1	Q.	Re Section H, Tab 2, Wood Pole Line Management Program Progress
2		Report 2005 Inspection Program:
3		
4		(a) Re Page 3, "Update of 2005 Work", "The program is built on the
5		strategy of focusing on the older lines first and working towards newer lines".
6		How may lines with a "year in-service" older than (i) 1983 in Eastern Region,
7		(ii) 1981 in Central Region, (iii) 1987 in Western Region, (iv) 1983 in Northern
8		Region and (v) 1976 in Labrador Region remained uninspected at the
9		conclusion of the 2005 Work? Please identify the "year in-service" of such
10		uninspected lines.
11		(b) Re Page 5, "2006 Work Plans": How many lines with a "year in-
12		service" older than 1990 in Eastern Region will remain uninspected at the
13		conclusion of the 2005 Work? Please identify the "year in-service" of such
14		uninspected lines.
15		(c) Re Page 3, "Update of 2005 Work" and Page 5, "2006 Work Plans": It
16		is apparent that lines with considerably older "years in-service" than (i) 1983
17		in Eastern Region, (ii) 1981 in Central Region, and (iii) 1983 in Northern
18		Region were not inspected in the 2005 Work, but were left to the 2006 Work
19		Plans. Is this consistent with the professed strategy of focusing on older
20		lines? If there is no consistent strategy of focusing on older lines, what in
21		practice is the program inspection methodology?
22		(d) Re Page 4, "Update of 2005 Work" (cont.): If future inspection
23		requirements for the Eastern and Western Regions are able to be reduced
24		from 800 poles to 400 poles, without "any impact on the effectiveness of the
25		program", why is a commensurate reduction in poles to be inspected not
26		being proposed for other Regions?

Re Page 4, "Conclusions" "The budget estimate of \$2.6 M was

realized.": Is this reflective of the total cost of inspecting, testing, treatment,

27

28

				NETT 2007 Capital Dudget		
1		data	collection, material a	Page 2 of 7 and providing engineering support being \$300 per		
2		pole	inspected, as budge	ted at Page 63 of the report titled "Wood Pole Line		
3		Mana	agement Using RCM	Principles" filed with Hydro's 2005 Capital Budget		
4		Appli	ication under Section	G: Appendix 2?		
5		(f)	Re "Wood Pole Lir	Re "Wood Pole Line Management Using RCM Principles" filed with		
6		Hydr	o's 2005 Capital Bud	Iget Application under Section G: Appendix 2, Page		
7		68 "F	Recommendations":	Have all recommendations been followed? Please		
8		respo	ond outlining what st	eps have been taken to achieve each		
9		recor	mmendation.			
10		(g)	Re Inspection Rep	ort – TL201 – Please provide copies of the		
11		Inspe	ection Reports for ea	ch line inspected in the 2005 inspection year.		
12						
13						
14	A.	(a)	Eastern Region	TL 212 – 1966		
15			Central Region	TL 210 – 1969		
16				TL 223 – 1966		
17			Western Region	None		
18			Northern Region	TL 229 – 1976		
19				TL 239 – 1982		
20				TL 226 – 1970		
21				TL 227 – 1970 – reported as 67% complete,		
22				however 33% was replaced during upgrade in		
23				2002, and will not be inspected in this cycle.		
24			Labrador Region	None		
25						
26						
27		(b)	There are two lines	s in the Eastern Region with a year in service older		
28			than 1990 that do	not have complete inspection performed at the end		
29			of 2005. They are	TL 212 (1966), and TL 218 (1983)		

Page 3 of 7

(c) All lines were ranked based on three criteria; (1) age, (2) priority (radial or redundant), and (3) known problems. Lines greater than 30 years old were scheduled to be inspected no longer than 4 years into the program. Using this information, a newer radial line with known issues can take priority over an old redundant line with no problems. All lines were ranked, and a schedule was developed for each region according to what could be accomplished in each year.

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(d) The total pole count for the Eastern Region is only 3.676 poles. All old lines that have a history of major issues have been inspected (TL 201 and TL 203). Reducing the annual inspection quantity on the remaining lines will not have a major impact, as there is no known history of major problems on these lines. Similarly, in the Western Region (3,390 poles), all old lines that have a history of problems have been inspected, with only TL 250 (constructed in 1987) remaining. The only other region to which this reduction can be proposed is the Labrador Region, with 2,640 poles. Labrador has only one line, which does not have any known history of major issues. 792 poles have been scheduled for 2006, however this number may be reduced based on results obtained during the inspection, and applying the same philosophy as Eastern and Western Regions. Both Central and Northern Regions have 8,000 poles to be inspected in 10 years and must maintain 800 poles per year to finish the complete cycle, as no pole in any region should be left for more than 10 years without an inspection.

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(e) The budget cost of \$2.6 M includes inspection, testing, treatment, data collection, materials, and engineering support. \$300 per pole for inspection is still considered a good budget number. It should be noted

			NLH 2007 Capital Budget
1		that the	Page 4 of 7 cost of component replacement as required during the 2005 year
2			ncluded in the budget cost of \$2.6 M.
3		io alco ii	Totalda III tilo badgot ooot of \$2.0 m.
4	(f)	The follo	wing is an outline of the steps followed to achieve each
5	()		nendation as per "Wood Pole Line Management Using RCM
6			es". Each recommendation is listed as "R", and the steps taken
7		_	d as "S".
8			
9		R1	Implement the inspection, test and treatment program in 2005
10		and con	nplete the entire inspection, test and treatment program for
11		26,000	poles by 2013.
12		S1	The schedule is being followed with modifications as results
13		dictate f	following the philosophy as presented in the report. Timing to
14		complet	e 26,000 poles by 2013 is on schedule.
15			
16		R2	Repeat the program for the next 10 years, i.e. between 2014-
17		2023, to	investigate the benefit in the second year cycle (improved rate
18		of reject	tion in the second cycle) as per estimated data (Figs. 4.1 and 5.3)
19		and futu	re validation.
20		S2	Repeat of the program will commence in 2014.
21			
22		R3	Operations to carry out inspections of these poles on an annual
23		basis ar	nd to send this data to Engineering for further analysis in a timely
24		fashion.	Engineering will carry out the analysis and make the appropriate
25		recomm	endations to Operations for future refurbishment and/or pole
26		replacer	ment program under a capital budget proposal.
27		S3	Data analysis has been performed on the 2005 inspection

results, and has been passed on to Operations. The required

refurbishment work is scheduled to be performed this year.

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1	R4	If the analysis identifies that a large number of poles need to be			
2	replaced then a separate study should be undertaken considering full				
3	refurbishment and/or upgrading or even building a new line before a				
4	capital pr	capital program is launched.			
5	S4	To date, no separate study has been required for line			
6	replacem	ent.			
7					
8	R5	The program should be expanded to investigate other			
9	compone	nt inspection data closely e.g. knee braces, conductor,			
10	insulators	s, hardware to confirm that other components have a			
11	considera	able residual life left before any major pole replacement program			
12	is underta	aken.			
13	S5	Many tests have been performed at Memorial University. Knee			
14	brace tes	ts have been performed to compare visual condition with			
15	strength.	Conductor and insulator tension tests were performed on 35-			
16	year-old o	conductor to determine deterioration over time. Worn hardware,			
17	particular	ly ball link eye bolts were tension tested to compare wear			
18	amounts	with ultimate strength. The information gathered from these			
19	tests has	been incorporated into the analysis of new data.			
20					
21	R6	Data to be analyzed to develop a "Replacement Criteria" for			
22	Wood Po	le Lines based on a minimization of cost model as shown in Fig.			
23	1.1. Some	e initial work has been completed as part of this study and this			
24	should be	followed up further for validation of this model with additional			
25	field data				
26	S6	Engineering is currently working on a condition-based model,			
27	and the re	esults will be reported in the future.			

Page 6 of 7

It is noted that any cost model developed should include the 1 R7 2 cost of deferral of building new lines in the future. To accomplish this, 3 data must be collected to ensure that the rate of decay and the 4 preservative depletion rate can be correlated (Fig. 3.9). It is important to 5 know when treatment is no longer effective in life extension. 6 S7 Core samples are extracted from 10% of all poles tested, as well as any pole noted as having significant defects. This data has been 7 8 used for making decisions on pole ranking. 9 10 R8 In each year of this inspection program, a separate fund is 11 allocated to do routine testing of components including the in-service 12 wood poles of various ages to develop a long-term database. Hydro, in 13 collaboration with MUN, has developed special benches to do this type of 14 testing and this should be funded annually. 15 S8 Poles removed from service in 2005 were in poor condition, 16 and were considered unsuitable for testing. Due to the high number of 17 poles requiring replacement in 2005, no additional poles were extracted. 18 19 R9 Once the program is in place, all routine data analysis for the 20 current inspection year should be completed by the year-end with 21 appropriate recommendations made to justify replacement and/or 22 upgrading for the subsequent year. This will provide documentation of 23 the line inspected in a year and the various actions that have been taken 24 to provide remedial measures. To do this in a systematic manner, proper 25 resource allocation is needed and has been reflected in the CBP. 26 S9 Data from the 2005 inspection year has been tabulated and 27 analyzed. Recommendations have been made and passed on to 28 Operations. Work Orders were created, and the refurbishment has been 29

scheduled to be completed by year end.

		NETT 2007 Capital Budget
1		Page 7 of 7 R10 A working group be formed within Hydro's TRO division, which
2		should include representatives from Engineering, Operations, and
3		System Planning. The primary role will be to review the annual
4		Engineering report on the inspection results and make appropriate
5		recommendations.
6		S10 A formal working group has not been formed, however
7		discussions regarding the inspection data are held on an as required
8		basis between the three groups.
9		
10	Α	(g) See attached.

