

## Distribution Transformer Failure

Format- 6(i)

URBAN

Company : Madhya Kshetra Vidyut Vitran Company Limited

Quarter

Sept. 2013.

Year-2013-14

Sl.No.	Circle	No of Transformers installed at the beginning of quarter	No of Transformers servicing predominantly agricultural consumers	Defective Trans. Start of quarter		Trans. Failed during the quarter (No)	Trans. Replaced/repaired during the quarter (No)	Defective Trans. at end of the quarter		Percentage of transformers replaced within 2 days
				No.	% of total			No. (5+7-8=9)	% of total	
1	2	3	4	5	6	7	8	9	10	11
1	Bhopal City	7652	37	11	0.14%	15	25	1	0.01	96.15
2	Bhopal (O&M)	1327	786	0	0.00%	89	89	0	0.00	100.00
3	Vidisha	684	56	0	0.00%	16	16	0	0.00	100.00
4	Sehore	367	5	0	0.00%	8	8	0	0.00	100.00
5	Rajgarh	669	50	0	0.00%	10	10	0	0.00	100.00
6	Hos'bad	1032	11	0	0.00%	9	9	0	0.00	100.00
7	Betul	610	68	0	0.00%	6	6	0	0.00	100.00
<b>Total Bpl Region</b>		<b>12341</b>	<b>1013</b>	<b>11</b>	<b>0.09%</b>	<b>153</b>	<b>163</b>	<b>1</b>	<b>0.01</b>	<b>99.39</b>
8	Gwalior City	4922	0	0	0.00%	75	75	0	0.00%	100.00%
9	Gwalior (O&M)	696	164	20	2.87%	35	36	19	2.73%	65.45%
10	Morena	2531	223	51	2.02%	75	76	50	1.98%	60.32%
11	Bhind	1726	185	36	2.21%	163	160	39	2.26%	80.40%
12	Guna	814	39	2	0.25%	11	12	1	0.12%	92.31%
13	Shivpuri	1014	113	147	14.50%	48	38	157	15.48%	19.49%
14	Sheopur	288	78	18	6.29%	3	3	18	6.25%	14.29%
<b>Total Gwl. Region</b>		<b>11991</b>	<b>802</b>	<b>274</b>	<b>2.33</b>	<b>410</b>	<b>400</b>	<b>284</b>	<b>2.37</b>	<b>58.48</b>
<b>Total CZ</b>		<b>24332</b>	<b>1815</b>	<b>285</b>	<b>1.17</b>	<b>563</b>	<b>563</b>	<b>285</b>	<b>1.17</b>	<b>66.39</b>

RURAL

Quarter

Mar-12

Year-2012-13

Sl.No.	Circle	No of Transformers installed at the beginning of quarter	No of Transformers servicing predominantly agricultural consumers	Defective Trans. Start of quarter		Trans. Failed during the quarter (No)	Trans. Replaced/repaired during the quarter (No)	Defective Trans. at end of the quarter		Percentage of transformers replaced within 2 days
				No.	% of total			No.	% of total	
1	Bhopal City	0	0	0	#DIV/0!	0	0	0	0	0.00
2	Bhopal (O&M)	13751	11218	37	0.27%	657	660	34	0.25	95.10
3	Vidisha	5984	5424	38	0.64%	296	304	30	0.50	91.02
4	Sehore	6332	5816	16	0.25%	275	260	31	0.49	89.35
5	Rajgarh	9947	7962	127	1.28%	497	447	177	1.78	71.63
6	Hos'bad	9814	7804	43	0.44%	424	409	58	0.59	87.58
7	Betul	6387	4432	22	0.34%	190	162	50	0.78	76.42
<b>Total Bpl Region</b>		<b>52215</b>	<b>42656</b>	<b>283</b>	<b>0.54%</b>	<b>2339</b>	<b>2242</b>	<b>380</b>	<b>0.73</b>	<b>85.51</b>
8	Gwalior City	0	0	0	0.00%	0	0	0	#DIV/0!	0.00%
9	Gwalior (O&M)	8561	6830	133	1.63%	464	428	169	1.97%	71.69%
10	Morena	10042	7978	26	0.28%	205	186	45	0.45%	80.52%
11	Bhind	7783	6136	53	0.69%	144	133	64	0.82%	67.51%
12	Guna	17243	11272	130	0.81%	607	494	243	1.41%	67.03%
13	Shivpuri	7506	6091	82	1.11%	201	179	104	1.39%	63.25%
14	Sheopur	6997	5948	79	1.14%	70	140	9	0.13%	93.96%
<b>Total Gwl. Region</b>		<b>58132</b>	<b>44255</b>	<b>503</b>	<b>0.90</b>	<b>1691</b>	<b>1560</b>	<b>634</b>	<b>1.09</b>	<b>71.10</b>
<b>Total CZ</b>		<b>110347</b>	<b>86911</b>	<b>786</b>	<b>0.71</b>	<b>4030</b>	<b>3802</b>	<b>1014</b>	<b>0.92</b>	<b>78.95</b>

