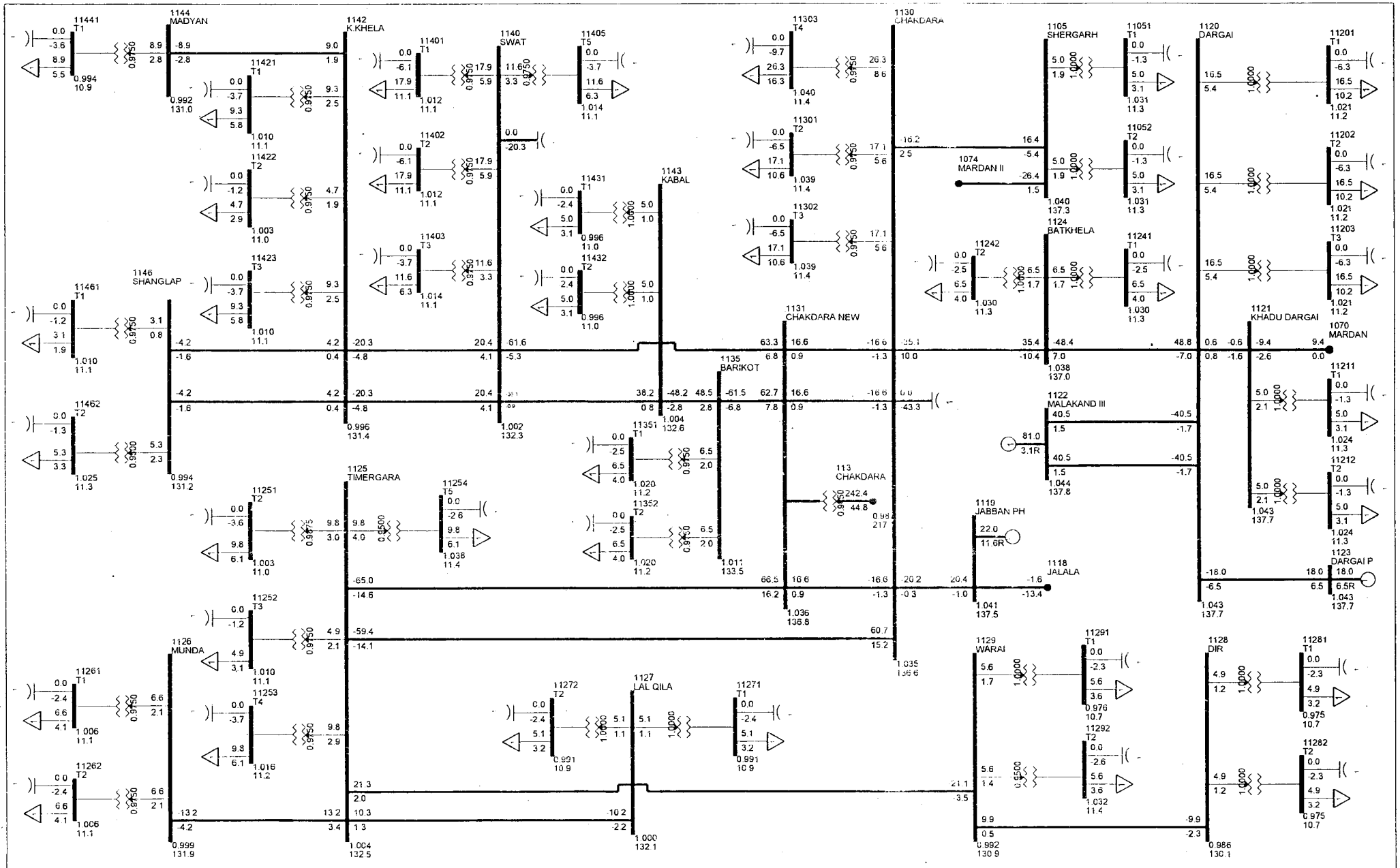