<u>Inspection Report – TL 201</u>

Report Coverage: 2005 inspection year Report Issued April 19, 2006

General Line Description:

- Construction Type: Wood Pole H-Frame
- Operating Line Voltage: 230kV
- Geographic Location: Western Avalon Substation (Chapel Arm) to Hardwoods Substation (St. John's)
- Year of Construction: 1966
- Line Length: 80.6km
- Basic Line Loading, Original Design:
 - o 1" Radial Glaze
 - o 110MPh Gust Wind
 - o 0.5" Ice / 55MPh Wind

Construction Summary:

- Total Wood Poles: 811
- Pole Size: CL2 (85%), CL4 (15%)
- Suspension: 85%
- Angles and Deadends: 15%

- Species (based on inspection data)
 - o Douglas Fir 36%
 - o Southern Pine 32%
 - Western Red Cedar 32%

Pole Length Breakdown (Percent):

30'	50'	55'	60'	65'	70'	75'	80'
0.5%	7%	18%	18%	27%	18%	11%	0.5%

Past Performance:

- Significant Line Failures:
 - 1984 Section from Structure 115 to Structure 151 collapsed under estimated 50mm glaze ice and 50kph wind
 - o 1994 Collapse of 7 structure just outside Western Avalon station
- Line Upgrades:
 - o 1988 Sections of the line were upgrades to 3" radial glaze ice by the addition of mid span structures, and reconductoring using 795ACSR
 - 1994 Replacement of the section that collapsed was upgraded using 1192 ACSR 54/19 conductor
- Previous Inspections:
 - Standard preventive maintenance inspections (20% annually) until 2002. No major pole replacements. Many worn eyebolts on suspension structures replaced. COB insulator periodically replaced.
 - 1985 Entire line inspected. No poles rejected, signs of decay and poor pole preservative retention noted. No retreatment applied.
 - 1998 Entire line inspected. 45 poles rejected and replaced in 1998. Preservative levels very low. No retreatment applied.
 - o 2003/2004 597 poles inspected. 9 poles replaced in spring 2006.

Current Inspection (covered by this report)

- 214 poles (26% of total) inspected Note: Line inspection now complete
- 64 poles (8.2%) recorded as possible rejections by field crew
- 27 poles (3.5%) scheduled for replacement after analysis
- Major pole issue: rot at pole tops and groundline
- Minor pole issues: some carpenter ants and woodpeckers
- 99 poles after 2006 replacement program (including 62 from 2003/2004 inspection) will require periodic monitoring
- Eyebolt wear on suspension structures continues to be an issue
- Preservative retention: average 0.08pcf (minimum required 0.18pcf)

Future Work

- 2006
 - Replace 27 poles, remaining COB insulators, and other noted defects in 2006 using existing WPLM CJC
 - Scheduled inspection complete 0
- After 2005
 - Periodically monitor 99 poles, numerous other wood items, and eye bolts Schedule next major inspection for 2014

TL 201

Str	Suf.	Recommended Action				
Su	Sul.	Required	Monitor	No Action		
213	0	Replace 1 COB insulator, centre phase				
215	0	Replace 1 COB insulator, right phase				
216	0	Replace 1 COB insulator, centre phase	Guy wires and grips noted as "other" with no description			
217	0	Replace all ball link eye bolts – work flush				
		Replace left pole, rated 4, internal decay (4), 2" shell bottom				
		brace				
		Replace right pole, rated 3, internal decay (3), 4" shell, 2"				
210		cavity at knee braces				
218	0	Replace left pole, rated 4, carpenter ants (3), internal decay (4), 4" cavity bottom brace and butt				
219	0	Repair right phase for 2 broken strands				
220	0	Replace right pole, rated 4, external decay (4), internal decay				
220	0	(3), shell separation (4), "shelly, not good to climb"				
221	0	(3), shell separation (4), shelly, not good to enino	Left pole, rated 2, checking (4)			
222	0	Replace right pole, rated 4, external decay (4), internal decay	Left pole, fated 2, effecting (4)			
		(3), shell separation (3)				
223	0	Remove old pole left on site				
224	0		Left pole, rated 2, shell separation (3)			
			Right pole, rated 3, internal decay – 6" shell, shell			
			separation (3)			
225	0		Left pole, not rated, rot pocket at bottom brace, 4" shell,			
			2" cavity			
226	0		Right pole, rated 2, shell separation (3)			
227	0	Reset torsional dampers				
		Replace 1 COB insulator, centre phase				
		Replace 1 COB insulator, right phase				
		Replace centre pole, rated 4, 3" shell, 3" cavity at crossarm,				
		shell separation (3), internal decay (4) Replace crossarm rated 3, checking, twisted, bowed				
229	0	Replace crossariii fateu 5, checking, twisteu, boweu	Left pole, rated 3, external decay (3), shell separation (3),			
227			not good for climbing			
231	0	Replace 1 COB insulator, left phase	not good for climbing			
1	1 0	1 COD Insulator, left place				

TL 201

C4	Conf	Recommended Action					
Str	Suf.	Required	Monitor	No Action			
232	0		Left pole, rated 3, external decay (3), shell separation (3) Right pole, rated 3, external decay (3), shell separation (3) Both poles weather beaten on side, not good for climbing				
234	0		Left pole, rated 3, shell separation (3), external decay (3), shelly, top leaning bad, not good for climbing				
235	0		Left pole, rated 3, shell separation (3), 2' bend, not good for working				
237	0		Right pole rated 3, external decay (3), shell separation (3), shelly, not good for climbing				
240	0	Replace 1 COB insulator, right phase Replace right pole, rated 4, 2" shell, 3" cavity at crossarm, internal decay (4)					
241	0		Right pole, rated 3, shell separation (3), external decay (3), shelly, not good for climbing				
242	0		Right pole, rated 3, shell separation (3)				
244	0		Right pole, rated 2, shell separation (4)				
245	0	Reset left and centre phase dampers ("can reach with boom")	Left pole, rated 3 Right pole, rated 3, internal decay (3), 1.5" shell noted, however no comment provided, assumed to be at top.				
249	0		Left and centre phase insulators not plumb				
250	0		Left pole, rated 2, external decay (3)				
251	0		Left pole, rated 3, shell separation (3) Right pole, rated 4, shell separation (4)				
253	0	Repair right phase for 1 broken strand	Right pole, rated 2, shell separation (3)				
254	0	Replace right pole, rated 4, 1.5 " shell noted with no location provided , external decay (3), shell separation (4)					
255	0		Insulators not plumb, all phases Left pole, rated 2, shell separation (3)				
256	0	Replace left pole, rated 4, 3-4" shell at bottom brace, internal decay (4)					

TL 201

Str	Suf.	Recommended Action					
Su	Sul.	Required	Monitor	No Action			
260	0	Replace 1 COB insulator, centre phase	Left pole, rated 3, shell separation (3), not good for				
			climbing				
			Right pole, rated 3, shell separation (3), not good for				
			climbing				
261	0	Replace left phase eye bolt, worn flush – reassess remaining eye bolts	Structure leaning to load				
262	0		Crossarm rated 3				
263	0	Replace all eye bolts, worn flush	Left pole, rated 2, internal decay (3)				
264	0		Left pole, rated 2, wood pecker holes (5)				
			Right pole, rated 3, shell separation (3)				
265	0		Left phase, 1 broken insulator				
266	0		Left pole, rated 3, shell separation (3)				
			Right pole, rated 3, shell separation (3), 1.5" cavity, top				
			brace				
268	0	Install inline guys, structure leaning to source					
270	0		Insulators not plumb, all phases				
271	0	Replace right pole, rated 4, internal decay (4), shell					
		separation (3), 2.5" shell, top x-brace					
		Replace right pole, rated 4, internal decay (4), shell					
		separation (3), 2" shell bottom x-brace					
272	0		Insulators not plumb, all phases				
273	0		Insulators not plumb, all phases				
277	0	Replace corroded preform, top left pole					
278	0	Left pole, RATED 2 , external decay (3), internal decay (3),					
		shell separation (4), "very shelly, cavity bottom brace, needs					
270		to be replaced"					
279	0		Left pole, rated 2, checking (3)				
281	0		Crossarm rated 3 (checking)				
			Left pole, rated 2, shell separation (3)				
			Right pole, rated 2, shell separation (3)				

TL 201

		Recommended Action Recommended Action				
Str	Suf.	Required	Monitor	No Action		
		1				
282	0	Replace all eye bolts, worn flush				
		Replace 1 COB insulator, right phase				
		Replace 5 COB insulator, centre phase				
283	0	Replace 21 COB insulator, left phase				
		Replace 22 COB insulator, centre phase				
		Replace 14 COB insulator, right phase				
284	0	Replace short crossarm, rated 4, rotten on end				
		Replace 15 COB insulator, left phase				
		Replace 12 COB insulator, centre phase				
		Replace 18 COB insulator, right phase				
284	1	Replace 20 COB insulator, left phase	Right pole, rated 2, wood pecker holes (3)			
		Replace 14 COB insulator, centre phase				
		Replace 23 COB insulator, right phase				
285	0	Replace left pole, rated 4, internal decay (4) 1.5" shell, no				
		location				
		Replace right pole, rated 4, internal decay (4) 1.5" shell, no				
		location				
		Structure leaning to source, correct during pole replacement				
286	0		Structure leaning to load			
			Left pole, rated 2, "1 inch hole at butt????"			
287	0		Structure leaning to load			
			Insulator plumbness not ok			
289	0	Reset left phase damper, moved				
		Replace 2 COB insulators, centre phase				
		Replace left pole, rated 4, carpenter ants, pole top rot				
291	0	Replace left pole, rated 4, internal decay (4), 2" shell, no				
		location, wood pecker holes (3), shell separation (3)				
292	0	Replace left pole, rated 4, 2-2.5" shell at butt, internal decay				
		(4), carpenter ants (3)				
		Replace right pole, rated 4, 1.5-2" shell at butt, internal				
		decay (4), carpenter ants (3), shell separation (4)				

TL 201

Str	Suf.	Recommended Action					
Su	Sul.	Required	Monitor	No Action			
294	0		Structure leaning to load Insulator plumbness not ok Left pole rated 3, shell separation (3), checking (3)				
295	0	Replace right pole, rated 4, carpenter ants (4), 2.5" shell, internal decay (3)	Right pole, rated 3, checking (3), wood pecker holes (3) Left pole, rated 3, shell separation (3), checking (3)				
296	0	Replace right pole, rated 4, carpenter ants, (4)					
298	0	Replace 1 COB insulator, centre phase Replace left pole, rated 4, carpenter ants (5), internal decay (4)					
299	0	Replace left pole, rated 4, 2.5" shell, no location, external decay (3), shell separation (5) Replace right pole, rated 4, carpenter ants (5), internal decay (4), 2-3" shell at groundline					
301	0	(1), 2 5 51411 W S 5 WHATHING	Right pole, rated 2, shell separation (3), checking (3)				
304	0	Replace 2 COB insulators, centre phase Replace 2 COB insulators, right phase Replace right pole, rated 4, wood pecker holes (3), carpenter ants (4), 1/5-2.5" shell, internal decay (4), "ants, lower brace"					
305	0	Replace left phase deadend, rated 5					
306	0	Replace crossarm, rated 4 Replace right phase suspension clamp Replumb insulators, all phases Replace 1 COB insulator, right phase Replace 1 broken insulator, centre phase Repair left phase for 1 broken strand Replace left pole, rated 4, carpenter ants (4), internal decay (4), 1.5" shell	Guy wires and grips noted as "other" with no description				
308	0	Replace left pole, rated 4, carpenter ants (4), 1.5" shell, internal decay (4), checking (3) Reassess right pole short knee brace rated 5 for other?					