## Distribution Transformer Failure Causes

Format-6(ii)

Quarterly: July2013. to Sep.2013 Year :2013-14

S.NO.	Causes of failure	Capacity									
		25 KVA		63 KVA		100 KVA		200 KVA		315 KVA	
		Installed	Failed	Installed	Failed	Installed	Failed	Installed	Failed	Installed	Failed
<b>Bhopal Region</b>											
1	Manufacturing Defect (WGP)		52		138		239		15		1
2	Manufacturing Defect (BGP)		0		0		5		1		0
3	Over loading		0		0		0		0		0
4	Interference by outsiders		0		0		0		1		0
5	Theft of parts, Oil etc.		4		4		14		1		0
6	Internal Fault		160		363		331		43		3
7	Cable Fault		4		92		88		3		0
8	Poor Insulation		0		9		14		4		0
9	Lightening		56		142		159		22		4
10	L.T.Line fault		9		31		7		1		0
11	1st Charging		14		44		50		0		0
12	Other Cause		46		118		110		22		2
13	Due to short Ckt.		7		31		26		2		0
	<b>Total</b>	<b>24688</b>	<b>352</b>	<b>16738</b>	<b>972</b>	<b>16723</b>	<b>1043</b>	<b>5501</b>	<b>115</b>	<b>906</b>	<b>10</b>
<b>Gwalior Region</b>											
1	Manufacturing Defect (WGP)		159		243		<b>273</b>		61		4
2	Manufacturing Defect (BGP)		0		0		<b>0</b>		0		0
3	Over loading		0		0		0		1		0
4	Interference by outsiders		0		2		3		0		0
5	Theft of parts, Oil etc.		87		25		19		2		0
6	Internal Fault		282		353		262		49		2
7	Cable Fault		8		37		28		9		0
8	Poor Insulation		4		11		19		11		0
9	Lightening		11		19		23		3		0
10	L.T.Line fault		3		21		8		1		0
11	1st Charging		4		31		21		2		0
12	Other Cause		0		0		0		0		0
13	Due to short Ckt.		0		0		0		0		0
	<b>Total</b>	<b>39180</b>	<b>558</b>	<b>17268</b>	<b>742</b>	<b>10134</b>	<b>656</b>	<b>3110</b>	<b>139</b>	<b>431</b>	<b>6</b>
<b>Central zone</b>											
1	Manufacturing Defect (WGP)	0	211	0	381	0		0	76	0	5
2	Manufacturing Defect (BGP)										
3	Over loading	0	0	0	0	0	239	0	1	0	0
4	Interference by outsiders	0	0	0	2	0	3	0	1	0	0
5	Theft of parts, Oil etc.	0	91	0	29	0	19	0	3	0	0
6	Internal Fault	0	442	0	716	0	276	0	92	0	5
7	Cable Fault	0	12	0	129	0	359	0	12	0	0
8	Poor Insulation	0	4	0	20	0	107	0	15	0	0
9	Lightening	0	67	0	161	0	37	0	25	0	4
10	L.T.Line fault	0	12	0	52	0	167	0	2	0	0
11	1st Charging	0	18	0	75	0	28	0	2	0	0
12	Other Cause	0	0	0	0	0	0	0	0	0	0
13	Due to short Ckt.	0	0	0	0	0	0	0	0	0	0
	<b>Total CZ</b>	<b>63868</b>	<b>910</b>	<b>34006</b>	<b>1714</b>	<b>26857</b>	<b>1699</b>	<b>8611</b>	<b>254</b>	<b>1337</b>	<b>16</b>

## Distribution Transformer Failure

Format- 6(i)

## URBAN

Company : Madhya Kshetra Vidyut Vitran Company Limited

Half Yearly

Sept. 2013.

