

(9:00 a.m.)

MR. NOSEWORTHY, CHAIRMAN: Thank you and good morning. I hope you people are not finding these 9:00 public hearings starts too injurious to their home routine in the morning. I imagine those with small children, it's probably a little bit of a challenge in any event, but in view of the aging process that we talked about yesterday, while your bones deteriorate, your children disappear after a while. It's not all bad. (laughter) Anyway, good morning everybody. Good morning, Ms. Newman. Are there any preliminary matters?

MS. NEWMAN: Yes, there are. Good morning everybody. I believe Mr. Alteen has a matter or two he'd like to speak to.

MR. ALTEEN: Just housekeeping again, Mr. Chairman, but I'm aging and my little ones are still quite little so I've got the worst of both worlds.

MR. NOSEWORTHY, CHAIRMAN: There's no hope for you.

MR. ALTEEN: Today we filed responses to four undertakings given yesterday, Mr. Chairman. I just briefly want to go through those. I believe they've been circulated. I'll say from the outset that we worked as best we could from the notes we had of the proceedings yesterday. We didn't have a transcript available to check, but given the requests that we do it overnight, we decided to do our best with it, so I'll say in advance, (inaudible) culpa, and we'll fill in any holes if the transcript reveals we have been less than fully compliant with the undertaking.

Having said that, Mr. Chairman, there is undertakings, responses to undertakings U-3 to U-6. U-3 is the range of capital expenditure discussed early in the budget process. U-4 is the number of unmarked vehicles in Newfoundland Power's fleet from 1997 through 2002. Regrettably, Mr. Chairman, that information is not available, we don't have records that are reliable in relation to that on a year to year basis, and so we've provided some information filed in a proceeding, our last general rate proceeding when the number was 20, and now the number is 44. That's the best we could do on that.

With respect to the maintenance history for two specific vehicles identified in some cross-

examination yesterday, we have provided the detailed maintenance history for the two vehicles, and finally, Mr. Chairman, undertaking U-6 was provide us with an indication of what the vehicles are that are contained in the Attachment A to a response to information request CA-45(a), and we've provided the list of the types of vehicles involved there, so that's what we believe was compliant, judging from our notes yesterday and with that, Mr. Chairman, that will conclude our housekeeping.

MR. NOSEWORTHY, CHAIRMAN: Thank you, Mr. Alteen. Good morning, Mr. Ludlow.

MR. LUDLOW: Good morning, Mr. Chairman.

MR. NOSEWORTHY, CHAIRMAN: Good morning, Mr. Browne, I wonder could you continue with your cross-examination, please?

MR. BROWNE, Q.C.: Sure. Mr. Ludlow, can you go to Schedule B of the application, page 31 of 82, and there we're dealing with a project cost of \$4,129,000 for rebuilding transmission lines. I notice part of the project, you're installing guy wires or guy guards at a cost of \$100,000. We take no exception to that, we think that's a great idea. The transmission lines in the lower part of that page, transmission lines 24-L and 17-L run parallel to each other between the Goulds and Mobile stations. They were built in the early 1950s and are significantly deteriorated. The company intends to decommission 17-L which has suffered greater deterioration due to age and focus its resources on 24-L, and in total, 11 kilometers of the line will be rebuilt. Can you expand upon that a little. You have two lines there now that are operational, is that it?

MR. LUDLOW: That's correct.

MR. BROWNE, Q.C.: What kind of lines would you call those, maybe you can give us some information on it?

MR. LUDLOW: 17 and 24-L, these are just ... to back up a little, I guess, these are just nomenclature we use for identification of ... 17-L line to me tells me where it is, that's all. These lines run from the Goulds substation, which is near Ruby Line. One goes back country behind Bay Bulls Big Pond, to Mobile. That's the Mobile, the community of Mobile where there's a power plant and there's also a substation. That line operates at 69,000 volts. There's a second line that leaves Ruby Line, and that was the one I spoke of yesterday with

1 the picture, and it runs along the old southern shore
2 highway, through the Goulds to the edge of Bay Bulls
3 Big Pond where there is a substation we call Bay Bulls
4 Big Pond substation, and it leaves there and then goes
5 through, up through the dump at Bay Bulls, and then
6 cross-country to Mobile. That line also operates at
7 69,000 volts. I can keep going in more detail, if you
8 wish.

9 MR. BROWNE, Q.C.: When you say they run parallel
10 to each other, are they on the same poles or ...

11 MR. LUDLOW: No, they are not, they are two totally
12 separate pole lines. There are two ... this would be an
13 example of a case whereby there are two separate
14 quarters. One would be an H-frame construction,
15 particularly from Bay Bulls dump at the end of Middle
16 Pond to Mobile. It's two poles with a cross-arm on the
17 top. That's primarily its construction, so it's two
18 separate entities in totality.

19 MR. BROWNE, Q.C.: And what is the purpose, or what
20 was the purpose of having two lines as opposed to
21 one?

22 MR. LUDLOW: These lines were built back in the
23 fifties. We have to take ourselves back a little bit now.
24 On the southern shore we operate hydro plants at Cape
25 Broyle, Horse Chops, which is back country on the
26 edge of the Avalon wilderness, Rocky Pond, and I'm
27 trying to hit them all ... Mobile, Tors Cove, and Petty
28 Harbour, which would be up further. At that point,
29 back in the early fifties, that by far would have been
30 one of the most significant generating facilities,
31 including the St. John's steam plant, obviously, in this
32 general area. So there was two purposes effectively.
33 Those lines were built to ensure export of power from
34 the southern shore and into the city, and post that, if
35 you go into the sixties, and I think it's mid-sixties range
36 that Bay d'Espoir came on line and then it was the rural
37 electrification and more diesels and more development
38 happened in the province, so back when these were
39 built originally, that would have been the reasoning for
40 the secure export of the energy, and at times we had,
41 like I said, I'm sure there would have been times we
42 would have imported power to the southern shore, up
43 as far as Cappahayden, is how far that line would reach
44 through the distribution system, and I'm trying to give
45 a geographical reference line up through that area. It
46 would not feed beyond that.

47 (9:15 a.m.)

48 MR. BROWNE, Q.C.: Where you're decommissioning
49 line 17-L, what does that entail?

50 MR. LUDLOW: To decommission the line, well, it will
51 mean basically it will be taken out of service. We have
52 overhauled that line, we have ... particularly in the areas
53 of Lamanche Bottom and those areas, there's been ...
54 not Lamanche Bottom, I'm sorry ... there's been severe
55 clamp wear, conductor wear, poles, arms, that it's
56 beyond the end of its useful life from our perspective,
57 so what would happen, we would take that line out, we
58 would remove poles, wires, whatever, and remove it
59 from sight and basically salvage it.

60 MR. BROWNE, Q.C.: Yeah, that's what I was getting
61 to. What is the salvage value of the line. Well, see ...
62 were these one of these lines that were the subject of a
63 new insulator program when all the insulators were
64 being replaced?

65 MR. LUDLOW: When we did the insulator replacement
66 program, it was focused on transmission, in the
67 transmission area in particular, Mr. Browne, if I could
68 go there, that's the reference. We focused on radial
69 lines, we focused on lines that were underbuilt. That
70 would be, I guess, leading to your question earlier, the
71 clarification point, if we had two transmission lines on
72 the one structure, one on top and one on bottom, if, in
73 fact, an insulator failed and came down, it would take
74 out two transmission lines and poles, so those were the
75 focus of the insulator replacement program.

76 In the event there were failures on this line, we
77 would have gone in and replaced it at that point, but
78 not wholesale change out of insulators through that
79 line, sir, through the nineties.

80 MR. BROWNE, Q.C.: But there would have been some
81 work done on, on that line over the years, I would
82 imagine, is that fair comment?

83 MR. LUDLOW: That line, for us to keep any line in
84 operating condition with any sense of reliability, but
85 right now we're running on 17-L on the southern shore
86 because 24-L is out of service as a result of the
87 construction program which was approved by this
88 Board for the completion of the section from Middle
89 Pond Hollow and the ... I'll use the Bay Bulls dump area,
90 to Mobile. That's currently out and grounded and is
91 nearing completion for re-energization, so while we
92 speak we're running on 17-L.

MR. BROWNE, Q.C.: And if there was a storm in that area and say 24-L went out during the storm, people could get their electricity through 17-L, is that fair comment?

MR. LUDLOW: In the past?

MR. BROWNE, Q.C.: Yes.

MR. LUDLOW: That is correct.

MR. BROWNE, Q.C.: And how you're putting all your reliance on the one line?

MR. LUDLOW: What we're doing, and this may seem to be somewhat different than what we're proposing for Port Aux Basques and the Northern Avalon, and I don't know if that's your point, Mr. Browne, but I'll go there, to give the explanation of the radial versus the loop system, and I don't want to presume your question, by the way but ... we will have a single line to the southern shore, and the reason for this, we have evaluated what we'd call first and second contingencies, similar to what we did on the Burin, and we looked at that and we said, look, we've got a dual infeed, plus we have a loop system, plus we have generation on the Burin. Is it possible to still have an outage? Yes, is the answer. The likelihood and the management of the risk, however, would be much better if that asset were moved or were to be moved to an area that only has one contingency, a radial feed. So when we looked at 24-L and 17-L, and the installed generation on the southern shore, at the time they were originally constructed in the early fifties, the whole, what I would call the whole electrical system of the province has developed and changed since that time.

At that time we would have had between 50 and 60 employees working on the southern shore personing those plants. Today we may have eight or nine because they're all remote. The times have changed. We now have the installed capacity for the southern shore. We have a secure line with 24-L pending the approval with this budget. So therefore, rather than rebuild 17-L, which would be at multiple millions of dollars, we have said that would be better invested elsewhere if the need were to be identified, and we would decommission 17-L. And that's the logic flow that goes right through the budget.