TL 201

Str	Suf.	Recommended Action				
	Sul.	Required	Monitor	No Action		
309	0	Replace 1 COB insulator, left phase	Structure leaning to load			
310	0	Replace both crossbraces, rated 4 Replace rotten blocking	Left pole, rated 2, shell separation (3)			
311	0	Replace 2 COB insulators, centre phase				
312	0	Replace 1 COB insulators, centre phase Replace 7 COB insulators, right phase Replace left pole, rated 4, wood pecker holes (3), internal decay (4), 2" shell Replace right pole, rated 4, wood pecker holes (3), internal decay (4), 2" shell				

TL 210

VV I 1/1V	i mspcc		mmended Action Report	NLH 2007 CDA
Q.	G C	Recommended Action		
Str	Suf.	Required	Monitor	No Action
I _				
3	0		Crossbrace rated 3 (rot)	
3	0		Crossbrace rated 3 (checking)	
			Crossarm rated 3 (checking)	
5	0	Repair left phase for 1 broken strand		
		Repair centre phase for 1 broken strand		
6	0		Insulators not plumb	
7	0		Crossbrace rated 3 (checking)	
8	0	Repair centre phase for 1 broken strand		
1 ()		Repair right phase for 1 broken strand		
10	0		Crossarm rated 3 (checking)	
17	0	D-u17-9-11:1-4	Crossarm rated 3 (checking)	
20	0	Replace 7 flashed insulators, centre phase Replace 7 flashed insulators, right phase	Right pole, rated 3, shell separation (3 – 50')	
21	0		Left pole, rated 3, checking (3), 5" cavity, 3" shell	
			Right pole, rated 2, checking (3)	
22	0	Replace right pole, rated 4, 2-3" shell, internal decay (4)	Left pole, rated 2, checking (3)	
23	0		Right pole, rated 2, checking (3)	
24	0		Right pole, rated 3, checking (3)	
27	0	Install side guys on crew recommendation		
29	0		Right pole, rated 2, checking (3)	
33	0		Guy wires and grips noted as "other" with no description	l
			Left pole, rated 2, checking (3)	
			Right pole, rated 2, checking (3)	
35	0	Comment – "left pole in for replacement already", however		
		no record indicates that pole is bad.		
36	0	Provide photos or orientation/description of damage, left		
		pole, rated 3, "split through top down below arm"		
38	0		Left pole, rated 3, shell separation (3 – 60')	
43	0		Guy wires and grips noted as "other" with no description	<u> </u>
44	0	Install 2 guy guards		
46	0		Guy wires and grips noted as "other" with no description Right pole, rated 3, checking (3)	L

TL 210 WPLM Recommended Action Report

			Recommended Action Report Recommended Action		
Str	Suf.			INI- A 4	
		Required	Monitor	No Action	
17	Τ.		T 0 1 (12 1 11 (2 50))		
47	0		Left pole, rated 2, shell separation (3 – 50')		
40			Right pole, rated 2, shell separation (3 – 50')		
48	0		Right pole, rated 3, carpenter ants (3), 3" shell		
49	0	Reassess right pole, rated 4, no defects recorded	Left pole, rated 3, carpenter ants (3), shell 3-4" 3 feet up		
			from ground		
50	0		Guy wires and grips noted as "other" with no description		
51	0	Replace nut on centre DA assembly ("nut off")	Right pole, rated 3, carpenter ants (3)		
53	0	Replace 3 COB insulators, right phase	Crossarms, rated 3 and 4, checks (4), rot (3)		
			Centre pole, rated 3, shell separation (3 – 50')		
54	0	Tighten double arm plates			
55	0	Tighten double arm brackets, all phases	Left pole, rated 2, checking (3)		
			Right pole, rated 3, carpenter ants (3), checking (3)		
58	0		Right pole, rated 3, shell separation $(3 - 50)$, checking		
			(3)		
59	0		Left pole, rated 2, checking (3)		
			Right pole, rated 2, checking (3)		
60	0	Tighten double arm brackets, all phases			
61	0		Left pole, rated 2, checking (3)		
62	0		Right pole, rated 2, shell separation (3)		
64	0		Right pole rated 2, internal decay (3)		
65	0		Left pole, rated 2, 3-7" shell, checking (3)		
70	0		Left pole, rated 3, shell separation (3 – 35'), external		
			decay (3)		
			Centre pole, rated 3, shell separation $(3-35)$, external		
			decay (3)		
			Right pole, rated 3, shell separation $(3 - 35)$, external		
			decay (3)		
71	0	Install inline guys, structure and insulators not plumb			
		Repair right phase for 1 broken strand			
L	L	1 1 9 1			

TL 210 WPLM Recommended Action Report

			mmended Action	
Str	Suf.	Required	Monitor	No Action
		required	Wollton	1 to 7 tetion
72	0		Left pole, rated 2, shell separation (3 – 35'), external	
			decay (3)	
			Right pole, rated 2, shell separation $(3 - 35)$, external	
			decay (3)	
73	0		Left pole, rated 2, 7 wood pecker holes, 2-3" deep	
74	0	Replace crossarm, rated 5	Left pole, rated 2, 3-4" shell, internal decay (2)??	
80	0	Tighten loose crossbrace bolts	Right pole, rated 2, checking (3)	
		Tighten double arm assembly		
		Repair centre phase for 2 broken strands		
81	0		Right pole, rated 2, carpenter ants (3), 3" shell, internal	
			decay (3)	
82	0	Tighten double arm assemblies, all phases	Crossarm rated 3 (other)	
83	0	Replace source side crossbrace	Structure leaning to source	
			Left pole, rated 3, carpenter ants (3), 2-5" shell	
84	0	Tighten crossbrace centre bolt		
85	0	Tighten double arm assembly bolts, all phases	Centre phase insulator string flashed	
86	0	Replace left pole, rated 5, carpenter ants (5), ½" shell		
		Replace centre pole, rated 5, carpenter ants (5), ½" shell		
88	0	Replace right pole, rated 5, however, no description was		
		provided, and the individual pole condition rankings give		
		a good, solid pole		
89	0		Left pole, rated 2, external decay (3)	
			Right pole, rated 2, external decay (3)	
90	0	Replace left pole, rated 5, wood pecker holes (5), 1" shell,	Crossbrace rated 3 (checks and cracks)	
		internal decay (5), external decay (4), shell separation (4)		
		Replace right pole, rated 5, wood pecker holes (5), 0.5"-1"		
		shell, internal decay (5), external decay (4), shell separation		
		(4)		
91	0		Left pole, rated 2, shell separation (3)	
92	0		Left pole, rated 2, checking (3)	
			Crossbrace rated 3 (cracks)	
93	0		Right pole, rated 2, checking (3)	

TL 210

Q,	G C		ommended Action	
Str	Suf.	Required	Monitor	No Action
94	0		Left pole, rated 2, checking (3)	
95	0	Replace crossarm, rated 5	Left pole, rated 2, checking (3)	
96	0	Replace left pole, rated 4, carpenter ants (4), 1.0-1.5" shell, internal decay (4)		
		Replace right pole, rated 4, carpenter ants (4), 1.5-2.5" shell, internal decay (3)		
97	0		Left pole, rated 2, checking (3)	
98	0		Left pole, rated 2, checking (3)	
			Right pole, rated 2, 4-5" shell	
99	0	Replace right pole, rated 4, carpenter ants (5), 1-3" shell,		
		internal decay (5), external decay (3), checking (3)		
100	0	Install anti-split bolt, right pole, rated 2, split in top	Left pole, rated 2, shell separation (3 – 10')	
101	0	Replace left phase damper	Left pole, rated 2, external decay (3), shell separation (3	
			-55°)	
			Right pole, rated 2, external decay (3), shell separation (3 – 55')	
102	0	Tighten double arm plates, all phases	Left phase flashed	
105	0	Repair right phase for 1 broken strand		
106	0	Tighten double arm plates, all phases		
107	0	Tighten crossbrace centre bolt		
108	0	Replace 7 flashed insulators, left phase		
109	0		Centre pole, rated 2, carpenter ants (3), internal decay (3)	
110	0	Comment "no x-brace" (???Was there supposed to be???")		
111	0	Replace left phase double arm assembly nut (missing)	Right pole, rated 2, external decay (2)	
117	0	Replace right pole, rated 4, carpenter ants (4), 2-5" shell		
118	0		Left pole, rated 2, carpenter ants (3)	
121	0		Left pole, rated 2, checking (3)	
			Right pole, rated 2, checking (3)	
123	0		Structure leaning left	
			Insulators not plumb	
			Right pole, rated 2, external decay (3)	