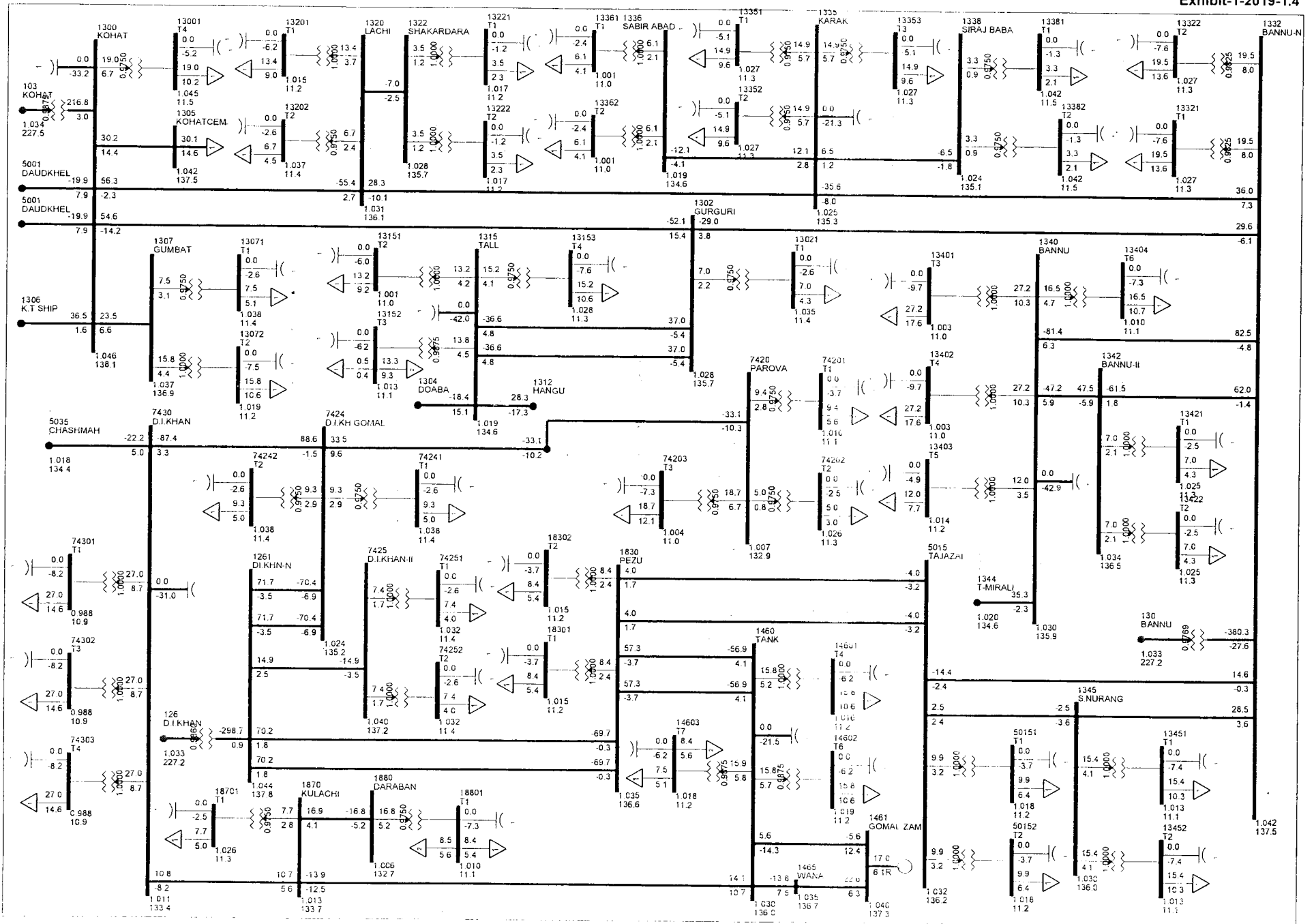