Year-2013-14

Sl.No.	Circle	No of Transformers installed at the beginning of quarter	No of Transformers servicing predominantly agricultural consumers	Defective Trans. Start of quarter		Trans. Failed during the quarter (No)	Trans. Replaced/r epaired during the quarter (No)	Defective Trans. at end of the quarter		Percentage of transformers replaced within 2 days
				No.	% of total			No. (5+7-8=9)	% of total	
1	2	3	4	5	6	7	8	9	10	11
1	Bhopal City	7652	37	0	0.00%	41	40	1	0.01	97.56
2	Bhopal (O&M)	1327	786	0	0.00%	133	133	0	0.00	100.00
3	Vidisha	684	56	0	0.00%	23	23	0	0.00	100.00
4	Sehore	367	5	0	0.00%	14	14	0	0.00	100.00
5	Rajgarh	669	50	0	0.00%	15	15	0	0.00	100.00
6	Hos'bad	1032	11	0	0.00%	23	23	0	0.00	100.00
7	Betul	610	68	0	0.00%	7	7	0	0.00	100.00
<b>Total Bpl Region</b>		<b>12341</b>	<b>1013</b>	<b>0</b>	<b>0.00%</b>	<b>256</b>	<b>255</b>	<b>1</b>	<b>0.01</b>	<b>99.61</b>
8	Gwalior City	4800	0	0	0.00%	106	106	0	0.00%	100.00%
9	Gwalior (O&M)	696	164	19	2.11%	48	48	19	2.73%	71.64%
10	Morena	2531	223	49	1.94%	121	120	50	1.98%	70.59%
11	Bhind	1630	185	31	1.97%	275	267	39	2.39%	87.25%
12	Guna	814	39	1	0.13%	24	24	1	0.12%	96.00%
13	Shivpuri	1014	113	137	13.78%	80	60	157	15.48%	27.65%
14	Sheopur	286	78	18	8.65%	6	6	18	6.29%	25.00%
<b>Total Gwl. Region</b>		<b>11771</b>	<b>802</b>	<b>255</b>	<b>2.22</b>	<b>660</b>	<b>631</b>	<b>284</b>	<b>2.41</b>	<b>68.96</b>
<b>Total CZ</b>		<b>24112</b>	<b>1815</b>	<b>255</b>	<b>1.06</b>	<b>916</b>	<b>886</b>	<b>285</b>	<b>1.18</b>	<b>75.66</b>

## RURAL

Half Yearly

Sept.2013.

Year-2013-14

Sl.No.	Circle	No of Transformers installed at the	No of Transformers servicing	Defective Trans. Start		Trans. Failed during the quarter (No)	Trans. Replaced/r epaired	Defective Trans. at end		Percentage of transformers replaced
				No.	% of total			No.	% of total	
1	Bhopal City	0	0	0	#DIV/0!	0	0	0	0.00	0.00
2	Bhopal (O&M)	13751	11218	25	0.18%	911	902	34	0.25	96.37
3	Vidisha	5984	5424	14	0.23%	423	407	30	0.50	93.14
4	Sehore	6332	5816	19	0.30%	431	419	31	0.49	93.11
5	Rajgarh	9947	7962	104	1.05%	672	599	177	1.78	77.19
6	Hos'bad	9814	7804	24	0.24%	660	626	58	0.59	91.52
7	Betul	6387	4432	2	0.03%	306	258	50	0.78	83.77
<b>Total Bpl Region</b>		<b>52215</b>	<b>42656</b>	<b>188</b>	<b>0.36%</b>	<b>3403</b>	<b>3211</b>	<b>380</b>	<b>0.73</b>	<b>89.42</b>
8	Gwalior City	0	0	0	0.00%	0	0	0	0.00%	0.00%
9	Gwalior (O&M)	8183	6830	112	1.52%	705	648	169	2.07%	79.31%
10	Morena	9337	7978	9	0.10%	337	301	45	0.48%	86.99%
11	Bhind	7640	6136	40	0.57%	203	179	64	0.84%	73.66%
12	Guna	16128	11272	95	1.01%	769	621	243	1.51%	71.88%
13	Shivpuri	7355	6091	24	0.39%	337	257	104	1.41%	71.19%
14	Sheopur	6941	5948	40	0.60%	149	180	9	0.13%	95.24%
<b>Total Gwl. Region</b>		<b>55584</b>	<b>44255</b>	<b>320</b>	<b>0.73</b>	<b>2500</b>	<b>2186</b>	<b>634</b>	<b>1.14</b>	<b>77.52</b>
<b>Total CZ</b>		<b>107799</b>	<b>86911</b>	<b>508</b>	<b>0.47</b>	<b>5903</b>	<b>5397</b>	<b>1014</b>	<b>0.94</b>	<b>84.18</b>