TL 210

	Suf.		mmended Action Report mmended Action	
Str		Required	Monitor	No Action
124	0	Repair left phase for 1 broken strand		
		Repair centre phase for 1 broken strand		
		Install 2 guy guards		
125	0		Right pole, rated 2, shell separation (3 – 50')	
126	0		Right pole, rated 2, checking (3)	
127	0	Tighten centre bolt, cross brace		
129	0	Replace right pole, rated 4, 1.5-3" shell, checking (3),		
		carpenter ants (4)		
130	0		Left pole, rated 2, external decay (3)	
			Right pole, rated 3, external decay (3), shell separation	
			(4)	
133	0		Left pole, rated 2, shell separation (3 – 65')	
			Right pole, rated 2, shell separation (3 – 65')	
135	0	Tighten double arm plates		
136	0		Left pole, rated 3, no reason provided	
138	0		Left pole, rated 2, shell separation (3 – 15')	
139	0	Install 1 guy guard		
140	0	Replace right pole, rated 4, 1-2" shell, carpenter ants (5)		
141	0		Right pole, rated 2, wood pecker holes (5), checking (3)	
142	0	Replace crossarm, rated 4		
144	0	Install 5 guy guards		
145	0		Right pole, rated 2, shell separation (3)	
146	0	Replace right pole, rated 4, internal decay (4), 1" shell		
148	0		Left pole rated 2, shell separation (3 – 30')	
			Right pole rated 3, shell separation $(5-50^{\circ})$	
150	0		Right pole, rated 2, checking (3)	
151	0		Right pole, rated 2, checking (3 – 70')	
152	0	Replace left pole, rated 4, however, no description was		
		provided, and the individual pole condition rankings give		
		a good, solid pole		
153	0		Right pole, rated 2, shell separation (3)	
154	0		Right pole, rated 2, shell separation (3)	

TL 210

Str	Suf.	Recommended Action		
Sur	Sul.	Required	Monitor	No Action
155	0	Replace left pole, rated 4, 2-3" shell, internal decay (4)		
		Replace right pole, rated 4, 0.5-1" shell, internal decay (5)		
157	0	Replace missing nut, double arm plate		
159	0		Left pole, rated 2, shell separation (3 – 50')	
162	0	Tighten left phase insulator hardware	Crossarm rated 3, split	
		Replace missing centre phase nut		
163	0	Replace missing crossbrace nut		
164	0	Install inline guys, structure leaning to source	Crossarm rated 3	
		Repair left phase for 2 broken strands		
165	0		Left pole, rated 3, external decay (3), shell separation (4	
			[-65')	
4			Right pole, rated 2, shell separation (3 – 65')	
166	0		Right pole, rated 2, wood pecker holes (5)	
167	0	Replace missing bolt, right phase double arm assembly		
171	0		Left pole, rated 2, internal decay (3)	
			Right pole, rated 2, internal decay (3), shell separation	
			(3) - (50)	
150			Cross brace has pieces splitting off	
172	0		Left pole, rated 3, internal decay (4), shell separation (5)	
			-(60°)	
			Right pole, rated 3, internal decay (4), shell separation	
173	0		(5) – (60'), checking (4) Left pole, rated 2, shell separation (3 – 55')	
1/3	U		Right pole, rated 2, shell separation (3 – 55')	
174	0	Install 6 guy guards	Right pole, rated 2, shell separation (4 – 60°)	
175	0	Install 4 guy guards	Left pole, rated 2, wood pecker holes (3), shell separation	
1/3	0	instan 4 guy guarus	Left pole, rated 2, wood pecker noies (3), shell separation $(4-60)$	
			Right pole, rated 2, shell separation $(3-60^{\circ})$	
176	0	Replace right pole, rated 4, 2-2.5" shell, internal decay (3),	Right poic, fatcu 2, shell separation (5 – 00)	
1/0		checking (3)		
177	0	Oncorning (3)	Right pole, rated 2, wood pecker holes (5)	
± / /	1 2		Trisite pore, rated 2, wood pecker notes (3)	

TL 210

			nmended Action Report	
Str	Suf.	Recommended Action		
Su	Sul.	Required	Monitor	No Action
150	Τ			
179	0		Centre phase insulators flashed	
			Left pole, rated 2, shell separation (3)	
100			Right pole, rated 2, shell separation (3)	
180	0		Left pole, rated 2, shell separation (4 – 50')	
			Right pole, rated 2, shell separation (4 – 50')	
181	0	Install 6 guy guards		
183	0	Replace right pole, rated 5, carpenter ants (3), 0.5" shell, internal decay (5)		
184	0		Left pole, rated 2, checking (3)	
			Right pole, rated 3, carpenter ants (3), 4" shell, internal	
			decay (3)	
185	0	Replace right pole, rated 5, 0.5" shell, internal decay (5)	Left pole, rated 2, checking (3)	
186	0	Tighten double arm assembly		
187	0		Left pole, rated 2, checking (3)	
			Right pole, rated 2, checking (3)	
188	0	Replace crossbrace, rated 4 (rot)	Left pole, rated 2, checking (4)	
		Replace right pole, rated 4, carpenter ants (5)1-1.5" shell,		
		internal decay (4)		
189	0	Replace left pole, rated 4, carpenter ants (5), 1.5-2.5" shell,		
		internal decay (5)		
		Replace right pole, rated 3, carpenter ants (4), 3-4" shell,		
		internal decay (3)		
190	0	Reassess right pole rated 2, carpenter ants (5), pole indicated		
		as solid with severe ant infestation?		
191	0	Replace left pole, rated 4, carpenter ants (5), 3" shell,		
		internal decay (3)		
192	0		Right pole, rated 2, shell separation $(3 - 50)$	
193	0		Left pole, rated 2, internal decay (3)	
			Right pole, rated 2, internal decay (3)	
195	0		Left pole, rated 2, internal decay (3)	
			Right pole, rated 2, internal decay (3)	

G ₄	Str Suf. Recommended Action			
Str	Sui.	Required	Monitor	No Action
196	0	Install 10 guy guards	Left pole, rated 2, internal decay (3)	
		Reassess earth anchors, rated good, but 14 indicated as	Centre pole, rated 2, internal decay (3)	
		requiring replacement	Right pole, rated 2, internal decay (3), shell separation (3 – 50'), checking (3)	
198	0	Replace left pole, rated 4, carpenter ants (5), 2-3" shell, checking (3)	Right pole, rated 2, checking (3)	
199	0		Left pole, rated 2, checking (3)	
			Right pole, rated 2, checking (3)	
200	0	Replace left pole, rated 4, carpenter ants (4), 2-4" shell, checking (3)	Crossarm rated 3 (checking)	
201	0	Tighten slack guys to replumb structure		
202	0		Structure leaning to load	
			Left pole, rated 2, checking (3)	
205	0	Install inline guys, structure leaning to load		
207	0	Replace right pole, rated4, carpenter ants (4), 2-3" shell	Left pole, rated 2, checking (3)	
209	0	Tighten loose bolt, bottom brace		
210	0		Right pole, rated 2, external decay (3)	
211	0	Replace centre pole, rated 4, carpenter ants (5), 1.5-3" shell, internal decay (5)		
212	0	Replace right pole, rated 4, carpenter ants (5), 2-4" shell,		
		internal decay (5), checking (3)		
214	0	Install 8 guy guards		
		Replace left pole, rated 5, carpenter ants (5), 1-1.5" shell,		
		internal decay (3)		
215	0	Install inline guys, structure leaning to load	Left pole, rated 2, external decay (3), shell separation (4 – 50°)	
			Right pole, rated 2, internal decay (4), recorded as solid?	
216	0	Install 6 guy guards		
219	0		Left pole, rated 3, internal decay (3)	
220	0		Right pole, rated 2, carpenter ants (3)	

C4	Suf.	Recommended Action		
Str	Sui.	Required	Monitor	No Action
88	0		Left pole, rated 3, shell sep	
			Right pole, rated 3	
89	0	Replace blocking, rated 5	Guy grips and wires marked "other"? No comments	
90	0		Guy grips and wires marked "other"? No comments	
91	0	Replace blocking, rated 4 Replace left pole, rated 4, carpenter ants, internal decay	Guy grips and wires marked "other"? No comments	
92	0		Guy grips and wires marked "other"? No comments	
93	0		Guy grips and wires marked "other"? No comments	
95	0		Crossbraces rated 3 – checking	
			Blocking rated 3	
96	0	Replace blocking, rated 4		
97	0	Replace blocking, rated 4		
98	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
			Left pole rated 3, external decay	
99	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
			Left pole rated 3, WP holes	
			Right pole rated 3, WP holes	
100	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
			Right pole rated 3, WP holes	
101	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
			Left pole rated 3, WP holes	
			Right pole rated 3, WP holes	
102	0		Blocking rated 3	
			Guy grips and wires marked "other"? No comments	
			Left pole rated 2, shell separation (3) and external decay	7
			(3)	
103	0	Replace blocking, rated 4		
104	0	Replace blocking, rated 4		
105	0	Replace blocking, rated 4		
106	0	Replace blocking, rated 4		
107	0	Replace blocking, rated 4		
108	0		Guy grips and wires marked "other"? No comments	

Str	Suf.	Recommended Action		
Su	Sul.	Required	Monitor	No Action
109	0		Guy grips and wires marked "other"? No comments Blocking rated 3 Crossbrace rated 3 - cracks	
111	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
112	0	<i>y</i>	Guy grips and wires marked "other"? No comments Blocking rated 3	
113	0		Guy grips and wires marked "other"? No comments Blocking rated 3 Kneebrace rated 3 – checking	
114	0	Replace blocking, rated 4 Centre pole, rated 2, Carpenter Ants (4), Wood Pecker holes (4) and internal decay (4) – re-evaluate pole?	Guy grips and wires marked "other"? No comments	
115	0	Replace blocking, rated 4	Guy grips and wires marked "other"? No comments	
123	0	Replace blocking, rated 4	Crossarm – checking (3) and cracks (3) – "dry cracks, still solid"	
124	0		Blocking rated 3 Right pole, rated 2, external decay (3) and shell separation (3)	
125	0		Blocking rated 3 Left pole rated 2, shell sep (4), external decay (4), "not good to climb" Right pole rated 2, shell sep (4), external decay (4), "not good to climb"	
126	0	Replace blocking, rated 4	Structure leaning to source Crossbrace rated 2 – comment "starting to rot"	
127	0	Replace blocking, rated 4		
135	0	Replace blocking, rated 4	Left pole, rated 2, checking (3)	
139	0	Tighten slack guy wires	Centre pole, rated 2, shell separation (3) Right pole, rated 2, shell separation (3)	