Exhibit-1-2019-1.4



PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2019: BASE CASE WITH REINFORCEMENT

Exhibit-1-2019-1.5

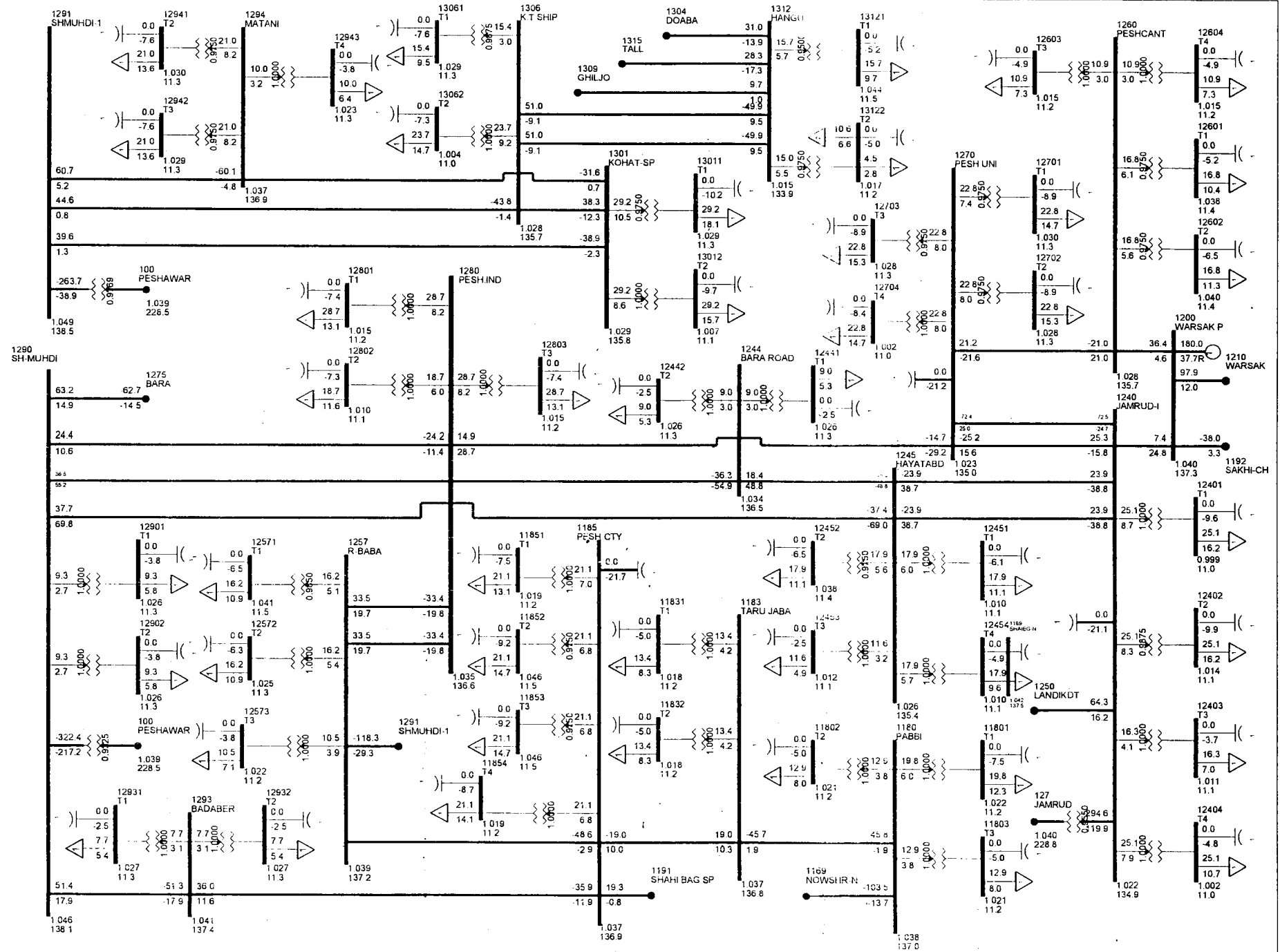


Exhibit-1-2019-1.6