Would I be more comfortable having the second line? Yes, and I'd be more comfortable with a

third line, if the truth be known, but that's not going to happen.

MR. BROWNE, Q.C.: Have you done a study of storms in that area? It seems like every time you turn on the radio the Ruby Line is closed or there's some problem out in the Goulds or up in that area during the winter months.

MR. LUDLOW: We haven't studied it, but I fully agree with you, sir. There's been more than once I haven't been able to get across the Ruby Line, or our trucks haven't gotten across, but where these lines travel has been looked at, and the frequency of trouble on 24-L has been relatively little from that end.

MR. BROWNE, Q.C.: And that's your professional judgement.

MR. LUDLOW: Yes.

MR. BROWNE, Q.C.: That 24-L will work fine for there.

MR. LUDLOW: 24-L, it is my judgement and the judgement of my staff that at this point it will meet what's required to supply service. There is a point I would make, that in 1994, if we go back to the extended outage, early December, heavens forbid, it was just about a week and a half beyond this point actually, early December, we exported or brought energy from the southern shore to attempt to energize St. Clare's and the General Hospital. So that was an example, Mr. Browne, of how you'd use the system in two flow. You bring it back up, we may have taken customers off on the southern shore to get the energy where we could better utilize it for the welfare of the hospitals at that point. So that was a kind of a situation that we would be importing and exporting over 24-L.

MR. BROWNE, Q.C.: So with this expenditure we're not going to see you come back now in a year or two or three or four saying that's only a radial line there and we should really loop it, or we had 17-L there at one time and we now think we need to rebuild it? That's not in the cards, is it?

MR. LUDLOW: Sir, if it was in the cards, I'd be before this Board today saying clearly that we should be rebuilding 17-L. It is my judgement that 17-L be decommissioned and removed from service.

MR. BROWNE, Q.C.: And if you go to 26(a), please.

MR. LUDLOW: I'm going to have to get more room. There we go.

MR. BROWNE, Q.C.: In 26(a) you're talking about the installation of a third transformer at Virginia Waters. The capacity of the two transformers there now is what, Mr. Ludlow?

MR. LUDLOW: It's roughly 50 MVA.

MR. BROWNE, Q.C.: And it's 25 per transformer, is that it?

MR. LUDLOW: That is correct.

MR. BROWNE, Q.C.: Transformers, in terms of capacity, are they all 25 or do they come in different, different capacities, different types?

MR. LUDLOW: Well, a power transformer can range in the fifties, hundreds, or fives, so there's a range. You can buy a 5 MVA, a 10, 15, 20, 25, 40, 50, or 100, I guess, and you can keep going.

MR. BROWNE, Q.C.: And the transformers, can a 25 work with a 50?

MR. LUDLOW: It can, but it would depend upon the circulating currents and the installation upon which it is put in place.

MR. BROWNE, Q.C.: So there in Virginia Waters, instead of putting in a third transformer, could you take the 25 out, put a 50 in, that would have the same effect, and take the 25 that you're taking out and move it, like to Chamberlains where you're looking for another transformer?

MR. LUDLOW: On the surface, that analogy looks quite reasonable, but what you get into is that in looking and transferring load and working within a substation, there are multiple concerns. First of all, how do you back up the transformer. I'll put ... let's follow your analogy, Mr. Browne, if I could.

MR. BROWNE, Q.C.: Yeah, and I'm just doing it from a layman's perspective and you're the engineer, so we're depending, the Board is depending on your advice as to whether or not this can be done or not.

MR. LUDLOW: No, it's a good question, so if we were to put a 50 MVA in Chamberlains. That means that the

total load out of Chamberlains substation is based on one transformer, which it is today a 25, but the total load would then run from Manuels back to, pretty much a large portion of Paradise. In the event that's lost, our ability to transfer or back up ... yesterday I referenced the Deer Lake transformer and moving a mobile transformer. My ability to do that is extremely limited. In fact, today, I can't do it, so really that's one problem with the analogy. On the mathematics, yes, on the surface, that's possible.

Secondly, at Chamberlains, with a 25, an additional 25 MVA unit, the additional unit is where I would go with this discussion, Mr. Browne, it provides me as a utility the flexibility to load and offload those transformers. If I have to maintain anything in that extra unit, I can cause loading to switch within the substation. It gives me some flex with which to operate. A 50 will not do that. That becomes the basis. If we go and buy a, I think your analogy was to buy a 50. I'll try your analogy again. That's the flexibility between it.

MR. BROWNE, Q.C.: Yeah, or one of greater capacity instead of getting two more 25s, you can see where I'm coming from.

MR. LUDLOW: No, no, there is much more involved than strict capacity. It's the balance, it's the logistics and system configuration. Like we have three mobile transformers. I have to be able to cover those transformers with those mobiles. Newfoundland and Labrador Hydro has one, and that unit, by the way is, we've used it a fair bit as well and we swap these back and forth, so if we go to Virginia Waters, there's two there today, the third would then cover the bases for the future, and we would now have three in a ring, and what you'd end up with is it would provide you with the flexibility for growth, and flexibility for maintenance, and operating conditions, and securing the supply in those areas.

MR. BROWNE, Q.C.: The new transformer, a brand new transformer, what would the life of that transformer be, Mr. Ludlow?

MR. LUDLOW: Roughly 40 years.

MR. BROWNE, Q.C.: So what would be the likelihood of it going out if you put a brand new transformer there? I understand that the transformers nowadays are constructed better than those previous, is that fair comment?

MR. LUDLOW: No, I don't think that is a fair comment. Actually, if you look to the distribution transformers that I referred to in my testimony regarding the stainless steel construction, that I would agree with you a hundred percent with the 20 year warranty on the tank. The ... I'll take the Board back a little if I may, and power transformers manufactured in the fifties and sixties were manufactured at a time when you could overload those transformers, you could drive them to 110, 115 percent peak on emergency conditions, lowering the life though ... every time you drove them you would lower the life of the unit. Now, that don't mean you run them in steady state at that condition. Today, actually it was in June I was in the Hamilton repair facility looking over our mobile, I might add, that was in 50 pieces on the floor as a result of a failure we've had this year, and it became very evident from discussing with these people, and these are manufacturers and repair people, that you can no longer run new transformers above the hundred percent loading mark. The materials have become finer, the tolerances have become finer, and what I will call the robustness of these units, the operating parameters are much closer now than they were at one point in the past, so Mr. Browne, to say that they're built better, they may look better, but the robustness of the transformation capacity of that unit has to be monitored much more closely.

MR. BROWNE, Q.C.: Now let's talk about their efficiencies. The transformers themselves, how much is lost, how much electricity is lost on a transformer?

MR. LUDLOW: To be quite honest, I don't have the number, but there is ...

MR. BROWNE, Q.C.: Is it 98 percent efficiency, or 97, or ...

MR. LUDLOW: It would be up in those ranges, it would be in the high nineties.

MR. BROWNE, Q.C.: It would be in the high nineties.

MR. LUDLOW: Effectively all the transformer does, it takes an energy in and delivers it out, and you get through magnetic transfer, you get heating loss. Your main loss would be in heating, and that's the reason you have your oils.

(9:30 a.m.)

MR. BROWNE, Q.C.: And are they operating most efficiently when they are at capacity?

MR. LUDLOW: From my end, and again, I'm not a transformer specialist, but I can talk generally with these units. They would not necessarily be under or over operating from an efficiency perspective. It's not like a machine on a loading basis. Like there is a no-load loss and there is a full load loss, and all transformers are evaluated on those bases. With respect to what those parameters are, it would be minuscule, the difference.

MR. BROWNE, Q.C.: And what about when it's under capacity, when it's, if you put a third transformer in there and it was under capacity, would there be a lot of loss that way?

MR. LUDLOW: No, because what's going to happen, you don't keep two year transformers at 100 percent load and one at zero percent load. What you do is you take your total load and attempt to split the load across the three transformers and operate them in those ranges. It is inefficient to run them at a hundred or a hundred plus. It's a strange beast. How do you put more than a hundred percent transformation through anything, but a transformer can run at a 101, 102 percent. It's a rated capacity rather than a maximum upper limit, so that's the way it would be run, and in that way, in separating the total load on the sub, you would bring the average per unit down, and you'd split the loading among the three transformers in Virginia Waters.

MR. BROWNE, Q.C.: And you wouldn't use two under any circumstance, you wouldn't use a 50 and a 25, that's your evidence?

MR. LUDLOW: My evidence is that it is not the right decision to move with a 50 and a 25. It's not that long ago we investigated putting a 50 in actually, and if my memory serves right, it was Virginia Waters, and this would have been four or five years ago. The ability to back up, the ability to service it, the spare for a 50, it's not available. We just don't have it. I have no 50s in my system where I can cause any swaps under extreme emergencies to happen. So now I've introduced a new beast. Sorry, that's my colloquialism coming out again, but then as I move my flex, I'm restricted, quite substantially, I might add. No, I would not put a 50 in is my answer.