Q,	C C		mmended Action	
Str	Suf.	Required	Monitor	No Action
140	0		Left pole, rated 3, shell separation (4), checking (3), "big	
			cracks top to bottom"	
			Centre pole, rated 3, shell separation (4), checking (3),	
			"big cracks top to bottom"	
			Right pole, rated 3, shell separation (4), checking (3),	
			"big cracks top to bottom"	
141	0		Structure leaning to load	
			Left pole, rated 3, shell separation (3), external decay (3)	
147	0	Replace right pole, rated 4, 2" shell		
		Tighten slack guys on left pole		
148	0	Replace crossbraces, rated 4	Crossarm rated 3 (cracks)	
			Right pole, rated 3, 20' shell separation	
150	0		Left pole, rated 3, shell separation (4), "climbing hazard"	
			Centre pole, rated 3, shell separation (4), "climbing	
			hazard"	
			Right pole, rated 3, shell separation (4), "climbing	
			hazard"	
151	0	Replace left pole, rated 4, 2" shell, 5" cavity at top x-brace		
152	0	Replace right pole, rated 4, checking (3), shell separation (4),		
		"extremely shelly, dangerous to climb"		
163	0		Left pole, rated 3, shell separation (4)	
			Right pole, rated 3, shell separation (3)	
			Crossarm rated 4, "2-3 years"	
165	0		Left pole, rated 3, internal decay (4), rot pocket at bottom	
			x-brace	
167	0		Left pole, rated 2, shell separation (3) – (50')	
171	0		Left pole, rated 3, 2-3" shell 2' below knee braces	
177	0	Tighten slack guy wires	Right pole, rated 3, Carpenter Ants (3), 3-4" shell	
184	0		Blocking rated 3	
			Right pole, rated 2, shell separation (3)	

TL 218

Str	Suf.	Reco	ommended Action	
Su	Sul.	Required	Monitor	No Action
192	0	Many miscellaneous problems, assess in field and make corrections as required. Pole does not qualify for change. Crew comments recorded "left pole overhead guy grip very rusty, strands broke, jumper connector on guy rusted and burned, should be changed a.s.a.p. also conductor jumper burned, pitted, 3strands broke. no thimbles on over head guys, left and right poles. left pole leaning a lot on top".	Left pole, rated 3, checking (3)	

TL 223

WPLM Recommended Action Report Recommended Action

Str	Suf.		ommended Action	T
- Su	Jui.	Required	Monitor	No Action
		There are many crossarm problems on this line. Only those		
		rated 4 or 5 are recommended for replacement		
2	0		Crossarm rated 3	
3	0		Crossarm rated 3	
			Left pole, rated 3, no reason	
4	0		Crossarm rated 3	
5	0		Crossarm rated 3	
6	0	Replace right pole, rated 4, shell separation Replace crossarm, rated 3		
7	0		Crossarm rated 3	
9	0		Crossarm rated 3	
10	0	Replace Crossarm rated 4		
11	0		Crossarm rated 3	
13	0		Crossarm rated 3	
14	0		Crossarm rated 3	
16	0	Replace Crossarm rated 4		
17	0	•	Crossarm rated 3	
19	0	Replace Crossarm rated 4		
20	0	Replace Crossarm rated 4	Left pole, rated 3, no reason	
21	0		Lrft pole, rated 2, checking (3)	
22	0	Replace Crossarm rated 4		
23	0	Replace Crossarm rated 4		
25	0		Crossarm rated 3	
26	0	Replace Crossarm rated 4	Right pole, rated 3, checking (3)	
27	0	Replace Crossarm rated 4	Right pole, rated 2, checking (3)	
28	0		Crossarm rated 3	
29	0	Replace Crossarm rated 4		
		Structure leaning, install side guys		
30	0	<u> </u>	Crossarm rated 3	
31	0		Crossarm rated 3	
34	0		Right pole, rated 3, external decay (3), checking (3)	
46	0		Right pole, rated 3, no reason	
47	0	Remove 10-15 danger trees on each side of right of way	The state of the s	
48	0	Remove numerous danger trees on both sides of ROW		

TL 223

WPLM Recommended Action Report Recommended Action

Str	Suf.	Re	ecommended Action	
Su	Sul.	Required	Monitor No Actio	No Action
49	0	Remove numerous danger trees on both sides of ROW	Left pole, rated 2, checking (4)	
			Right pole, rated 2, checking (3)	
50	0	Remove numerous danger trees on both sides of ROW		
51	0	Remove numerous danger trees on both sides of ROW		
52	0	Remove numerous danger trees on both sides of ROW		
53	0	Remove numerous danger trees on both sides of ROW		
54	0	Remove numerous danger trees on both sides of ROW		
55	0	Remove numerous danger trees on both sides of ROW		
61	0	Replace crossarm rated 4	Right pole, rated 3, no reason	
62	0		Crossarm rated 3 (checks)	
63	0		Crossarm rated 3	
64	0	Remove numerous danger trees on both sides of ROW		
65	0	Remove numerous danger trees on both sides of ROW	Crossarm rated 3	
67	0	Remove numerous danger trees on both sides of ROW	Crossarm rated 3	
68	0	Remove numerous danger trees on both sides of ROW		
69	0	Remove numerous danger trees on both sides of ROW	Crossarm rated 3	
70	0	Remove numerous danger trees on both sides of ROW	Crossarm rated 3	
71	0		Crossarm rated 3	
72	0		Crossarm rated 3	
74	0	Remove numerous danger trees on both sides of ROW		
75	0	Remove numerous danger trees on both sides of ROW		
76	0	Remove numerous danger trees on both sides of ROW		
77	0	Remove numerous danger trees on both sides of ROW		
78	0	Remove numerous danger trees on both sides of ROW		
79	0	Remove numerous danger trees on both sides of ROW		
80	0	Remove numerous danger trees on both sides of ROW		
81	0	Remove numerous danger trees on both sides of ROW		
84	0	Install guys, structure not plumb		
90	0		Crossarm rated 3	
91	0		Crossarm rated 3	
92	0		Crossarm rated 3	
93	0		Crossarm rated 3	
94	0		Crossarm rated 3	

TL 223

Str Suf. Required Monitor	No Action
96 0 Crossarm rated 3 97 0 Crossarm rated 3 98 0 Crossarm rated 3 101 0 Crossarm rated 3 102 0 Crossarm rated 3 103 0 Crossarm rated 3 104 0 Crossarm rated 3 105 0 Crossarm rated 3 106 0 Crossarm rated 3 107 0 Crossarm rated 3 108 0 Crossarm rated 3 109 0 Crossarm rated 3 110 0 Crossarm rated 3 111 0 Crossarm rated 3 112 0 Crossarm rated 3 112 0 Crossarm rated 3	
96 0 Crossarm rated 3 97 0 Crossarm rated 3 98 0 Crossarm rated 3 101 0 Crossarm rated 3 102 0 Crossarm rated 3 103 0 Crossarm rated 3 104 0 Crossarm rated 3 105 0 Crossarm rated 3 106 0 Crossarm rated 3 107 0 Crossarm rated 3 108 0 Crossarm rated 3 109 0 Crossarm rated 3 110 0 Crossarm rated 3 111 0 Crossarm rated 3 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
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103 0 Crossarm rated 3 104 0 Crossarm rated 3 105 0 Crossarm rated 3 106 0 Crossarm rated 3 107 0 Crossarm rated 3 108 0 Crossarm rated 3 109 0 Crossarm rated 3 110 0 Crossarm rated 3 111 0 Crossarm rated 3 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
Conductor wear (3) 104 0 Crossarm rated 3 105 0 Crossarm rated 3 106 0 Crossarm rated 3 107 0 Crossarm rated 3 108 0 Crossarm rated 3 109 0 Crossarm rated 3 110 0 Crossarm rated 3 110 0 Crossarm rated 3 111 0 Crossarm rated 3 112 0 Crossarm rated 3 Crossarm rated 3 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 112 0 Crossarm rated 3 Cro	
104 0 105 0 106 0 107 0 108 0 109 0 110 0 111 0 112 0 Crossarm rated 3	
105 0 106 0 107 0 108 0 109 0 110 0 111 0 112 0 Crossarm rated 3	
106 0 107 0 108 0 109 0 110 0 111 0 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
107 0 108 0 109 0 110 0 111 0 112 0 Crossarm rated 3	
108 0 109 0 110 0 111 0 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
109 0 110 0 111 0 111 0 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
110 0 111 0 112 0 Crossarm rated 3 Crossarm rated 3 Crossarm rated 3	
111 0 112 0 Crossarm rated 3 Crossarm rated 3	
112 0 Crossarm rated 3	
Crossarm rated 3	
114 0 Crossarm rated 3	
115 0 Replace left phase suspension clamp Crossarm rated 3	
Reassess left pole, rated 2, carpenter ants rated as 5, however	
pole is recorded as solid?	
116 0 Crossarm rated 3	
119 0 Crossarm rated 3	
123 0 Replace 1 insulator, centre phase	
125 0 Replace Crossarm rated 4	
Reassess right pole, rated 2, carpenter ants rated as 5,	
however pole is recorded as solid?	
126 0 Replace Crossarm rated 4 Structure leaning to source	
Right pole, rated 3, no reason	
Left pole, rated 3, no reason	
128 0 Crossarm rated 3	
129 0 Crossarm rated 3	

TL 226

Str	Suf.		Recommended Action	
Su	Sul.	Required	Monitor	No Action
		226-1		
11	0	Replace 15 COB Insulators, left phase		
		Replace 14 COB Insulators, centre phase		
		Replace 12 COB Insulators, right phase		
12	0		Pole, rated 2, wood pecker holes (5)	
24	0	Replace 16 COB Insulators, left phase		
		Replace 16 COB Insulators, centre phase		
		Replace 12 COB Insulators, right phase		
27	0	Replace 16 COB Insulators, left phase		
		Replace 16 COB Insulators, centre phase		
		Replace 16 COB Insulators, right phase		
		226.2		
1		226-2		
1	0	Install 7 guy guards	Structure leaning to source Crossarm rated 3	
3	0	Repair centre phase for 1 broken strand	Crossarm rated 3	
6	0	Install 1 guy guard		
12	0			
14	0	Tighten centre phase insulator Install 1 guy guard		
17	0			
18	0	Install 1 guy guard Install 6 guy guards		
19	0			
24	0	Install 1 guy guard	Character at already	
32	0	Repair centre phase for 2 broken strands	Crossarm not plumb	
34	0	Install 6 guy guards		
34	U	mstan o guy guarus		
		226		
17	0	Install 1 guy guard		
		Tighten slack guys		
18	0	Install 6 guy guards		
		1 > 5 7 7 5 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7		