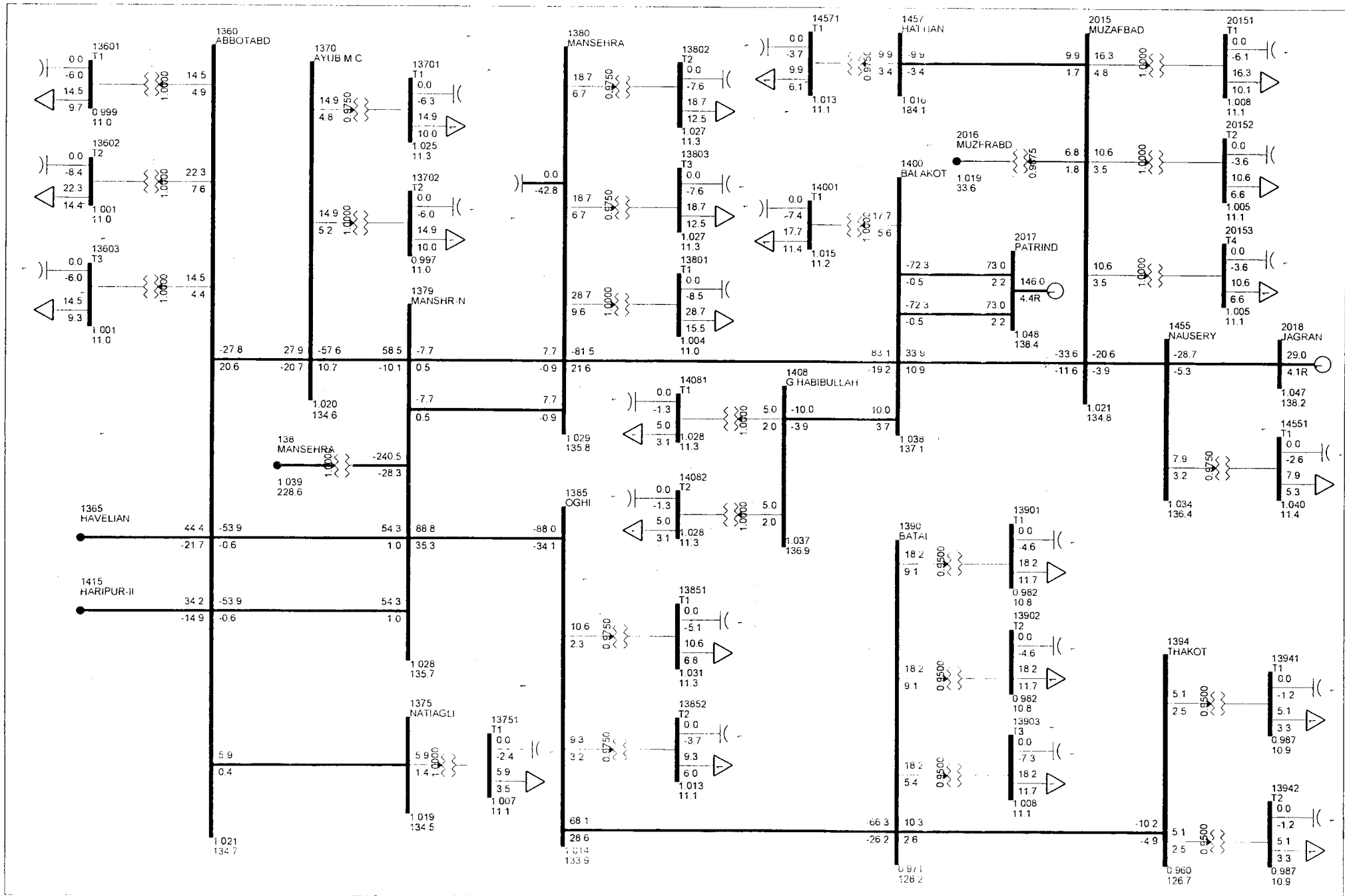


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