- 1 MR. BROWNE, Q.C.: How many transformers would
2 you have in inventory at any given time?
- 3 MR. LUDLOW: A range is what I would have to give
4 you. I would suggest six to eight. That may be in an
5 RFI, I don't know where to get it. I don't know if my
6 learned friends can help me but ...
- 7 MR. BROWNE, Q.C.: Okay, just ...
- 8 MR. LUDLOW: I would say a six to eight, eight to ten,
9 somewhere like that.
- 10 MR. BROWNE, Q.C.: Why would you purchase a new
11 transformer here in this instance, if you may have one
12 in inventory?
- 13 MR. LUDLOW: The fact that I have eight to ten units
14 in inventory, transformers are unique. First of all, from
15 size, from connection. The second point that I would
16 make is that I am also not going to ... well first of all,
17 voltage transformation, is it 138/66, is it 66 to 25, 12, 5,
18 or 41 60. These are all different variations. I do not
19 have inventory with which I can back up my
20 transformers within this system.
- 21 MR. BROWNE, Q.C.: You checked that, there's nothing
22 in your inventory that you can use in Virginia Waters
23 or in Chamberlains, is that what you're telling us?
- 24 MR. LUDLOW: I have gone through my inventory and
25 I am comfortable that to put anything in the
26 Chamberlains or Virginia Waters from that inventory
27 would not be the correct move, sir, yes.
- 28 MR. BROWNE, Q.C.: You have nothing there you
29 could use, that's your evidence?
- 30 MR. LUDLOW: Nothing there that would be ... that's
31 my evidence.
- 32 MR. BROWNE, Q.C.: All these transformers are oil
33 filled, is that correct?
- 34 MR. LUDLOW: The transformers we're referring to here
35 are power transformers, that's the topic that we're
36 discussing. This is high voltage transmission to
37 distribution. It would be in these cases, 69,000 volts in
38 the case of Virginia Waters, to 12,500, and in the case of
39 Chamberlains it would be from 69,000 volts to 25,000
40 volts. They contain, a rough estimate again, 250 to 400
41 barrels of oil, mineral oil.
- 42 MR. BROWNE, Q.C.: Have you heard of dry
43 transformers?
- 44 MR. LUDLOW: Yes, I have.
- 45 MR. BROWNE, Q.C.: Have you any dry transformers
46 in your system?
- 47 MR. LUDLOW: We have no dry type transformers in
48 the power ... of this type. We may, but I'd be really
49 stretching my grey matter this morning ... there might be
50 one, but that would be inside a vault, probably in a
51 building and be very small, in the half of an MVA
52 range, that type of ... it's ...
- 53 MR. BROWNE, Q.C.: Are you aware that dry
54 transformers may be more efficient than oil
55 transformers?
- 56 MR. LUDLOW: Not that I'm aware of. They may be,
57 they may be.
- 58 MR. BROWNE, Q.C.: You haven't studied that?
- 59 MR. LUDLOW: I've studied dry type transformers. I've
60 studied all plastic encapsulated transformers, I've
61 studied transformers to get away from using oils on
62 poles, I've studied different cores, I've looked at
63 different containment systems, and I've heard lots of
64 song and dances come from a lot of suppliers, but when
65 put to the test, I want to buy four or five and install
66 them, I'm still waiting for them to show up on my dock,
67 so yes, I've looked at transformers.
- 68 MR. BROWNE, Q.C.: Because if a transformer, if you
69 could build up on the efficiency of a particular
70 transformer, wouldn't that be good generally, there
71 wouldn't be so much electricity loss?
- 72 MR. LUDLOW: Sir, if I can find a way that can balance
73 loss, reduce loss, because I'm not in the process of
74 heating the Snow's Lane area, because that's effectively
75 where the loss goes, show the continued life and
76 reliability of the unit, and serviceability of the unit and
77 those three, not to mention the cost of a dry type in this
78 range would be quite substantive from my memory ... as
79 a matter of fact, I've never seen one that would be dry
80 in that magnitude, and it might ... and the fact that I
81 haven't seen them don't mean they don't exist, but ...
- 82 MR. BROWNE, Q.C.: Yeah, no, I think that someone
83 told me it's a big trend in Europe to use dry

1 transformers for efficiency. I don't know if that's ... you
2 don't know that?

3 MR. LUDLOW: It might be, it might be, honestly I
4 don't know.

5 MR. BROWNE, Q.C.: Can you go to CA-19(b), please?
6 There I'm asking you about the unanticipated cost in
7 the budget for unforeseen items. Do you have it there,
8 Mr. Ludlow?

9 MR. LUDLOW: Just one second, Mr. Browne, please.
10 I've got to find my cross-reference in my book.

11 MR. BROWNE, Q.C.: It's Schedule B, page 60 of 82 in
12 the application.

13 MR. LUDLOW: Yes.

14 MR. BROWNE, Q.C.: And the answer there says the
15 budget for the company's allowance for unseen items
16 was \$315,000 in 1995, \$600,000 in 1996, and has been set
17 at \$750,000 since 1997, and is that accurate to the best
18 of your knowledge?

19 MR. LUDLOW: To the best of my knowledge, it is.

20 MR. BROWNE, Q.C.: And the purpose for the
21 unforeseen items, can you read that, that's in the
22 second paragraph there?

23 MR. LUDLOW: Do you wish me to read it into the
24 record?

25 MR. BROWNE, Q.C.: Just read it into the record, yeah.

26 MR. LUDLOW: The company utilizes the allowance for
27 unforeseen items for the replacement of facilities and
28 equipment damaged due to major storms or equipment
29 failures. The purpose of the account is to permit the
30 company to act expeditiously to deal with events
31 affecting the electrical system in advance of seeking the
32 approval of the Board.

33 MR. BROWNE, Q.C.: Okay, and for the most part, has
34 it been used for storms, to your knowledge, the
35 unforeseens?

36 MR. LUDLOW: The unforeseen account and if I may,
37 I want to make sure we're on the right, that we're on the
38 same page here, Mr. Browne. If I go to page 60 of

39 Schedule B, there's two pieces. Is this the one you're
40 referring to?

41 MR. BROWNE, Q.C.: Yes.

42 MR. LUDLOW: Okay, so ... sorry, now I'm after missing
43 your question.

44 MR. BROWNE, Q.C.: The unforeseen allowance is
45 used for unforeseen events such as damages from
46 storms, is that correct?

47 MR. LUDLOW: That is correct.

48 MR. BROWNE, Q.C.: Now, previously, previous to, I
49 guess, this year, the company had no insurance in
50 place for storms, did they?

51 MR. LUDLOW: That is correct in the period, I would
52 think, in the mid-nineties. Prior to that there was storm
53 ... but in recent years that is correct.

54 MR. BROWNE, Q.C.: Can you go to CA-63, please, and
55 there the question was ... sorry.

56 MR. LUDLOW: No, just bear with me a second. Okay.

57 MR. BROWNE, Q.C.: Okay, there the question was
58 posed, wondering if the company had any insurance in
59 place in relation to insurance for storms, and the third
60 paragraph, I think, answers it, can you read that into the
61 record please?

62 MR. LUDLOW: Yes, I can. The third paragraph?

63 MR. BROWNE, Q.C.: Yes.

64 MR. LUDLOW: During negotiations for the July 1st,
65 2002 to July 1st, 2003 renewal, the insurer with which
66 the policy was eventually placed to provide limited
67 coverage on the company's transmission and
68 distribution lines at no additional premium. Coverage
69 is currently provided with a limit of \$500,000 per
70 occurrence with a \$200,000 deductible.

71 MR. BROWNE, Q.C.: So if there is a storm, I guess that
72 would be an occurrence, is that fair comment?

73 MR. LUDLOW: An occurrence is defined, to give you
74 an example, in August there were two storms, sorry,
75 there were three storms, one of them overlapped the
76 other. I do believe the three storms constituted two

1 occurrences. That's the way it would be broken down,
2 yes.

3 MR. BROWNE, Q.C.: Okay, where your unforeseen
4 allowance has risen to \$750,000 where there was no
5 insurance in place, and now where you have insurance
6 in place, \$500,000 with the \$200,000 deductible, it seems
7 to me you've got \$300,000 to work with, at least for that
8 part of the unforeseens. Therefore, given that scenario,
9 can you see a reason to put the unforeseen back to the
10 \$500,000 or the \$400,000 range?

11 MR. LUDLOW: I'm going to have to ask you to try that
12 one once more. I got the number tangled up because
13 you were doing your calculations, Mr. Browne.

14 MR. BROWNE, Q.C.: The unforeseens for \$750,000,
15 they had risen over the last number of years to
16 \$750,000, that was without insurance in place. Now you
17 have insurance in place, you've got \$500,000 worth of
18 insurance in place per occurrence, with a \$200,000
19 deductible, so that, so if you look at it from that
20 perspective, you have \$300,000 to work with.
21 Therefore, can you see where it would be reasonable to
22 move the unforeseen back to the \$400,000 or \$500,000
23 range?

24 MR. LUDLOW: No, that is not reasonable, and the
25 reason it ...

26 MR. BROWNE, Q.C.: Why is that?

27 (9:45 a.m.)

28 MR. LUDLOW: ... it's not reasonable is because the
29 whole premise behind the allowance for unforeseen
30 items, this is what's ... this budget is prepared on the
31 basis of total dollars, not net dollars, so that's the first
32 point I'd like to make. Insurance claims run long and far
33 beyond any timeframes with which we repair. This
34 account is only used in the event it is called upon in
35 catastrophe or what have you. The examples that I
36 give, the August storms, they aren't resolved yet, and
37 will probably be more months. When they are resolved,
38 that money goes back against the account and it goes
39 back in against ... I'll use the word "rate base", so it nets
40 at the rate base, not at the budget level, so the fact that
41 there's an allowance on \$56 million, there has to be a
42 reasonable flex with which to go to work, and to assume
43 to come before the Board to get the permission and
44 approval, I think would be totally counterproductive.

45 MR. BROWNE, Q.C.: But you have \$300,000 more to
46 work with there if you have a storm in the \$500,000
47 range. You pay your \$200,000 deductible and you're
48 getting \$300,000 from the insurance company. Surely
49 that wasn't there before, was it?

50 MR. LUDLOW: Your observation that it wasn't there is
51 correct. However, the basis behind ...

52 MR. BROWNE, Q.C.: And it's there now.

53 MR. LUDLOW: ... the way the budget is built is that
54 that money when it is received from the insurance
55 company, goes back against those accounts, and that's
56 what will happen in the storms from the summer and it
57 will happen on the breakdown on the G-2 in Seal Cove,
58 and those are outstanding claims, and actually, P-435,
59 our mobile that I mentioned that's in Hamilton, that's
60 another one. There's an outstanding claim of \$690,000.
61 That will go back against the rate base as well. So this
62 is in place to provide us with the flex to go to work and
63 go to work quickly and restore power to the consumers.