	1	Recommended Action Recommended Action		
Str	Suf.	Damina 1	Monitor	NT - A -4:
		Required	Monitor	No Action
10	To	Legal 1 any mond		
19	0	Install 1 guy guard		
173	0	Repair left phase for 2 broken strands	D 1 10 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	
194	0	Tighten slack guys	Pole, rated 2, check penetrates groundline	
40-		Remove new insulators on ground		
197	0	Remove new insulators on ground		
198	0	Remove new insulators on ground		
199	0	Remove old insulators on ground		
200	0	Remove new and old insulators on ground		
207	0	Repair centre phase for 1 broken strand		
209	0	Remove old insulators on ground		
215	0	Remove old insulators on ground		
227	0	Remove old insulators near structure		
235	0	Install 3 guy guards (walking access only)		
259	0	Tighten slack guys		
263	0	Repair right OHGW for 2 broken strands		
271	0	Repair centre phase for 1 broken strand		
273	0		Pole rated 2, shell separation (3)	
274	0	Replace left phase insulator, broken skirt		
291	0	Repair right phase for 1 broken strand		
293	0	Repair left phase for 2 broken strands		
298	0	Tighten all insulators	Structure leaning left	
		Tighten loose v-brace on crossarm		
303	0	Install 1 guy guard		
312	0	Repair right phase for 1 broken strand		
335	0	Replace left phase insulator suspension clamp		
336	0	Tighten centre phase insulator, loose on pin		

TL 227

	Recommended Action Recommended Action			
Str	Suf.	Required	Monitor	No Action
		Required	Monto	No Action
		Many structures on this line have submerged foundations. No recommendations are made, and they are not tabulated		
		here.		
		Many structures on this line have light to moderate vibration.		
		No recommendations are made at this time, and they are not tabulated here.		
3	0	Tighten loose top pin insulator, centre phase		
6	0		Structure leaning to the right	
12	0	Install 1 guy guard		
14	0		Structure leaning to the left	
			Pole rated 2, wood pecker holes (5)	
15	0	Repair left phase for 1 broken strand	Structure leaning to source	
			Pole rated 2, wood pecker holes (5)	
17	0	Tighten loose top pin insulator, centre phase	Centre phase deadend rated 5, however this is an A	
			structure. Recorded in error?	
20	0	Repair left phase for 1 broken strand		
		Tighten loose top pin insulator, centre phase		
21	0	Repair centre phase for 1 broken strand		
22	0	Tighten loose top pin insulator, centre phase	Structure leaning to the right	
24	0	Repair right phase for 1 broken strand		
		Tighten loose top pin insulator, centre phase		
39	0	Install 1 guy guard		
83	0	Install 2 guy guards		
115	0	Tighten slack guys. Surface rust may mean they have to be replaced		
118	0	Reassess guy grips, report says damaged, however number to		
		replace is 0		
		Install 2 guy guards		
120	0	Install 2 guy guards		
132	0	Install 1 guy guard		
132	1	Install 1 guy guard		
140	0	Install 1 guy guard		

Chr	Cf		ommended Action	
Str	Suf.	Required	Monitor	No Action
141	0	Install 4 guy guards		
146	0	Install 2 guy guards		
146	1	Install 1 guy guard		
149	0	Install 3 guy guards		
149	1	Install 2 guy guards		
164	0	Install 2 guy guards		
225	0	Install 3 guy guards		
228	0	Install 2 guy guards		
229	0	Install 2 guy guards		
230	0	Install 2 guy guards		
231	0	Install 2 guy guards		
		Tighten slack guys		
234	0	Install 1 guy guard		
235	0	Install 3 guy guards		
243	0	Tighten all insulators		
246	0		Structure leaning to source	
252	0	Install 2 guy guards		
261	0		Structure leaning to left	
			Foundation comment – good, but needs repair?	
262	0		Structure leaning to left	
			Foundation comment – good but needs repair?	
267	0	Tighten guys		
		Tighten loose centre phase insulator		
274	0	Install 2 guy guards		
276	0	Install 2 guy guards		
277	0	Install 2 guy guards	Insulators not plumb	
281	0	Tighten slack guys		
285	0	Install 2 guy guards		
286	0	Install 2 guy guards		
287	0	Install 2 guy guards		
288	0	Install 2 guy guards		
289	0	Install 2 guy guards		

TL 227

WPLM Recommended Action Report							
Str	Suf.		Recommended Action				
Su	Bul.	Required	Monitor	No Action			
293	0	Replace right phase suspension clamp					
294	0		Crossarm rated 2, bad cracks				
295	0		Crossarm rated 3 (cracks)				
296	0	Install 2 guy guards					
297	0	Install 2 guy guards					
298	0	Install 2 guy guards	Structure leaning left				
300	0		Comment "pole leaning"				
306	0		Crossarm rated 2, split				
			Insulators not plumb				
308	0	Tighten left and right insulators					
312	0		Crossarm rated 3				
			Insulators not plumb				
333	0	Install 3 guy guards					
340	0	Install 5 guy guards					
349	0	Install 5 guy guards					
351	0	Install 2 guy guards					
357	0	Install 2 guy guards					
358	0	Install 3 guy guards					
359	0	Install 2 guy guards					
360	0	Install 2 guy guards					
361	0	Install 2 guy guards					
362	0	Install 2 guy guards					
364	0	Install 2 guy guards					
365	0	Install 2 guy guards					
366	0	Install 2 guy guards					
367	0	Tighten all insulators					
370	0	Replace crossarm, rated 4					
371	0	Install 2 guy guards					
372	0	Install 2 guy guards					
373	0	Install 2 guy guards					
376	0	Install 2 guy guards					
377	0	Install 2 guy guards					

Gu	C C	Recommended Action Recommended Action		
Str	Suf.	Required	Monitor	No Action
	1	•		1
378	0	Install 2 guy guards		
379	0	Install 2 guy guards		
380	0	Install 2 guy guards		
381	0	Install 2 guy guards		
382	0	Install 2 guy guards		
384	0	Install 2 guy guards		
387	0	Install 2 guy guards		
389	0	Install 2 guy guards		
390	0	Install 1 guy guard		
399	0	Tighten slack guys		
400	0	Tighten slack guys		
401	0	Tighten slack guys		
403	0		Crossarm rated 3	
405	0	Tighten centre phase insulator		
420	0	Tighten slack guys		
422	0	Install 3 guy guards		
423	0	Install 2 guy guards		
424	0	Install 4 guy guards		
460	0	Install 2 guy guards		
		Tighten slack guys		
466	0		Structure leaning left	
467	0	Tighten centre phase insulator		
474	0		Pole rated 2, shell separation (4)	
480	0		Pole rated 2, check penetrates groundline	
482	0	Tighten left and centre phase insulator		
483	0	Tighten centre phase insulator		
484	0	Install 2 guy guards		
487	0	Install 1 guy guard		
489	0		Insulators not plumb	
490	0	Install 1 guy guard		
491	0	Install 1 guy guard		
492	0	Tighten all insulators		

TL 227

Ctr	Suf.	Recommended Action		
Str		Required	Monitor	No Action
494	0	Install 1 guy guard		
498	0		Old insulators on site	
499	0	Remove tree leaning on guy wire		
		Replace 1 corroded guy grip		
		Install 3 guy guard		
509	0	Replace crossarm, rated 3, cracks		
517	0	Replace 1 guy grip		
		Install 1 guy guard		
		Reassess anchor replacement, noted, 2 earth and 2 rock		
		anchors, replace 1 earth and 1 rock?		
519	0	Replace crossarm, rated 4	Pole, rated 3, no reason	
523	0	Tighten loose centre phase insulator		
526	0	Replace crossarm, rated 5 (cracks)		
530	0	Tighten loose centre phase insulator		
537	0	Tighten loose centre phase insulator		
538	0		Pole, rated 3, no reason	
539	0	Reassess pole, comment "replace pole", however pole record		
		indicates a perfect pole, rated 2		
		Reassess crossarm, comment "replace", rated 3		
540	0	Replace pole, bad split at top pin, rated 3		
542	0	Tighten all insulators	Crossarm rated 3	
543	0	Install 3 guy guards		
545	0		Right phase insulators not plumb	
547	0	Install 2 guy guards		
548	0	Install 2 guy guards		

Str	Suf.	Recommended Action		
Su	Sul.	Required	Monitor	No Action
		COB insulators are scheduled for replacement in 2007.		
		Therefore, they will not be listed in this report. Some of		
		this work can be scheduled for replacement during this		
		time. Some work can also be combined (knee braces and		
		crossarms).		
115	0	Replace cross braces and blocking, rated 5	Crossarm rated 3	
		Replace knee braces, rated 5		
		Repair left OHGW for 1 broken strand?		
116	0	Install 12 guy guards		
		Repair left phase for 2 broken strands		
117	0		Crossbraces rated 3	
			Blocking rated 3	
118	0	Replace crossbraces and blocking, rated 4	Right pole, rated 2, checking (4)	
119	0	Replace crossbraces and blocking, rated 4		
120	0	Replace crossbraces and blocking, rated 5	Crossarm rated 3	
			Kneebraces rated 3	
121	0	Replace crossbraces and blocking, rated 5		
		Replace kneebraces (3 out of 4 rated 4)		
122	0		Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 4	
			Kneebraces rated 3	
123	0	Repair right phase for 1 broken strand	Crossbraces rated 3	
		Replace kneebraces, rated 4	Blocking rated 3	
124	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 4	
125	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
126	0	Install 4 guy guards	Crossarm rated 3	
		Replace crossbraces and blocking, rated 4	Kneebraces rated 3	

Str	Suf.		Recommended Action	
Su	Sui.	Required	Monitor	No Action
127	0		Crossarm rated 3	
			Guy wires and grips noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
128	0		Left pole, rated 2, checking (3)	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
129	0		Blocking rated 3	
			One Kneebrace rated 3	
130	0	Replace crossbraces and blocking, rated 4	Crossarm rated 3	
			Right pole, rated 2, chrcking (3)	
			Kneebraces rated 3	
131	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
132	0	Install 13 guy guards		
133	0	Repair left phase for 2 broken strands	Right pole, rated 2, carpenter ants (3)	
		Replace crossbraces and blocking, rated 4	Kneebraces rated 3	
134	0		Kneebraces rated 3	
137	0	Replace crossbraces and blocking, rated 4	Kneebraces rated 3	
138	0	Replace crossbraces and blocking, rated 4	Kneebraces rated 3	
139	0		Right pole, rated 3, no reason provided	
			Knee braces rated 3	
140	0		Kneebraces (left side) rated 3	
141	0		Kneebraces rated 3	
142	0	Install 1 guy guard	Kneebraces rated 3	
143	0		Crossarm rated 3	
			Crossbraces rated 3	
			Kneebraces rated 3	