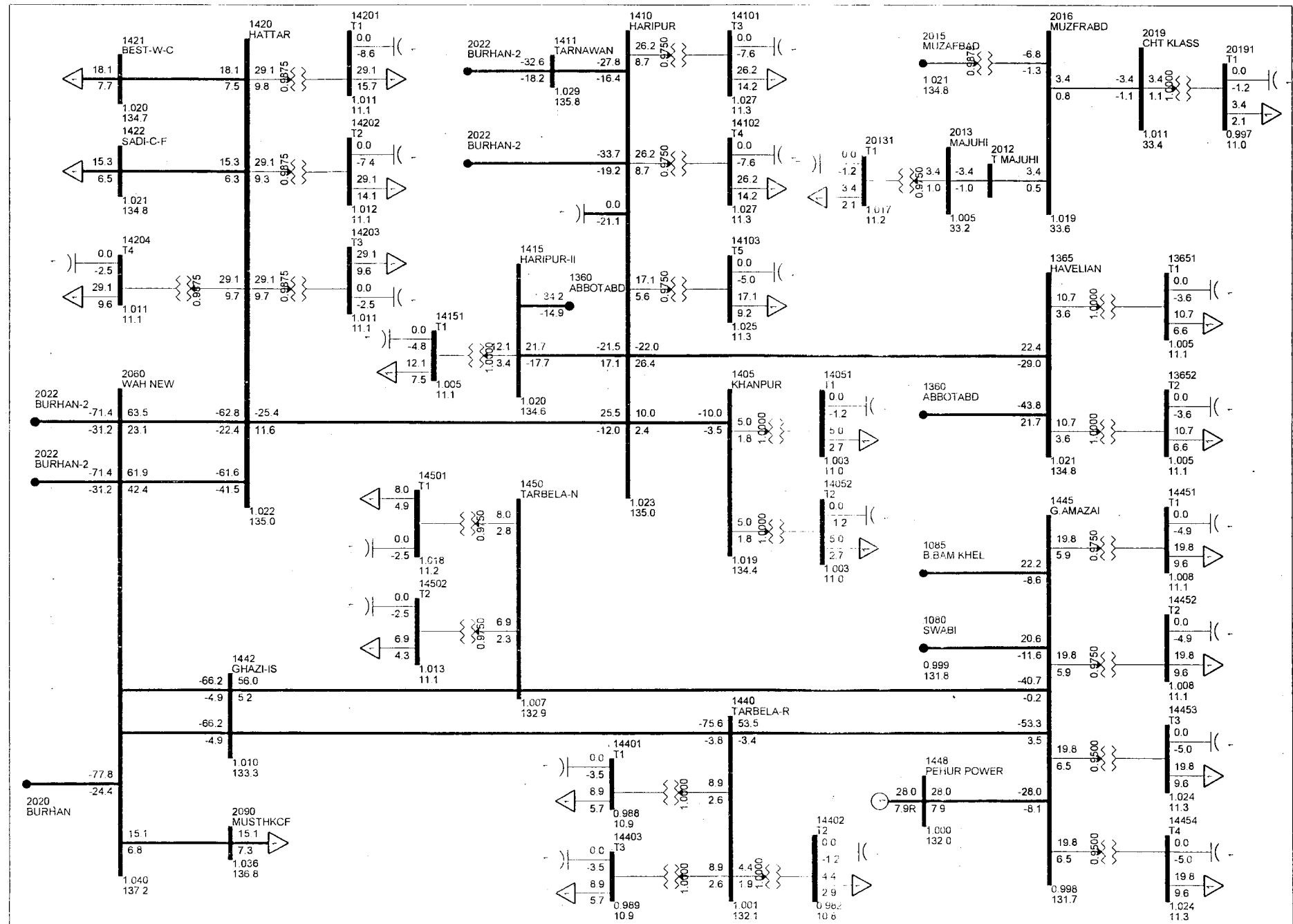
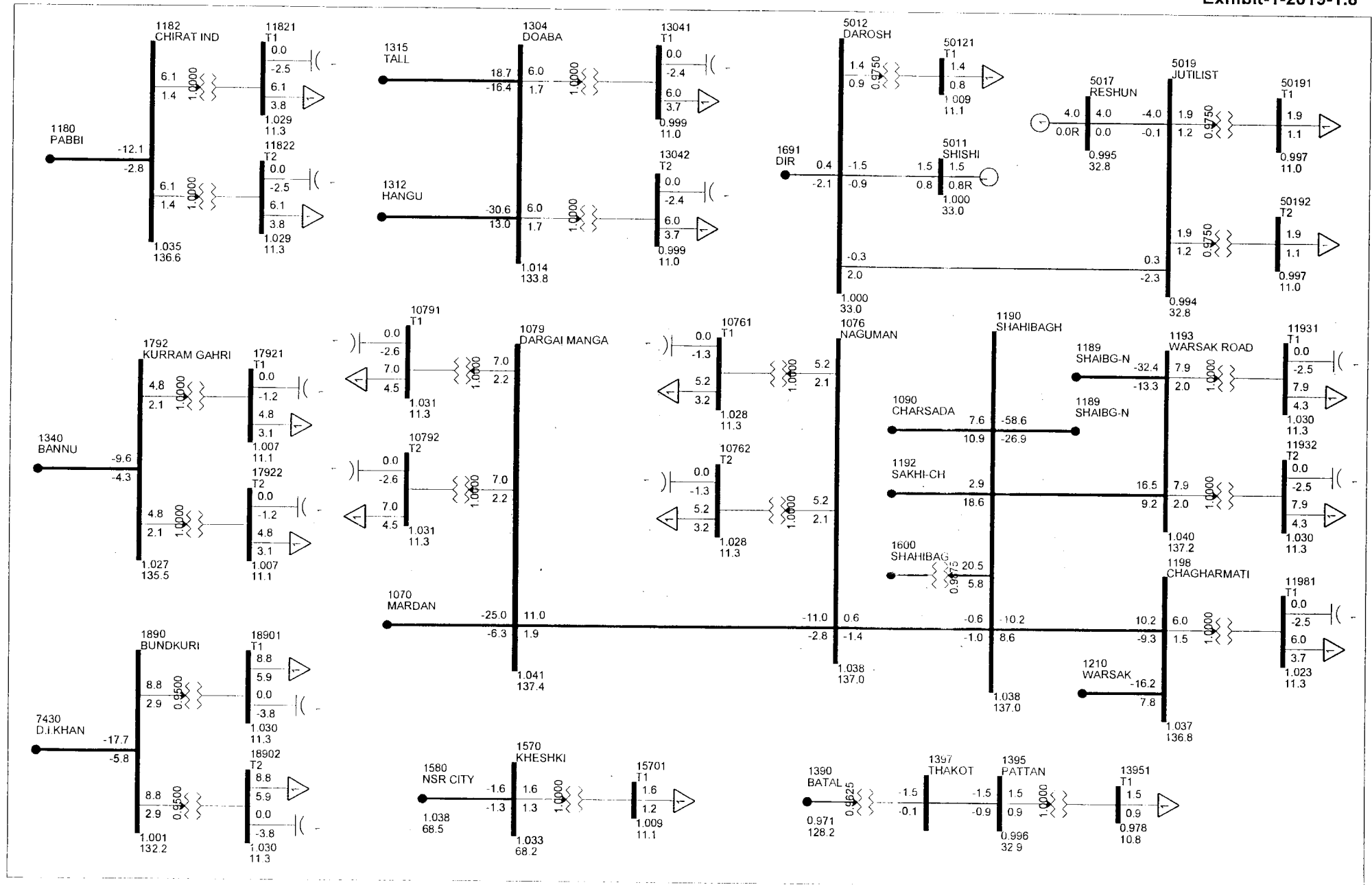