64 MR. BROWNE, Q.C.: Yeah, I'm just looking at it from
65 the money perspective. You've made no claim on the
66 insurance since July 1, 2002, did you, Mr. Ludlow, to
67 the best of your knowledge?

68 MR. LUDLOW: Could you repeat that again, please?

69 MR. BROWNE, Q.C.: Did you make any claim against
70 this insurance policy since July 1, 2002?

71 MR. LUDLOW: The claim that I referred to is we have
72 made claim against the insurance policy as a result of
73 the August storms, yes, we have, and to the best of my
74 knowledge, Mr. Browne, there are two occurrences in
75 the three storms.

76 MR. BROWNE, Q.C.: So from the insurance company,
77 how much are you claiming, therefore?

78 MR. LUDLOW: Let's see. There's two occurrences, I'm
79 going to try my math now, Mr. Browne, and see if I can
80 get this to work. We've got two occurrences at
81 \$200,000 deductible each, okay. The maximum limit is
82 \$500,000 each, so as I see it, the maximum we can get
83 out of those storms from the insurance company would
84 be in the \$600,000 range, and that's maximum.

1 MR. BROWNE, Q.C.: Where is that built into your
2 budget, that \$600,000 you're getting back from the
3 insurance company?

4 MR. LUDLOW: It's not.

5 MR. BROWNE, Q.C.: Where does that go?

6 MR. LUDLOW: That money goes back against the rate
7 base when that money is received. I can't build a
8 budget on the premise that I'm going to have a storm
9 next August and my fight with the insurance company
10 will be that I will get \$600,000. This is the whole
11 premise of the unforeseen.

12 MR. BROWNE, Q.C.: So there's \$600,000 floating
13 around there, there's a cheque coming from somewhere,
14 going somewhere.

15 MR. ALTEEN: Mr. Chairman, whether there's a cheque
16 and the amount of the cheque and insurance claims
17 generally are matters of significant uncertainty as every
18 lawyer in the room surely knows, and we do not place
19 it in the budget, as Mr. Ludlow has given evidence, and
20 that's just the nature of insurance claims. The
21 insurance coverage will be availed of to the full extent
22 it can be. However, we can't predict where or at what
23 point the number will, or the amount of money will come
24 in. It could be years, and it is not uncommon for
25 insurance claims to take years.

26 MR. NOSEWORTHY, CHAIRMAN: Thank you, Mr.
27 Alteen.

28 MR. BROWNE, Q.C.: I guess when it does come in
29 you'll advise the Board that you got \$600,000 back from
30 insurance, is that correct, Mr. Alteen? Is that what the
31 normal thing is, since you're giving evidence there on
32 it? Is that what you normally would do?

33 MR. NOSEWORTHY, CHAIRMAN: I think I'll cut this
34 off now. I think Mr. Alteen, if you could refrain. Mr.
35 Ludlow, I think, testified to, or gave evidence to that
36 effect, and certainly I wish the interjections to be kept
37 to a minimum, thank you.

38 MR. BROWNE, Q.C.: Sure, maybe the company can
39 put on a sheet of paper for us the nature of the claim
40 and where it is, so we can see on paper exactly what
41 can be anticipated here. Would that be a fair
42 undertaking to ask you, through your counsel, to give
43 in reference to those claims?

44 MR. LUDLOW: I have no issue with that, Mr. Browne,
45 if that's agreeable.

46 MR. BROWNE, Q.C.: Okay, thanks.

47 MR. LUDLOW: I made a mistake there, didn't I?

48 MR. BROWNE, Q.C.: Can you go to Schedule B, page
49 51 of 82, and this refers to a budgetary item under the
50 distribution reliability initiative, so-called. Part of that
51 is in the Milton area where you're putting in \$528,000
52 and the SAIFI and SAIDI numbers there are 2.9 and 2.2,
53 which aren't too bad, I guess, given the company
54 average. The SAIDI actually exceeds the company
55 average. And you said in your evidence yesterday to
56 not pay too much attention to that because most of this
57 expenditure is going on Random Island, is that not
58 correct?

59 MR. LUDLOW: No, that is not correct. I didn't say
60 don't pay attention to it. What I did say was that the
61 explanation of why those performance indices are where
62 they are is because of the layout of this feeder, and if I
63 had presented and put these numbers in a format to
64 only represent those customers impacted by this
65 section of line, we would be in the eight to nine
66 frequency outage area, and that was the reason I used
67 the topographical map in my presentation yesterday.

68 MR. BROWNE, Q.C.: And how did you know that?
69 Did you do a calculation? You're saying that it would
70 be in the eight to nine if you ...

71 MR. LUDLOW: Yes.

72 MR. BROWNE, Q.C.: You did a calculation, and the
73 calculation applies to where, it's in Random Island?
74 You don't have to get the calculation, I'm just, if you
75 can just give me an idea.

76 MR. LUDLOW: No, I was looking for my map actually
77 but the one that we ... did we pass these out yesterday?
78 I think we did.

79 MR. BROWNE, Q.C.: Yeah, 2003 capital budget.

80 MR. LUDLOW: Just for the sake of clarification ...
81 thank you, I must have this one, I have every other
82 binder here.

83 MS. BUTLER, Q.C.: Actually, Mr. Chairman, I think this
84 is available now on the system, isn't it, Chris?

MR. LUDLOW: Well that would be better again if we could.

MS. BUTLER, Q.C.: We can actually go to ... it's the only topographical map there.

MR. LUDLOW: Do you wish the slide number? It's slide number 34. It's close anyway. No, the next one. You're gone the wrong ... there it is. Okay. The other way, Chris, it's up around 36, 35, that area.

MS. BUTLER, Q.C.: It's 34, number 34.

MR. LUDLOW: No, go to 37, sorry, don't mean to ... can we enlarge, please, when you're ready? Okay, if we could, do you wish me to lead through this, the numbers, Mr. Browne, would that be helpful?

MR. BROWNE, Q.C.: Sure.

MR. LUDLOW: As I tried to explain yesterday, the Milton substation is up in the, say the 11:00 range on the diagram marked with the square. Those familiar with Clarenville, that's actually located on the Bar Road between Milton and Random Island, the causeway. When you come out of that substation, there's three wires on the top of the pole. The area that goes, say up to the top of the screen through George's Brook, Barton (*phonetic*), Hartcourt, Monroe, Waterville, Clifton, and the end of that is near Nut Cove, which is the slate mine. That is Milton 02 feeder. That's a three phase circuit down as far as George's Brook. Now, that's only one part of this feeder representing approximately two thirds of the customers. The second part, or the last one third of the feeder, heads towards Random Island, and it comes and goes towards the bottom part, crosses the causeway through, through, down through Elliott's Cove, Lady Cove, Waybridge, Hickman's Harbour, Britannia and Petley. The reason I know these places, Mr. Browne, is I worked here a fair bit, actually, back in the eighties, and as you cross the Bar Road or the bridge, down to Elliott's Cove, is the ten and a half kilometer section of line that's referred to in this budgetary allotment. Now, we discussed radial lines. This is a true section of a feeder which is radial. When I have a break in my conductor, or sorry, our conductor, I guess, between Milton and Elliott's Cove, everything in Hickman's Harbour, Lady Cove, Britannia and Petley is without power. However, for the sake of consistency and the way we've built these numbers in the past, we talk in terms of a feeder. So the feeder represents the

blue line that you see on the map, not just a piece of the feeder.

To do the calculation on the feeder, it's the number of outages by the number of customers impacted, divided by the total customers on the feeder. That's the reason, when two thirds of those customers are not impacted, that the SAIDI and SAIFI are low. I mean as we went through some of these things yesterday, if I were to take the section of the feeder from Milton substation to Petley, and only include those number of customers, it will be the number of outages, times the number of customers, divided by the number of customers impacted. We had nine outages, 500 customers, divided by 500 customers, will give me a frequency of nine. If I had a white board I could draw it out, but that's the concept and the math, it's the reason for the sake of consistency we have presented it this way before this Board.

(10:00 a.m.)

MR. BROWNE, Q.C.: How many customers are there in Random Island?

MR. LUDLOW: Approximately 500 to 550.

MR. BROWNE, Q.C.: Is it a growth area, Random Island?

MR. LUDLOW: I would say not. It's typical of rural Newfoundland.

MR. BROWNE, Q.C.: Sure, and I guess that brings up this entire topic. How does Newfoundland Power adjust its capital expenditure plans to take into account declining populations and sales volumes in rural areas?

MR. LUDLOW: That's a very difficult question, Mr. Browne, because first of all ...

MR. BROWNE, Q.C.: And I agree, it is a difficult question.

MR. LUDLOW: Well, it is, it's a difficult quandary. Being from rural Newfoundland ...

MR. BROWNE, Q.C.: But it's a reality too, isn't it?

MR. LUDLOW: Well, it is, but also being from Rural Newfoundland myself, I know what's happening out there, and when I look at, you know, we heard a large

number of sections of the Act being quoted here last Friday, and one of these is the obligation to provide equitable access to service, I think, it's somewhere around there. Equitable is in there somewhere, Mr. Browne. We look at the balance between the customer expectations, we look at our obligations under the Act, and we also look at the fact that in our obligation to serve, we have an obligation to respond in times of trouble from outages, and indeed, public safety, and if you wrap all those pieces together, those are the parameters that go into a project such as the Random Island, Milton 02, or Elliott's Cove feeder rebuild, whatever you wish to call it. The fact that I'm not in a position to say that the community of Petley will support our investment, means I do not have the choice. I can't say I'm not going to do things.