## Distribution Transformer Failure Causes

Half Yearly: Apr2013. to Sep.2013 Year :2013-14

S.NO	Causes of failure	Capacity									
		25 KVA		63 KVA		100 KVA		200 KVA		315 KVA	
		Installed	Failed	Installed	Failed	Installed	Failed	Installed	Failed	Installed	Failed
<b>Bhopal Region</b>											
1	Manufacturing Defect (WGP)		85		193		319		23		1
2	Manufacturing Defect (BGP)		0		0		7		1		0
3	Over loading		0		0		0		1		0
4	Interference by out siders		0		0		0		1		0
5	Theft of parts, Oil etc.		5		4		16		1		0
6	Internal Fault		248		578		575		87		5
7	Cable Fault		4		109		104		3		0
8	Poor Insulation		1		24		22		7		0
9	Lightening		86		201		246		34		5
10	L.T.Line fault		14		38		15		2		0
11	1st Charging		15		45		62		0		0
12	Other Cause		51		132		123		32		3
13	Due to short Ckt.		16		49		61		5		0
	<b>Total</b>	<b>24688</b>	<b>525</b>	<b>16738</b>	<b>1373</b>	<b>16723</b>	<b>1550</b>	<b>5501</b>	<b>197</b>	<b>906</b>	<b>14</b>
<b>Gwalior Region</b>											
1	Manufacturing Defect (WGP)		255		343		<b>415</b>		92		7
2	Manufacturing Defect (BGP)		0		0		<b>0</b>		0		0
3	Over loading		0		0		0		1		0
4	Interference by out siders		0		4		10		0		0
5	Theft of parts, Oil etc.		93		39		28		5		0
6	Internal Fault		404		547		413		94		5
7	Cable Fault		20		55		37		13		2
8	Poor Insulation		10		23		22		12		1
9	Lightening		11		21		26		4		0
10	L.T.Line fault		10		44		18		2		0
11	1st Charging		5		39		28		2		0
12	Other Cause		0		0		0		0		0
13	Due to short Ckt.		0		0		0		0		0
	<b>Total</b>	<b>37840</b>	<b>808</b>	<b>16415</b>	<b>1115</b>	<b>9636</b>	<b>997</b>	<b>3044</b>	<b>225</b>	<b>420</b>	<b>15</b>
<b>Central zone</b>											
1	Manufacturing Defect (WGP)	0	340	0	536	0		0	115	0	8
2	Manufacturing Defect (BGP)										
3	Over loading	0	0	0	0	0	319	0	2	0	0
4	Interference by out siders	0	0	0	4	0	10	0	1	0	0
5	Theft of parts, Oil etc.	0	98	0	43	0	28	0	6	0	0
6	Internal Fault	0	652	0	1125	0	429	0	181	0	10
7	Cable Fault	0	24	0	164	0	612	0	16	0	2
8	Poor Insulation	0	11	0	47	0	126	0	19	0	1
9	Lightening	0	97	0	222	0	48	0	38	0	5
10	L.T.Line fault	0	24	0	82	0	264	0	4	0	0
11	1st Charging	0	20	0	84	0	43	0	2	0	0
12	Other Cause	0	0	0	0	0	0	0	0	0	0
13	Due to short Ckt.	0	0	0	0	0	0	0	0	0	0
	<b>Total CZ</b>	<b>62528</b>	<b>1333</b>	<b>33153</b>	<b>2488</b>	<b>26359</b>	<b>2547</b>	<b>8545</b>	<b>422</b>	<b>1326</b>	<b>29</b>