Exhibit-1-2019-1.8



PESCO IGTD 2019 with R losses

PTI INTERACTIVE POWER SYSTEM SIMULATOR--PSS®E

WED, JUN 22 2014 10:13

PESCO LOAD FLOW STUDY FOR (IGTD) FIVE YEAR PLAN

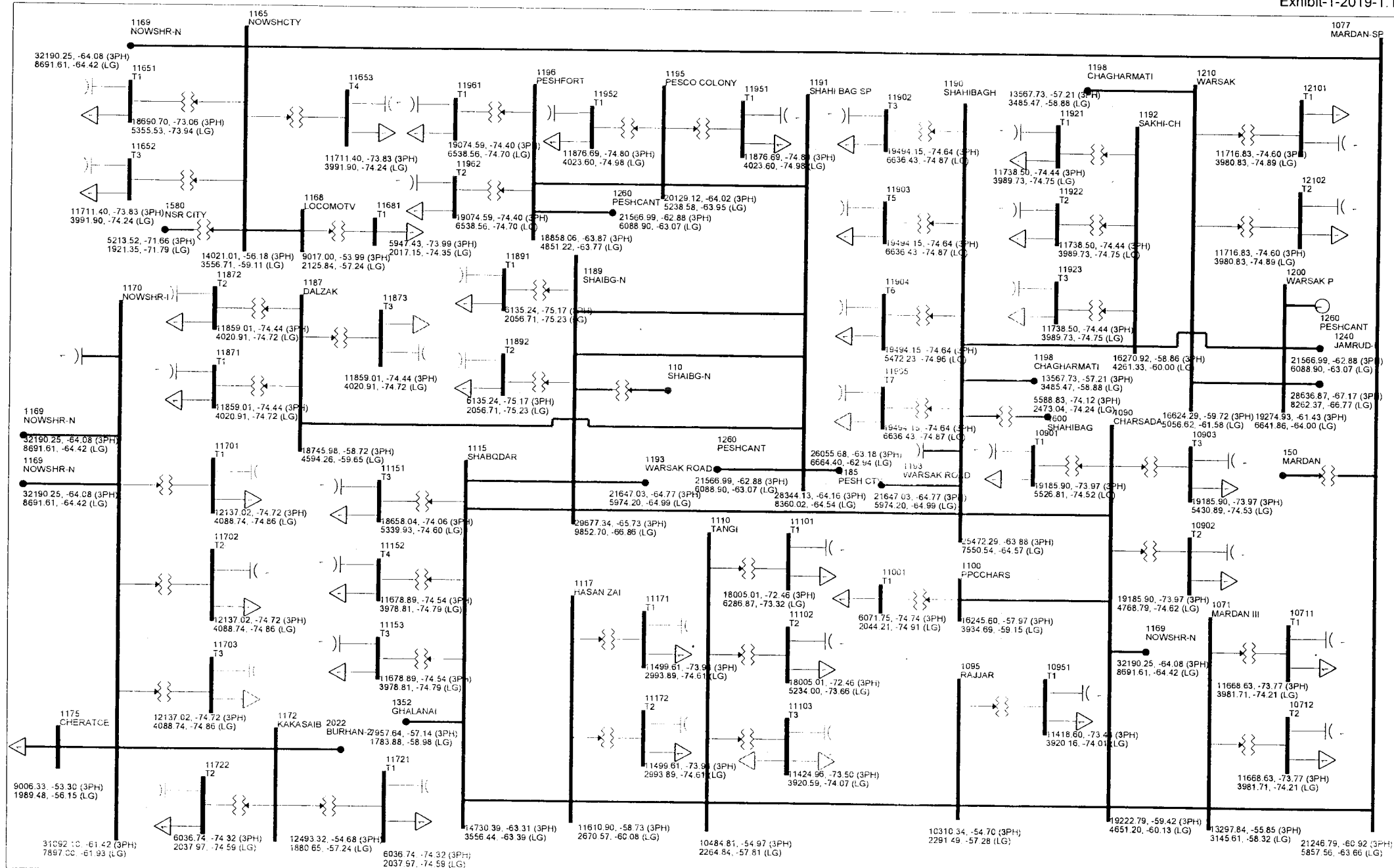
AREA TOTALS

YEAR 2019: BASE CASE WITH REINFORCEMENT

IN MW/MVAR

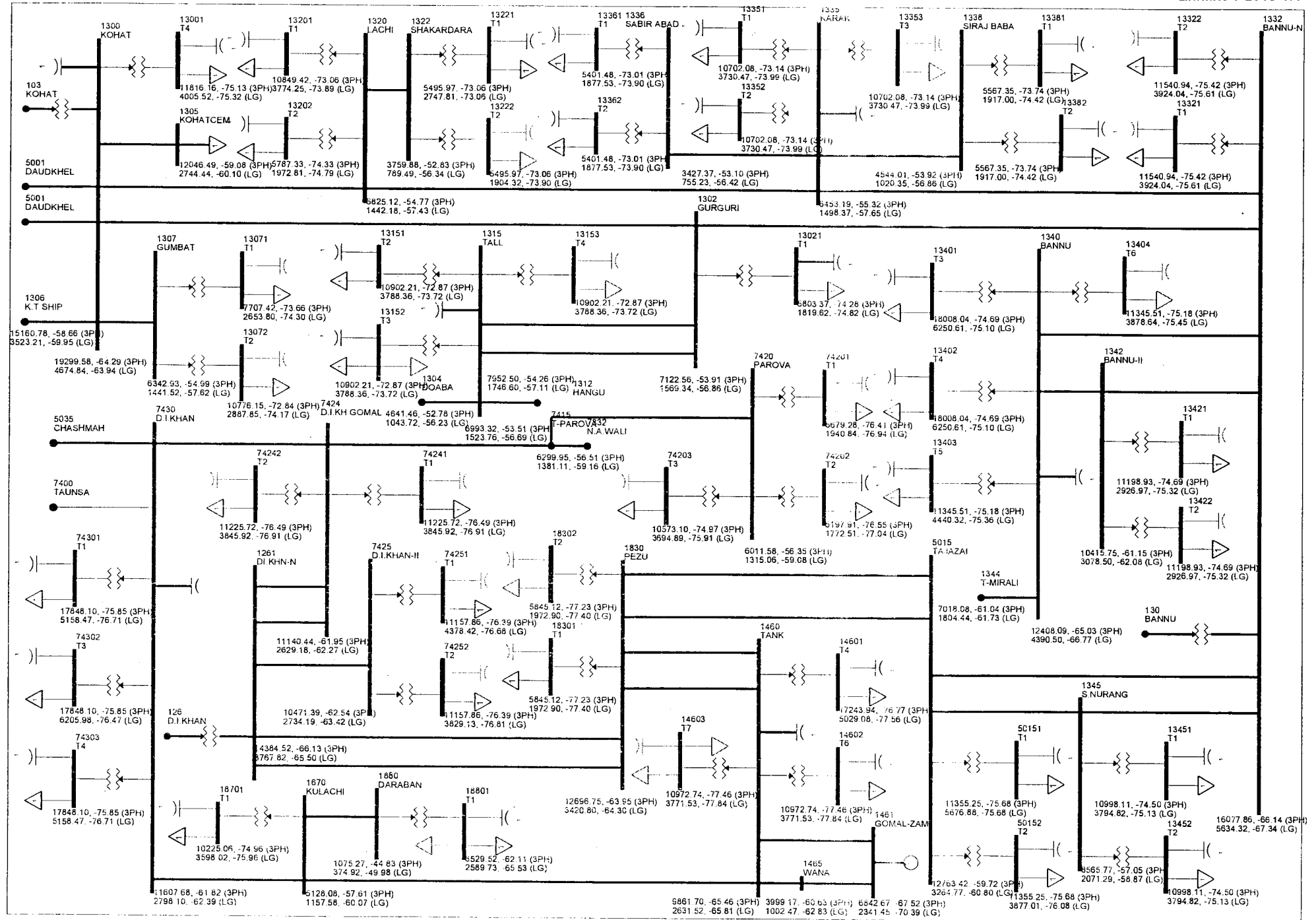
INTERCHANGE-	FROM	TO LOAD	TO					-NET
TO TIES	GENE- DESIRED	ASSIGNED	TO BUS	GNE BUS	TO LINE	FROM	TO	TO TIE
X-- AREA + LOADS	--X NET INT	RATION TO AREA	SHUNT	DEVICES	SHUNT	CHARGING	LOSSES	LINES
1 -2864.7	844.3 0.0	3641.6	0.0	0.0	0.0	0.0	67.4	-2897.4
PESCO -779.4	112.0	2199.2	-1793.4	0.0	0.0	270.3	755.9	-815.8
COLUMN -2864.7	844.3 0.0	3641.6	0.0	0.0	0.0	0.0	67.4	-2897.4
TOTALS -779.4	112.0	2199.2	-1793.4	0.0	0.0	270.3	755.9	-815.8

Exhibit-1-2019-1.1



YEAR 2018-19

Exhibit-1-2019-1.4



PESCO SHORT CIRCUIT STUDY FOR (IGTD) FIVE YEAR PLAN YEAR 2018-19

Exhibit-1-2019-1.8