MR. BROWNE, Q.C.: Is there ever a thought that with declining populations in particular areas where you go into an area, that you will be stuck with stranded costs of ...

MR. LUDLOW: I would suggest ...

MR. BROWNE, Q.C.: Stranded infrastructure.

MR. LUDLOW: I would suggest, sir, as we go forward, the opportunity for stranded infrastructure is a real possibility.

MR. BROWNE, Q.C.: So in your plans for your capital budget, as you look at populations in a particular area, are you studying in particular the demographics, the age of the populations there and whether there is any growth in a particular area prior to putting additional infrastructure in an area?

MR. LUDLOW: The short answer to that would be no, but I would be very clear to this Board, that you'd be hard pressed in many of rural Newfoundland communities, to look for communities, I mean on this map alone there is probably a dozen communities ... probably in one of the more prosperous areas due to the oil refinery and Bull Arm and what have you in this area ... however, typically rural Newfoundland from my perspective, and this is personal and not based on ... it would be based on observation and what I see. We're seeing out migration, we're seeing communities getting older on average age base, and we're also seeing the need for reliable supply increasing, and the expectation of service is increasing. What a quandary, because what we're into is that as the average age ... again, I

can't put a number, whether it's gone from 59 to 62, but I do know from my own community, that is the case, and I think that's pretty typical, that when the power is off now, believe me, you know the power is off because there's people hounding you for the right reasons, for supply of service and reliability and a dependency upon not only heat, water, and other, the vitals of life, is what's happening in these communities.

MR. BROWNE, Q.C.: And of course, the problem for Hydro is even more profound there, isn't it, given where they serve, is that not correct?

MR. LUDLOW: Well, I don't know, I think that's debatable too because a large portion of our service territory is not unlike the service territory that Newfoundland Hydro services on this island. When you take the Great Northern and the White Bay, and you take the southwest coast, these areas, I would agree, would probably be those isolated areas, that comment would probably be applicable.

MR. BROWNE, Q.C.: In any case, can you go to CA-31 please, meters?

MR. LUDLOW: Just one second. I'm just trying to cross-reference it to the application, Mr. Browne, just one second, please.

MR. BROWNE, Q.C.: I think I might ... Schedule B, page 36 of 82.

MR. LUDLOW: I've got it. Okay, I'm sorry, yes.

MR. BROWNE, Q.C.: Okay, and you make reference there to the number of meters that have to be purchased and so on. I gather, are there any meters in inventory, do you keep meters in inventory?

MR. LUDLOW: We keep some but not a great deal. Our number, our meters, we try to reduce our inventory such that we can rotate them through the Government retest order process. You've always got to have a small standing volume, but not ... let me back up a little. One of the key drivers in the metering process are the regulatory process around it under the Measurements, the Measurements Act with Measurements Canada. Every six years they're tested, taken out, and there's a statistical sampling on the batch of meters to ensure their continued accuracy. So we try and balance our inventory between new customer growth, and that's varied by general service, residential and different types

1 of meters, and also the requirements under the, what I
2 call the GRO, Government Retest Order Process, Mr.
3 Browne, yes, so we carry a small inventory.

4 MR. BROWNE, Q.C.: Before you order new meters or
5 put a budgetary item in for new meters, do you check
6 your inventory to see what's there and how recently
7 that's been used?

8 MR. LUDLOW: I would assume we do. To be quite
9 honest, I don't know.

10 MR. BROWNE, Q.C.: And whose job would it be?

11 MR. LUDLOW: Within the inventory control, that
12 would fall with, it would fall under Ms. Duke's purview
13 with ... Ms. Duke.

14 MR. BROWNE, Q.C.: Ms. Duke would be able to
15 answer that?

16 MR. LUDLOW: She would answer that question, yes.

17 MR. BROWNE, Q.C.: But do you know if the
18 budgetary items are run by Ms. Duke to show this is
19 what we're purchasing and it's checked against
20 inventory before the budget is presented to the Board?

21 MR. LUDLOW: That point that you're raising, Ms.
22 Duke could answer. I will sponsor what's on this sheet
23 in front of you today.

24 MR. BROWNE, Q.C.: But you don't know if it's done or
25 if it's not from your knowledge?

26 MR. LUDLOW: I can say with a very high degree of
27 certainty that this would be treated no different than
28 any other aspect we buy from, be it meters, be it wires,
29 we don't buy poles anymore, or be it insulators. We
30 would check against standing inventory, projected
31 deliveries, safety minimums, what our maximum
32 inventory level would be, what the deliverable times
33 are, and what market conditions are, and I would see
34 metering being no different in that process.

35 MR. BROWNE, Q.C.: Metering, do you have
36 employees read the meters every month as a matter of
37 policy?

38 MR. LUDLOW: Yes, we do.

39 MR. BROWNE, Q.C.: Even during the summer months?

40 MR. LUDLOW: We have estimated some meters, if my
41 memory serves right, during the summer months, but
42 we do read monthly and bill monthly. The last year, I
43 do believe, there has been a program for June, July,
44 maybe June and July that it was estimated.

45 MR. BROWNE, Q.C.: And when people's meters are
46 estimated, are you getting more calls to Newfoundland
47 Power in reference to that?

48 MR. LUDLOW: This is a point, Mr. Chairman, that from
49 my perspective, I would defer to Ms. Duke, and from
50 the capital budget perspective, which I am here to
51 defend or support, I'm willing to pursue, but the day to
52 day meter reading, where we are in the operation of the
53 call centre is not something that I'm able to speak to.

54 MR. BROWNE, Q.C.: Are you able to speak to the
55 number of employees you have doing meter reading?

56 MR. LUDLOW: I would estimate, yes, I can slightly, I
57 can estimate they'd be in the 40 range.

58 MR. BROWNE, Q.C.: They're in the 40 range, and
59 during the summer, there's a change in that, is there?

60 MR. LUDLOW: Those people have holidays and
61 vacation as well, and that's the only basis upon which
62 we would be estimating any meters, would be to
63 provide those people with vacation.

64 MR. BROWNE, Q.C.: But people always have
65 vacations, that didn't come in the last couple of years,
66 I wouldn't think, and you're just starting to estimate
67 now in the summer. Have you reduced your workforce,
68 or have you not hired replacement workers for people
69 during the summer months?

70 MR. LUDLOW: As I said, Mr. Chairman, I can keep
71 going, but in this area, we have been trying to find
72 ways to control costs. Hiring temporary employees is
73 one way that we have been adamant within our
74 business that if there is an opportunity we will avoid
75 the hiring of temporary employees, and where there are
76 alternate ways we will attempt, and with the notification
77 we've provided to the Board, that was one area that we
78 took in June, July, and maybe June, July, and August,
79 I'm not sure what the exact months ... but that was the
80 basis behind it. It was to avoid the hiring.

81 MR. BROWNE, Q.C.: Yeah, and I guess we'll leave it
82 for Ms. Duke because if you're, I guess if you're

- 1 displacing workers or not hiring replacement workers
2 during the summer months but your calls at your
3 answer centre are going up, maybe there's an imbalance
4 there. Have you got extra people hired there to answer
5 the calls instead of reading the meters, or extra call lines
6 in that ...
- 7 MR. LUDLOW: Based on the ...
- 8 MR. BROWNE, Q.C.: ... to take the trouble calls?
- 9 MR. LUDLOW: Based on your premise that they are
10 going up, and whether or not they are offset on a one
11 to one basis, I can, I have studied queuing (*phonetic*)
12 theory enough to know that if I have ten extra calls, I
13 don't need one extra body. I also know that queuing
14 theory is an exponential equation that one person, it
15 multiplies itself on the ability. On the assumption that
16 calls are increasing, which I do not know that they're
17 increasing, I will assure you that there wouldn't be
18 enough hiring back to displace the meter reading, meter
19 readers that would have been hired, and that has been
20 researched and a decision made to proceed with the
21 estimating as we've informed this Board.
- 22 MR. NOSEWORTHY, CHAIRMAN: Could you reserve
23 those questions for Ms. Duke, Mr. Browne?
- 24 MR. BROWNE, Q.C.: Yes.
- 25 MR. NOSEWORTHY, CHAIRMAN: Queuing theory is
26 ...
- 27 MR. BROWNE, Q.C.: It is an issue and ...
- 28 MR. LUDLOW: Sorry.
- 29 MR. BROWNE, Q.C.: What's that?
- 30 MR. NOSEWORTHY, CHAIRMAN: I said queuing
31 theory is starting to get ...
- 32 MR. BROWNE, Q.C.: Yeah, we'll take our line on the
33 queue, take our turn on the queue. Okay, yesterday we
34 finished talking about vehicles and I just want to return
35 to that topic now, and overnight you looked at some
36 information, you filed some information this morning,
37 can you go to Schedule B, page 61 of 82, revised, where
38 you give your replacement policy for vehicles?
- 39 MR. LUDLOW: Schedule B, page 61 ...
- 40 MR. BROWNE, Q.C.: 61 of 82.
- 41 MR. LUDLOW: ... of 82, first revision, okay.
- 42 MR. BROWNE, Q.C.: And by the way, you have there,
43 passenger off road vehicles and heavy fleet trucks, the
44 number of units to be purchased there is 48 and 7, is
45 that correct?
- 46 MR. LUDLOW: That is correct.
- 47 MR. BROWNE, Q.C.: And that 48, are they all
48 replacement vehicles that you're purchasing there?
- 49 MR. LUDLOW: Yes, there are no additions to the fleet.
- 50 MR. BROWNE, Q.C.: Because when I look at
51 Attachment A of U-6, if you can go to that for a
52 moment, that was filed there this morning.
- 53 MR. LUDLOW: Yes, okay, sorry, I have it.
- 54 MR. BROWNE, Q.C.: Okay, the vehicles to be replaced
55 in 2003, when I count the numbers, passenger vehicles,
56 I think I come up with 29 and you've got 48 there, and
57 the heavy fleet, I think, one, two, three, four, five, six,
58 seven, it's seven there. Why the discrepancy, or am I
59 missing something here?
- 60 MR. LUDLOW: Well, yesterday we were, and again I'm
61 going to lose myself in the CA's, by the way, or the
62 RFIs, there was a ... we were questioning in an area of
63 what specific types of vehicles were and where they
64 were being replaced, and what you have in front of you
65 in Attachment A-U-6, is the, or are the passenger
66 vehicles to be replaced in next year's budget. What's
67 not on that list, Mr. Browne, is the off road vehicles,
68 and I need to clarify what an off road vehicle is in our
69 business. It's a skidoo, it's a quad, and I do believe
70 there's ... there's not a six wheel quad, but it's a six
71 wheel bike, whatever that's called, Argo, I guess. So
72 the differential, these are the passenger vehicles, not
73 the skidoos and the others.
- 74 (*10:15 a.m.*)
- 75 MR. BROWNE, Q.C.: Now the skidoos and the quads
76 and the six wheel bike, the Argo, are they new or are
77 they replaced?
- 78 MR. LUDLOW: They would be replacements as well.