TL 234

	WPLM Recommended Action Report				
Str	Suf.		commended Action		
Su	Sul.	Required	Monitor	No Action	
r					
144	0	Replace left pole, rated 4, internal decay (4)	Crossarm rated 3		
		Replace right pole, rated 4, internal decay (4)	Kneebraces rated 3		
145	0		Kneebraces rated 3		
146	0		Kneebraces rated 3		
147	0		Crossarm rated 3		
			Crossbraces rated 3		
			Blocking rated 4		
			Kneebraces (right side) rated 3		
148	0	Replace crossbraces and blocking, rated 4	Crossarm rated 3		
			Kneebraces rated 3		
149	0		Crossarm rated 3		
			Crossbraces rated 3		
			Blocking rated 3		
			Kneebraces rated 4		
150	0		Blocking rated 3		
151	0		Crossbraces rated 3		
			Blocking rated 3		
			Kneebraces rated 3		
152	0		Blocking rated 3		
153	0	Reassess crossarm, rated 5, for Other???? No comments			
154	0		Kneebraces rated 3		
155	0		Centre pole rated 2, check penetrates groundline		
			Crossbraces rated 3		
			Blocking rated 3		
			Kneebraces rated 3		
156	0	Install 2 guy guards	Kneebraces rated 3		
157	0	Install 2 guy guards	Kneebraces rated 3		
158	0	Install 4 guy guards	Crossbraces rated 3		
			Blocking rated 3		
			Kneebraces rated 3		

C)	G C		commended Action	
Str	Suf.	Required	Monitor	No Action
159	0	Reassess left pole, rated 3, 2" shell recorded – Where?,	RIght pole, rated 2, checking (3)	
		checking (3)	Crossbraces rated 3	
			Blocking rated 3	
160	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
161	0		Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
162	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
163	0	Install 4 guy guards	Left pole, rated 3, checking (3)	
			Right pole, rated 3, no reason	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
164	0	Install 8 guy guards	Centre pole, rated 3, no reason	
			Crossbraces rated 3	
			Blocking rated 3	
165	0	Install 12 guy guards	Crossarm rated 3	
166	0		Centre pole, rated 2, check penetrates groundline	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
167	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	

C4	Suf.		Recommended Action	
Str	Sui.	Required	Monitor	No Action
	<u>y</u>			
168	0	Install 2 guy guards	Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
169	0	Install 2 guy guards	Centre pole, rated 2, check penetrates groundline	
			Kneebraces rated 3	
170	0	Install 4 guy guards	Crossbraces rated 3	
			Blocking rated 3	
171	0	Install 4 guy guards	Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
172	0	Install 6 guy guards	Centre pole, rated 2, check penetrates groundline	
		Replace right phase damper, bent	Crossbraces rated 3	
			Blocking rated 3	
173	0	Install 6 guy guards	Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 4	
			Kneebraces rated 3	
174	0	Install 2 guy guards	Crossbraces rated 3	
			Blocking rated 3	
175	0	Install 2 guy guards	Crossbraces rated 3	
			Blocking rated 3	
176	0	Install 2 guy guards	Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
177	0	Install 2 guy guards	Crossbraces rated 3	
			Blocking rated 3	
178	0	Install 2 guy guards	Left pole, rated 2, carpenter ants (3)	
			Crossbraces rated 3	
			Blocking rated 3	

TL 234 TDI M Recommended Action Re

		WP	LM Recommended Action Report	
Str	Suf.		Recommended Action	
Su	Sul.	Required	Monitor	No Action
Γ				,
179	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
180	0		Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
181	0	Repair right phase for 3 broken strands	Guy wires noted as "other" with no description	
		Reset centre phase damper	Crossbraces rated 3	
		Adjust insulator plumbness	Blocking rated 3	
			Kneebraces rated 3	
182	0		Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
183	0		Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
184	0		Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
185	0	Install 2 guy guards	Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
186	0		Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
187	0	Replace crossbraces and blocks, rated 4	Crossarm rated 3	
			Guy wires noted as "other" with no description	
			Kneebraces rated 3	

Ctr	Suf.		Recommended Action	
Str	Sul.	Required	Monitor	No Action
100	Т ~			
188	0		Crossarm rated 3	
			Guy wires noted as "other" with no description	
			Crossbraces rated 3	
			Blocking rated 3	
189	0		Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
190	0		Blocking rated 4	
191	0		Crossbraces rated 3	
			Blocking rated 4	
			Kneebraces rated 3	
192	0	Replace centre phase damper, bent	Crossbraces rated 3	
			Blocking rated 3	
193	0	Install 4 guy guards	Kneebraces rated 3	
195	0		Right pole, rated 2, carpenter ants (3)	
			Kneebraces rated 3	
196	0		Crossarm rated 3	
			Kneebraces rated 4	
197	0		Right phase insulator not plumb	
199	0		Crossbraces rated 3	
			Blocking rated 3	
201	0		Kneebraces rated 3	
202	0		Crossbraces rated 3	
			Blocking rated 3	
203	0		Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
204	0		Crossbraces rated 3	
			Blocking rated 3	

G.	G C		Recommended Action	
Str	Suf.	Required	Monitor	No Action
205	0		Crossbraces rated 3 Blocking rated 3	
206	0		Left pole, rated 2, carpenter ants (3) Crossbraces rated 3	
207	0		Blocking rated 3 Crossbraces rated 3	
			Blocking rated 3 Kneebraces rated 3	
208	0		Crossarm rated 3 Kneebraces rated 3	
209	0		Kneebraces (right pole) rated 3	
210	0		Crossbraces rated 3 Blocking rated 3 Kneebraces rated 3	
211	0		Crossbraces rated 3 Blocking rated 3 Kneebraces rated 3	
212	0		Crossbraces rated 3 Blocking rated 3 Kneebraces rated 3	
213	0		Crossbraces rated 3 Blocking rated 3 Kneebraces rated 3	
214	0		Right pole rated 2, carpenter ants (3) Crossbraces rated 3 Blocking rated 3	
215	0		Blocking rated 3	
216	0		Crossbraces rated 3 Blocking rated 3	
217	0	Install 2 guy guards		

TL 234

Str	Suf.		Recommended Action	
Su	Required Required	Monitor	No Action	
218	0		Crossbraces rated 3	
			Blocking rated 3	
219	0		Kneebraces rated 3	
220	0		Left pole, rated 2, carpenter ants (3)	
			Blocking rated 3	
			Kneebraces rated 3	
221	0		Kneebraces rated 3	
222	0		Crossarm rated 3	
			Crossbraces rated 3	
			Blocking rated 3	
			Kneebraces rated 3	
223	0		Guy wires noted as "other" with no description	
			Kneebraces rated 3	
224	0		Kneebraces rated 3	
226	0		Crossbraces rated 3	
			Blocking rated 3	
227	0		Kneebraces rated 3	
228	0		Left pole, rated 3, internal decay (3), solid??	
			Kneebraces rated 3	
229	0		Right pole, rated 2, carpenter ants (3)	
			Kneebraces rated 3	
231	0		Kneebraces rated 3	•
232	0		Centre pole, rated 3, no reason	

TL 240

WPLM Recommended Action Report Recommended Action

Str	Suf.	Reco	Recommended Action	
Su	Sul.	Required	Monitor	No Action
		-		
		Repairs on TL 240 depend largely on having the line out		
		of service. No repairs listed here warrant taking the line		
		out of service, however, some (as noted) should be		
		performed if the opportunity arises		
1192	0	Possible repair pending outage schedule	Repair centre phase for 1 broken strand	
1195	0		Left pole, rated 3, no reason provided	
1204	0		Right pole, rated 3, no reason provided	
1214	0		Guy wires and grips noted as "other" with no description	
		Possible replacement pending outage schedule	Right pole, rated 4, internal decay (4) (but still solid???)	
1238	0	Possible replacement pending outage schedule	Broken insulator, centre phase	
1239	0		Guy wires and grips noted as "other" with no description	
1245	0		Guy wires and grips noted as "other" with no description	
1246	0		Left pole, rated 2, wood pecker holes (3)	
1247	0		Guy wires and grips noted as "other" with no description	
1257	0		Guy wires and grips noted as "other" with no description	
1267	0		Right pole, rated 3, wood pecker holes (3)	
1275	0		Right pole, rated 3, wood pecker holes (3)	
1276	0		Right pole, rated 2, wood pecker holes (3)	
1281	0	Possible replacement pending outage schedule	Crossbrace cracked at centre bolt	
1287	0	Possible repair pending outage schedule	Right phase insulator hardware cotter pin almost out	
1291	0		Guy wires and grips noted as "other" with no description	
1296	0		Guy wires and grips noted as "other" with no description	
1297	0		Guy wires and grips noted as "other" with no description	
1298	0		Guy wires and grips noted as "other" with no description	

TL 241

Ctm	Suf.	Recommended Action		
Str		Required	Monitor	No Action
320	0		Left and centre phase ball link eye bolts at 30-40% wear	
321	0		Left pole, rated 2, internal decay (3)	
322	0	Tighten loose b plates – all phases		
323	0	Repair left phase for 1 broken strand		
328	0		Guy wires and guy grips recorded as "other"	
329	0		Centre phase ball link eye bolts at 40% wear	
331	0		All ball link eye bolts worn 20-40%	
332	0		All ball link eye bolts worn 35-40%	
333	0	Repair centre phase for 1 broken strand	Left phase conductor rated 3	
337	0	Repair left phase for 2 broken strands	Structure leaning to source	
			Insulators not plumb	
338	0		Right pole, rated 3, internal decay (3), external decay (3),	
			shell separation (3), ASSUMPTION: 0.5" SHELL	
			ERRONOUSLY RECORDED AS SHELL	
			THICKNESS, BUT IS ACTUALLY SHELL	
			SEPARATION AMOUNT	
339	0		Left pole, rated 2, wood pecker holes (5)	
341	0	Repair right phase for 1 broken strand		
343	0		Structure leaning to source	
			Insulators not plumb	
		×	Left pole, rated 3, wood pecker holes (4)	
344	0		Left pole, rated 3, shell $(3) - (40)$, ASSUMPTION :	
			1.0" SHELL ERRONOUSLY RECORDED AS	
			SHELL THICKNESS, BUT IS ACTUALLY SHELL	
			SEPARATION AMOUNT	