1 MR. BROWNE, Q.C.: So therefore, when we ask for the
2 vehicles to be replaced, how come you didn't forward
3 those to us as well?

4 MR. LUDLOW: To be quite honest, when I was, the
5 question as posed yesterday, it was my understanding
6 we were referring to a list that we were dealing with
7 yesterday, and if you could take me to the RFI that we
8 were into yesterday, maybe I could clarify your
9 question.

10 MS. BUTLER, Q.C.: It was 45(a) yesterday, Mr.
11 Chairman.

12 MR. LUDLOW: I've been known to make a mistake, Mr.
13 Browne, that's for sure.

14 MR. BROWNE, Q.C.: Yeah, no, the numbers there were
15 off as well, that's why I was waiting for this document
16 to be ...

17 MR. LUDLOW: The reference, if my memory serves
18 right, was dealing with Attachment A, 45(a), and the
19 conversation, if my recollection is correct, centered
20 around two specific vehicles, it was 007, and that's not
21 James Bond's vehicle, but it was the 007 and 025, and
22 the high maintenance costs, and subsequent to that
23 conversation, at least my impression was that you
24 requested what are these vehicles, because the
25 question was in 25, 7 and 7, where were they, and I
26 couldn't recollect where they were, other than the fact
27 that they were on the southern shore, and it so
28 happened that's where they were, and hence our
29 response to U-6.

30 MR. BROWNE, Q.C.: Yeah, now in fairness, the
31 original question in 45(a) is please provide specifics as
32 to the purchases of the passenger/off road vehicles and
33 the heavy fleet vehicles. You gave us the cars, but you
34 didn't give us the off road vehicles and the heavy fleet
35 vehicles, and maybe you can undertake to provide that
36 to us?

37 MR. ALTEEN: Perhaps we could go to the response,
38 Attachment A to CA-45(d), Mr. Chairman, before we
39 start undertaking?

40 MR. BROWNE, Q.C.: Oh yeah, okay, let's see.

41 MR. ALTEEN: D, please, Chris?

42 MR. BROWNE, Q.C.: Okay, when ... and the
43 snowmobiles, number seven, and the ATVs, three, and
44 the trailers, nine, these are all replacement vehicles as
45 well.

46 MR. LUDLOW: Yes, they are.

47 MR. BROWNE, Q.C.: Okay, in terms of your policy for
48 replacement vehicles, is it your policy to replace the
49 vehicles, is it four years or 100,000, 150,000 miles, what
50 is the policy? I think it might be stated in Schedule B,
51 page 61 of 82 under project justification.

52 MR. LUDLOW: Okay, if you wish I can read that in.

53 MR. BROWNE, Q.C.: Sure.

54 MR. LUDLOW: All units to be replaced have been
55 evaluated for factors such as overall condition,
56 maintenance history, and immediate repair requirements.
57 Based on this evaluation it has been determined that
58 each unit has reached the end of its useful life and is
59 beyond economical repair. For passenger vehicles, the
60 average life span is five years or 150,000 kilometers. For
61 heavy fleet vehicles, the average life span is ten years
62 or 250,000 kilometers.

63 MR. BROWNE, Q.C.: Now, are you familiar with the
64 replacement policy at Hydro for vehicles?

65 MR. LUDLOW: Not in any level of detail, no, I'm not.

66 MR. BROWNE, Q.C.: Well, there's an excerpt from their
67 capital budget of 2003, page B-22, and I've copied it so
68 maybe we can distribute that for a moment, and the
69 replacement criteria is found on page B of 122 for a
70 category 1000, description, cars/minivans. What does
71 their replacement criteria state, Mr. Ludlow?

72 MS. BUTLER, Q.C.: Yeah, I wonder, Mr. Browne, if you
73 may just give the witness a minute to finish reading the
74 new material first?

75 MR. BROWNE, Q.C.: Oh yes, certainly.

76 MR. LUDLOW: Yes, Mr. Browne.

77 MR. BROWNE, Q.C.: Okay, what is the replacement
78 criteria for Hydro under the category 1000, cars and
79 minivans?

MR. LUDLOW: The way I'm understanding this table as presented here is that the category 1,000, which appears to be an internal allotment or whatever or a code, cars and minivans, five to seven years, greater than 150,000, maintenance cost and condition.

MR. BROWNE, Q.C.: Would you take it from that that the replacement cost, the replacement policy of Hydro for cars and minivans where they say it's greater than 150,000, five to seven years, that they may be getting an extra year or so out of their cars and minivans?

MR. LUDLOW: I would not necessarily think so, sir, I think the operating conditions of Newfoundland Hydro and Newfoundland Power are two different companies. I would go to Section 4, 4000, medium and heavy duty trucks, age seven to nine years, greater than 200,000 kilometers. The average cost of these vehicles is ranging between \$250,000 and \$300,000 a unit, and I'm not here to say that Newfoundland Hydro is changing their trucks early, nor can I say that they're not. It's based upon their operating conditions. Similarly with their cars and vans, maybe they can get an extra year because of the fact that a lot of their trucks are in smaller isolated communities. They're two different companies, to me those replacement criteria are very much in line between the two companies.

MR. BROWNE, Q.C.: And if you went to 3000, light trucks, you'll see the replacement policy there is six to eight years, and 1,000 (*sic*) kilometers, maintenance costs and conditions. What is your policy for replacement for light trucks, Mr. Ludlow?

MR. LUDLOW: We put light trucks, passenger vans and pick-ups in the same category, greater than 150,000, the average life span, what we're getting is about 150,000. Some of those will run 175,000, and some of those might be 130,000. I would suggest the ones on the southern shore won't reach 100,000, so that is an average that we use, some will be high and some will be low. We do not necessarily tick them off at five years.

MR. BROWNE, Q.C.: So you could have vehicles there that, in that same range, six to eight years, is that what you're telling us?

MR. LUDLOW: I think it's possible.

MR. BROWNE, Q.C.: On your specifications there for vehicles, you indicate the warranty is three years and 60,000 kilometers, is that true?

MR. LUDLOW: No, what I indicated to the Board yesterday, is to the best of my understanding that the, the warranty you're referring to would be similar to what a vehicle manufacturer would be. My truck, for example, will run 60,000, three years, 120,000 or 150,000 power train, I do believe that's what it is. It might be 115,000, but ...

MR. BROWNE, Q.C.: Isn't it true that manufacturers in the last 12 to 24 months have increased the warranty on vehicles, the power train warranty, have gone into a seven year power train warranty, are you familiar with that?

MR. LUDLOW: The only thing I am familiar with is that last, two weeks ago on Friday I lost the power train in my truck in Lockston, I can tell you that part, so that was covered under warranty.

MR. BROWNE, Q.C.: How old was your truck?

MR. LUDLOW: My truck is two years old.

MR. BROWNE, Q.C.: I would hope it would be. I just want to give you things that I've gleaned from the newspaper in terms of this extended warranty that manufacturers have now in place for vehicles, and some I've taken from the internet.

COMMISSIONER FINN: Mr. Browne, is that manufacturers generally or are you referring to one particular manufacturer?

MR. BROWNE, Q.C.: No, I've got a few manufacturers here so a bit of a smorgasbord, so we all might learn something out of this.

COMMISSIONER FINN: We might indeed.

MR. BROWNE, Q.C.: Okay, if you could take a look at these. The Saturns first, do you have any Saturns in your fleet?

MR. LUDLOW: None that stand out in my mind, Mr. Browne.

MS. NEWMAN: Can we mark this as exhibits to the testimony here?

MS. BUTLER, Q.C.: And what are we doing with the ...

MR. ALTEEN: It's not exhibits, he's not sponsoring this.

MS. BUTLER, Q.C.: Mr. Chairman, what are we doing with the earlier one, the page from Hydro's capital budget case?

MS. NEWMAN: My view on that was that it would be part of the Board record, it wouldn't need to be made an exhibit to this testimony. Again, your witness wouldn't be sponsoring it. The Clerk, I understand, has marked it as an information item, number three. We could do that with this as well.

MS. BUTLER, Q.C.: Well, perhaps we might get some guidance?

MR. NOSEWORTHY, CHAIRMAN: Excuse me, this reference to the replacement criteria for Hydro vehicles which would have been included in their capital budget is an information item, three?

MS. NEWMAN: That would be an information number three, is that ... yes, and then this could be information number four, and if there is further of them, we could just call them that.

MS. BUTLER, Q.C.: What were information one and two then?

MS. NEWMAN: Number one was the excerpt from the transcript, I believe, that Board counsel submitted, Newfoundland Power Capital Budget 2000, and number two was the decision of the Board, PU-7, June 7th, 2002.

MR. ALTEEN: So this one is number three, this is the Hydro ... is that the numbering we're doing.

MR. NOSEWORTHY, CHAIRMAN: That's what's being suggested, yes.

MS. NEWMAN: And Saturn will be number four.

MS. BUTLER, Q.C.: For the record though, Mr. Chairman, I'm not familiar with newspaper advertisements or pieces from the internet being put to a witness in terms of having any value of terms of his sworn testimony, so I'd be interested in the Board's practice on previous use of such information in terms of an evidentiary base. It's one thing to provide a portion from another utility's capital budget application for comparative purposes, but to compare or to ask a

witness to speak to what may appear in the local newspaper is something quite different, it seems to me, and ultimately, I suppose it will go to weight in terms of argument, but ...

MR. NOSEWORTHY, CHAIRMAN: Mr. Browne, do you have any comment?

MR. BROWNE, Q.C.: Well, it's a document out there in the public domain, what's there in the newspaper, and indeed, what's on the net. We're talking about warranties for vehicles. They're suggesting the standard is three years, 60,000 ... I didn't take it and manufacture it, it comes from reputable sources and I guess it's open to the others to challenge them if they find that it's other than that. I think we're giving some information to the Board on a very large expenditure item for vehicles, and I think it's incumbent upon the parties to ensure the Board has all the information as to what standards are out there.

MR. NOSEWORTHY, CHAIRMAN: Mr. Young, do you have any comment?

MR. YOUNG: No, other than to, I suppose, echo Ms. Butler's point that the, I don't know either what the practice is. I have been involved in other kinds of hearings when documents of this sort ... in fact, I've used them myself, have been presented but the purpose of them usually is directed to a particular Q and A with the witness and it can be used as a guide, and obviously this witness can't attest to what it stands for, so it's weight has to be considered. It can be often, I've used it in cases where it was a useful means, just to guide examination.

MS. NEWMAN: Yes, I would suggest that this document wouldn't be entered as evidence of itself, but to the extent that the witness had commentary upon the idea that's proposed, or information contained within this particular document, that would be evidence. I think it's up to the witness to decide if he has any testimony to give on this particular document, but it's entered only for information purposes and not as something that's evidentiary.

MR. NOSEWORTHY, CHAIRMAN: It is entered only for information purposes, and I assume that Mr. Browne will speak to it in terms of the point he would wish to make. It is only an information item and I wouldn't expect that the witness could speak to this in any, in

any deliberate fashion, so I will allow a few questions on it.

MR. BROWNE, Q.C.: Yeah, I'm not going to ask ...

MR. NOSEWORTHY, CHAIRMAN: A few comments on it.

MR. BROWNE, Q.C.: ... I'm just going to get to the warranties and the warranties that are available and out there, and I think it could be helpful for the Board to know what's on the go there, and indeed from Newfoundland Power's and Newfoundland Hydro's applications. They're both seeking a lot of money, millions of dollars for vehicles.

The one you have there is Saturn and they give the various amounts that they're offering by way of lease and so on, and then the fine print there, above Hickman Saturn Sabu (*sic*), Saab, and whatever that is. They say all 2002 and 2003 Saturns come with a five year or 100 (*sic*) kilometer power train warranty. In presenting your evidence before the Board that the warranty that you normally seek is three years or 60,000, wouldn't you think that this may be better?

MR. LUDLOW: I think as a point of clarification, yesterday I was asked, and again this morning, I was asked as to what warranty we seek. My response was that we buy the vehicles in that what the warranty that's on the market is what we get with the vehicles. It's not that we go out and exclude people because their warranty is low or high. I mean my comment, and again, it's ... I don't know the intricacies between a Dodge warranty and a Chev warranty and a Saab Isuzu, whatever. One of the things, and the reason I say that is because I'm not looking for a five year or a three year warranty. If I could get a ten year warranty I'd go there, so I just want to make sure, Mr. Browne, that you're clear on where my mind was when I responded on the warranties that are in place. So now I come back to your point. Does this look better, I think that was your question?

MR. BROWNE, Q.C.: Yes, is it something the company would consider, if there's a five year and 100,000 kilometer power train warranty, would you consider that over a vehicle that has a three year or 60,000 kilometer warranty?

MR. LUDLOW: When we go to market on replacement of vehicles, we will look at cost, we will look at what the

vehicle is being used for. We will look at the warranty. We will look at things such as fuel consumption, past history, and up time, so, and all that ... up, when I refer to up time, let me describe that. I can have the best warranty in the world but the truck is no good to me if it's in the garage all the time getting repaired, so, yes, is my answer, is we do engage and evaluate the value of a warranty and if I can get the warranty coverage for five years, and you're seeing a lot of this ... when we go to market this would be a factor. Is it "the" factor, no, but it is certainly a determining one.

MR. BROWNE, Q.C.: And some of your vehicles are General Motors type vehicles as well, are they not, Mr. Ludlow?

MR. LUDLOW: Yes, they are.

(10:30 a.m.)

MR. BROWNE, Q.C.: Okay, we just want to look at the warranties General Motors are offering now, and we'll all know which vehicle to buy at the end of this process, what to head for.

MR. NOSEWORTHY, CHAIRMAN: This is I-5.

MR. BROWNE, Q.C.: Do you have any Cavaliers in your fleet, Mr. Ludlow?

MR. LUDLOW: As far as I know we do, yes.

MR. BROWNE, Q.C.: Well, just look under the warranty, the coverage period that they're now offering for Cavaliers, three, four, five, you'll see there's five years/100,000 kilometers, whichever comes first, power train limited warranty on 2002 Cavalier and Sunfire, and they offer a five year, 160,000 kilometer, whichever comes first, on diesel engine components.

MR. LUDLOW: Just, I'm missing the reference to Cavalier, I don't see it here.

MR. BROWNE, Q.C.: I'm sorry, it's right under total warranty, the new GM and ...

MR. LUDLOW: Oh, okay.

MR. BROWNE, Q.C.: Every new GM and light duty truck is backed by the GM total warranty.

MR. LUDLOW: Okay, I'm sorry, I thought you were referring this specifically to a Cavalier. I guess it would be covered under the GM total warranty is your point?

MR. BROWNE, Q.C.: Well Cavalier is there under, just look under five year there.

MR. LUDLOW: Okay, I've got it. Thank you.

MR. BROWNE, Q.C.: So you can see by that that companies seem to be expanding upon their warranties and what they're offering by way of warranty, other than the three year, 60,000 kilometer, at least General Motors is. Would you agree with that comment based on what you see there?

MR. LUDLOW: From what I have in front of me, it seems like the warranty periods are extending, yes.

MR. BROWNE, Q.C.: And Ford, we don't want to leave out Ford, can we take a look at what Ford is doing now as well, please?

MS. NEWMAN: That's information six.

MR. BROWNE, Q.C.: And this is the Ford warranty, we took this down from the net, and it says a three year, 60,000 ... four year, 40,000 kilometer for Lincoln vehicles. New vehicle limited warranty covers the complete vehicle, and down below it says for all 2002 and newer model Ford or Mercury cars except Lincoln and Windstar, power train warranty is also included for five years, 100,000 kilometers, whichever occurs first. Would you agree that a five year, 100,000 kilometer warranty might be beneficial to Newfoundland Power when they're looking for vehicles.

MR. LUDLOW: It certainly would be.

MR. BROWNE, Q.C.: A lot of these warranties also carry what's called the Roadside Assistance Program, I guess if you break down on the road they'll come and give you assistance. Are the operators of your vehicles familiar with that and do they avail of that Roadside Assistance Program?

MR. LUDLOW: I have no idea whether they do or don't. I would, that's from the availing ... there's nothing stands out in my mind. We would, most of our employees would be aware of the availability of these types of programs. I can't cite any instance where we've used Roadside Assistance, Mr. Browne.

MR. BROWNE, Q.C.: Okay, and the last one I have is Honda, and we'll take a look and see what Honda does. I think Honda caused it all, actually.

MS. NEWMAN: Information seven.

MR. BROWNE, Q.C.: And Honda started the five year business, you can see there it makes an announcement, the Honda five year, 100,000 kilometer no nonsense warranty set a new industry standard when it was first introduced, and it goes on to talk about the Honda five year, 100,000 warranties. Do you have any Hondas in your fleet?

MR. LUDLOW: Very few I would think.

MR. BROWNE, Q.C.: And if you look on page 2 of 2, they have greater warranties for specific components, like the emission systems, they have eight years, 130 (*sic*) kilometers.

MR. LUDLOW: Yes.

MR. BROWNE, Q.C.: So is it your evidence, therefore, that when you go looking to replace these vehicles, that you will be looking at these warranties and see what's the best bang you can get for your buck, for the consumers' buck in terms of warranties so that the manufacturer is doing repairs for the vehicle as opposed to your contracted repairer?

MR. LUDLOW: My evidence, as I repeated before, would be that as we go to market to replace our replacement vehicles, there are a number of factors. Warranty is definitely one of them. Reasonable cost is also one of them. The reason we have very few Hondas in our fleet is because of the initial capital cost. Now, and there may be one or two, I don't know if there are, right now it's, we do have a fair number of GMs, Hyundais, Suzukis, those types of vehicles. We would look at the applicability of the specific unit, and how it fits, obviously cost, maintenance history on those types of vehicles in the past comes into play, and all those things are part of it, but warranty, yes, Mr. Browne, is a part of the decision makers, and will be part of the decision makers.