TL 241

		WPLN	M Recommended Action Report	
Str	Suf.	Recommended Action		
511	Sul.	Required	Monitor	No Action
	T -			
345	0		Crossarm rated 3	
			Crossbrace rated 3	
			Left pole, rated 3, internal decay (3), external decay (3),	
			shell separation (3) – (30'), 2" shell (NO LOCATION RECORDED)	
			RECORDED) Right pole, rated 3, internal decay (3), external decay (3),	
			shell separation (3) – (30'), 2" shell (NO LOCATION	
			RECORDED)	
347	0		Right pole, rated 2, carpenter ants (5), POLE STILL	
			RECORDED AS SOLID?	
348	0	Retighten slack guys		
349	0	Side guy anchors installed – install the guys	All ball link eye bolts worn 40%	
		Tighten slack guys		
357	0	Tighten slack guy wires		
358	0	Tighten slack guy wires		
360	0	Tighten slack guy wires		
361	0	Tighten slack guy wires	Left pole, rated 2, shell separation (3), ASSUMPTION:	
			1.5" SHELL ERRONOUSLY RECORDED AS	
			SHELL THICKNESS, BUT IS ACTUALLY SHELL SEPARATION AMOUNT	
363	0	Tighten slack guy wires	SEPARATION AMOUNT	
J0J		Repair left phase for 1 broken strand		
364	0	Repair for phase for 1 broken straing	Left pole, rated 2, wood pecker holes (3)	
365	0	Replace ball link eye bolts, worn up to 55%		
366	0	Tighten slack guy wires		
367	0		All ball link eye bolts worn 30-40%	
369	0	Repair right phase for 1 broken strand	All ball link eye bolts worn 30%	
		Tighten blocking		
371	0	Tighten slack guy wires		
375	0	Tighten loose ball link eye bolts		
376	0	Tighten loose b plates – all phases		
378	0		Light vibration noted	

Str		Recommended Action				
	Suf.	Required	Monitor	No Action		
387	0		All ball link eye bolts worn 30-45%			
392	0	Install 4 guy guards	Light vibration noted			
393	0	Install 4 guy guards	Light vibration noted			
394	0	Install 4 guy guards	Light vibration noted			
395	0		Light vibration noted			
396	0		Light vibration noted			

Str	Suf.	Recommended Action			
Sir	Sui.	Required	Monitor	No Action	
				•	
1	0	Install 16 guy guards			
2	0	Install guy bonding			
3	0	Install guy bonding			
4	0	Install guy bonding			
5	0	Install guy bonding			
6	0	Install guy bonding			
7	0	Install guy bonding	Right pole, rated 2, shell separation (3), external decay (3), "shell separation top to bottom"		
8	0	Install 14 guy guards			
27	0	Install 6 guy guards			
33	0	Tighten slack guys			
34	0		Left pole, rated 2, check penetrates groundline		
35	0		Right pole, rated 2, "hollow through hardware" (SHOULD THIS POLE BE RATED HIGHER???)		
36	0	Install 6 guy guards	Centre pole, rated 3, 2.5" shell in one location, internal decay (3), shell separation (3) – (45'), installed 1986!		
39	0		Structure leaning to source		
43	0	Install 12 guy guards	7		
44	0		Left pole, rated 2, shell separation (3)		
45	0	Install 6 guy guards Replace right pole, rated 4, internal decay (4), hollow near hardware			
46	0	Tighten slack guys			
47	0	Tighten slack guys			
50	0	Install 4 guy guards			
53	0	Install 12 guy guards	Centre pole, rated 2, wood pecker holes (3) Right pole, rated 2, wood pecker holes (3)		
58	0	Install 6 guy guards			
63	0	Install 4 guy guards			
64	0	Install 4 guy guards			
68	0	Install 4 guy guards			

TL 243

Str	Suf.	Recommended Action		
		Required	Monitor	No Action
72	0	Repair left phase for one broken strand Repair left OHGW for one broken strand	Right phase hardware rated 3	
73	0	Replace centre pole, rated 4, internal decay (4), rotten at deadend		

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Str	tr Suf. Recommended Action			
Su	Sui.	Required	Monitor	No Action
32	0		Crossarm plates not double nutted	
			Light vibration noted	
			Right pole, rated 3, no reason provided	
118	0	Repair left phase for 3 broken strands	Light vibration noted	
119	0		Blocking rated 3	
130	0		Guy wires and grips noted as "other" with no description	
132	0		Guy wires and grips noted as "other" with no description	
140	0		COMMENT "pole rotten around the crossarm" and "pole	
			rotten around top and bottom x-brace" however, NO	
			POLE REPORTS INDICATE THESE DEFECTS	
141	0	Install 2 guy guards		
142	0	Install 2 guy guards		
148	0		Guy wires and grips noted as "other" with no description	
149	0		Guy wires and grips noted as "other" with no description	
150	0		Guy wires and grips noted as "other" with no description	
			Right pole, rated 2, check penetrates groundline	
151	0		Guy wires and grips noted as "other" with no description	
152	0		Guy wires and grips noted as "other" with no description	
153	0		Guy wires and grips noted as "other" with no description	
154	0	Install 4 guy guards		
155	0		Guy wires and grips noted as "other" with no description	
156	0		Guy wires and grips noted as "other" with no description	
157	0	Reassess right pole, rated 4, wood pecker holes (4), provide	Guy wires and grips noted as "other" with no description	
		photos of damage severity and location		
158	0		Guy wires and grips noted as "other" with no description	
159	0		Guy wires and grips noted as "other" with no description	
161	0	Tighten crossbrace bolt		
162	0		Right pole, rated 2, 5" shell somewhere but not noted,	
			shell separation (3) – (5')	
163	0	Install 12 guy guards		
164	0		Guy wires and grips noted as "other" with no description	
167	0	Replace right pole, rated 4, rotten around bottom x-brace	Guy wires and grips noted as "other" with no description	
168	0		Guy wires and grips noted as "other" with no description	

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Ctra	Suf.	Recommended Action					
Str	Sui.	Required	Monitor	No Action			
169	0		Guy wires and grips noted as "other" with no description				
170	0		Guy wires and grips noted as "other" with no description				
171	0		Guy wires and grips noted as "other" with no description				
173	0		Guy wires and grips noted as "other" with no description				
174	0		Guy wires and grips noted as "other" with no description				
175	0	Replace centre phase suspension clamp	Guy wires and grips noted as "other" with no description				
176	0	Install 6 guy guards					
		Reassess left pole, rated 4, no defects recorded					
177	0	Reassess left pole, rated 4, internal decay (3)	"b plates not double nutted" – WHAT DOES THIS MEAN????)				
178	0		Left pole rated 2, external decay (3)				
			Right pole, rated 2, shell separation (3)				
181	0	Reassess left pole, rated 3, internal decay (3), rot pocket (1" to 5" shell) – details on location of rot pocket should be provided	Guy wires and grips noted as "other" with no description				
188	0		Guy wires and grips noted as "other" with no description				
189	0		Guy wires and grips noted as "other" with no description				
190	0	Replace crossarm, rated 5, rot Replace right pole, rated 5, internal decay (5), POLE IS NOTED AS STILL SOLID, EVEN WITH AN INTERNAL DECAY OF 5!!!	Guy wires and grips noted as "other" with no description				
191	0		Guy wires and grips noted as "other" with no description				
192	0		Guy wires and grips noted as "other" with no description				
193	0		Guy wires and grips noted as "other" with no description				
194	0	Repair left phase for one broken strand					
196	0		Guy wires and grips noted as "other" with no description				
197	0		Guy wires and grips noted as "other" with no description				
198	0		Guy wires and grips noted as "other" with no description				
199	0	Verify COB insulators on all phases. If so, replace all	Guy wires and grips noted as "other" with no description				
200	0	Verify COB insulators on all phases. If so, replace all	Guy wires and grips noted as "other" with no description				
201	0	Verify COB insulators on all phases. If so, replace all	Guy wires and grips noted as "other" with no description				
202	0	Verify COB insulators on all phases. If so, replace all	Guy wires and grips noted as "other" with no description				
203	0	Replace right pole, rated 4, rotten at top x-brace					

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Str	Suf.	Recommended Action		
Su	Sul.	Required	Monitor	No Action
	_			
204	0		Guy wires and grips noted as "other" with no description	
205	0		Guy wires and grips noted as "other" with no description	
206	0		Guy wires and grips noted as "other" with no description	
			Right pole, rated 2, check penetrates ground line	
209	0		All deadend hardware rated 3	
212	0		Guy wires and grips noted as "other" with no description	
213	0		Guy wires and grips noted as "other" with no description	
214	0	Repair left phase for two broken strands	Guy wires and grips noted as "other" with no description	
		Replace left pole, rated 4, internal decay (4), shell separation		
		$(3) - (50^{\circ})$		
215	0	Repair right phase for 1 broken strand		
		Install 4 guy guards		
219	0		RIGHT PHASE DEADEND RATED 5, HOWEVER	
	_		THIS STRUCTURE IS AN "A"	
222	0		Light vibration noted	
			Left pole, rated 3, wood pecker holes (3), internal decay	
			(3), shell separation (3)	
225			Right pole, rated 3, wood pecker holes (3)	
225	0		Guy wires and grips noted as "other" with no description	
226	0		Guy wires and grips noted as "other" with no description	
227	0		Guy wires and grips noted as "other" with no description	
228	0	Repair left phase for 1 broken strand		
232	0	Repair centre phase for 1 broken strand	Guy wires and grips noted as "other" with no description	
234	0		Guy wires and grips noted as "other" with no description	
235	0		Guy wires and grips noted as "other" with no description	
238	0		Right phase insulators not plumb	
240	0	Reassess left pole, rated 2, 2" shell indicated, however no		
		location recorded, shell separation (3)		