Just on that point, and it's ... a few years ago we broke clear of managing our own fleet, and today any expenditure that we put on a vehicle in excess ... I do believe it's \$100 ... requires, we use a group called, I think it's GE Capital right now, it used to be BML, it's

one of these fleet management services for the passenger fleet. We don't track our internals, it's done external through a card system. Before there is an expenditure on that fleet vehicle, it has, the vehicle is pulled up on a screen, it is compared back against the original purchase and the conditions. That would be the warranty, so the warranty is checked, and it wouldn't be completed in a local garage without the warranty ensured that it is done in play, so that's our, I would call it our QA or quality control to ensure we're maximizing the value of the warranties that are in place, and as the fleet changes, and in fact, industry changes and the warranties change, that will continue to happen, so rather than ... what we've tried to do is minimize our infrastructure on small fleet maintenance and fleet infrastructure tracking, and we've utilized an external ... when I refer to history of vehicles, for example, if I need to find out what is a typical S-10 pick-up or is it a good product for maintenance history, longevity and those things, that's where that information comes from, Mr. Browne.

(10:45 a.m.)

MR. BROWNE, Q.C.: Yeah, and you raised the topic, repairs, which reminds me, yesterday I asked you to check on a few vehicles because the repair costs seemed to be out of the ordinary. Can you just go to CA-45(j), please, and there's an attachment to that, Mr. Wells. I thought there was a list there in 45(j) which gave us Attachment A of U-2. I asked you to match the vehicle with the repair. Maybe it's not 45(j), is there a further attachment onto that, Mr. Wells? Okay, Attachment A to that. Now, I'm after losing my place. Maybe you can help me out here, Mr. Ludlow. Yesterday ...

MR. ALTEEN: 45(a), the attachment I believe you may be looking for, Mr. Wells.

MR. BROWNE, Q.C.: 45(a), is it?

MR. ALTEEN: The attachment.

MR. BROWNE, Q.C.: Okay, just go to 45(a), thank you, Mr. Alteen. Yeah, 45(a), the vehicles to be replaced in 2003, if we go to Attachment A, U-6, and compare that to the maintenance history and mileage, the vehicles to be replaced in 2003, and if we could look at the third one down, it's a Ford F-10 XL Supercab, 4 x 4, pick-up, and it was purchased in 1997, 130,000 clicks and it's got

\$26,000 in maintenance costs. Is that reasonable, Mr. Ludlow?

MR. LUDLOW: I must admit, when you raised it to me yesterday, I was surprised at the value or the cost of it, the repairs, but while you were speaking I looked at the vehicles here, and I referenced two of those vehicles, and I think it was subject to check that these vehicles were used on the southern shore hydro system, and if you recall yesterday, I put a picture here of the repair on Blackwoods free board dam in my presentation, it's 25 plus kilometers back country. That whole area, as you go back in, is where those trucks are used. It is a large expenditure of \$26,000. The alternative is to use, well yesterday there was a helicopter in my slide, that's not something we do. This truck is used and it's used very heavily in off road. These roads are not even gravel. Sometimes they're, you know, at best, washed out with boulders and what have you, and that's where those two trucks are used. Is it high? Yes, \$26,000 maintenance is high, but they are well worth the effort, they are large vehicles, and they're used, I won't say aggressively, they're used to their fullest extent to which they were designed. Whether they're big enough is the question.

MR. BROWNE, Q.C.: Yeah, but for back country, haven't the ratepayers provided you with quads and Argos and the like so that you're not using vehicles in back country?

MR. LUDLOW: Let's put this a little bit in perspective. We're talking two people going back anywhere from 25 to 40 kilometers in December. Once the snow is on the ground, if we have to go in there, we'll go in by skidoo. In the summertime you're transporting equipment and gear and trying to get back and forth. A quad is not designed for construction, it is designed for patrols, and a quad is just that, and that's ... the alternative to a quad is a track machine, and a track machine would be, magnitude, magnitudes of order, larger than what we're paying for these F-10s. We're in the couple of hundred thousand range, and to us that is not an acceptable expenditure pattern. A quad would not meet the requirements. I have safety issues with these employees when they go back there. In fact, we've had them snowed in in there.

MR. BROWNE, Q.C.: Yeah, that's all well and good, but a Ford F-10 XL Supercab, what would you ... sure it wouldn't cost too much more than \$26,000, would it, new?

MR. LUDLOW: I don't know what the purchase price would be, but I would, a replacement cost on that vehicle, I would suggest is in the \$35,000 to \$40,000 range.

MR. BROWNE, Q.C.: And 208(d), can we go down to that, it's a Ford F-10, the \$22,000 in repairs, it's out in Carbonear. Mr. Finn would know, I guess, I don't think the roads in Carbonear are that bad, are they?

COMMISSIONER FINN: No comment (*laughter*).

MR. BROWNE, Q.C.: What was your answer? That seems like a lot as well, did you investigate that to see how come it's \$22,000 in repairs for a 1997 vehicle?

MR. LUDLOW: The original comment I'd make on that one, if I am looking at 208(d), Mr. Browne, it's well outside our replacement criteria, it's already five years old, 210,000 at \$22,000 expenditure, I would suggest that one in particular has been in the system too long. Now I do not know what that truck is used for. I hit two yesterday out of them all. I don't think I'm going to hit this one.

MR. BROWNE, Q.C.: The first one from Carbonear, 208(d).

MR. LUDLOW: 208(d) is again, a Supercab 4 x 4. The only place that I could see that potentially being used is, again, in Pittman's, Chelsey, Heart's Content area, or ... which is, I'm sorry, is a power plant end, and that is purely subject to check. I don't know what that truck is used for.

MR. BROWNE, Q.C.: And of course the grandmother of them all is 259(c), a Ford, a Ford F-410 4 x 2 out of Gander, 259(c), and the repair cost to that is \$56,000?

MR. LUDLOW: That's a flat bed, by they way, and not a pick-up.

MR. BROWNE, Q.C.: It's \$56,000. I mean who is minding the shop here when we see a 1993 vehicle being kept like that and that repairs of that magnitude of \$56,000, I just wonder from a consumers' perspective that if those numbers were published in the Evening Telegram, would consumers relate to a \$56,000 in repairs or \$26,000 for trucks. It seems to be over the top, would you agree with me, sir?

MR. LUDLOW: No, I would not agree.

MR. BROWNE, Q.C.: I didn't think you would.

MR. LUDLOW: No, I'm sorry to disappoint you, Mr. Browne, but 259(c) is a Ford 4 x 2, and it's a 1993, it's nine years old. It's a F-450. That would be a state-body truck. That would be, what, a ton and a half, I'm not sure what the carrying capacity of that unit ... we could have changed that vehicle if I were to apply strict criteria of five years. That would do no one any good. What's happened on the \$56,000, I don't have the details on the maintenance costs, but over nine years that comes back to about what, where am I to, nine into 56 ...

MR. BROWNE, Q.C.: You're not going to try that one on us now, over nine years, because surely they would be under warranty for three years, or a certain number of mileage.

MR. LUDLOW: Well the alternative would have been to replace it in 1998, and to me that don't fit the mould under which we operate this business. It's a high mileage and obviously there the call has been made by local management that we can keep this truck going. This is not a \$20,000 truck. This would be in the \$40,000 to \$50,000 range back in 1993 in the state-body type of vehicle. The call ... the number looks high, I don't have the details as to why that operating cost is high, but that's where it is. Would I say we should replace it? I think it's due for replacement in the year 2003, and that's the reason we've included it in our capital budget.

MR. BROWNE, Q.C.: With regard ... if you can just put them up a little bit further, Mr. Wells, please. You have in Corner Brook there, a vehicle, 216(b). I gather that's the same type vehicle, is it, a flat bed?

MR. LUDLOW: Yes, it is, it's a Ford 450, 4 x 2.

MR. BROWNE, Q.C.: What guidelines do you give your maintenance people if, if you're dealing with a large number of vehicles, surely there's going to be a lemon or two. If you find that some vehicles are getting a lot of repairs, what guidelines do you give your maintenance people to stop repairing them or we're going to put that one out to pasture or ...

MR. LUDLOW: The way we look at these vehicles, and the ones you have highlighted here on the high cost end, say \$45,527 for 216(b) out of Corner Brook, it is nine years old, 100,000 kilometers. Okay, if we were to

1 look at that one, what we look at here is we try to
2 balance the cost, the capital cost, the maintenance cost,
3 when is the proper time to replace this vehicle. If I had
4 the day to day, or the year by year explanation of these
5 costs, I don't know if that \$45,000, ten of it might have
6 been last year. Ten of it might have been last month, or
7 it might have all occurred five years ago. The piece
8 here, the guidelines, every single expenditure on these
9 vehicles in excess of \$100 must receive approval by
10 certified mechanics that's on our GE Capital screening
11 system. That is not something that Tom, Dick or Harry
12 takes the truck and goes to the corner garage and gets
13 new tires every second week. If the truck ... and then
14 we take the capital, we look at what it would cost us,
15 and we look at our ongoing maintenance, and a call is
16 made. Sometimes we will err by keeping the thing too
17 long, and sometimes we will err, we will replace it too
18 early, but overall the balance of managing the fleet,
19 we're striking, in my opinion, a reasonable balance
20 between supplying available trucks and vehicles during
21 the period which they're called on heavily. These
22 vehicles that you're pointing out here now in the high
23 expenditures are used for heavy construction for
24 delivering materials to job sites and what have you.
25 That's generally the overall I can pass on that. With
26 respect to is it once they cross X dollars, it's not there.
27 We do not work that way.

28 MR. BROWNE, Q.C.: When you're replacing your
29 vehicles, do you look at the repairs on similar models
30 and say these are all, for instance, Cavaliers that are
31 causing us difficulty, do you say we'll avoid getting
32 Cavaliers the next year, just as an example, of course.

33 MR. LUDLOW: It's a good example. What we do is we
34 have access through this group we work with and have
35 been now for four to five years. We not only look at
36 our own, we look at the performance of that style of
37 vehicle in general. Like I may be able to go to market
38 and buy a \$6,000 vehicle that's going to be in the
39 garage for six months, that's not worth anything to me.
40 However, if I can look back and say that's a good buy,
41 the maintenance history across all the other fleets
42 managed by this group is positive, the warranty is
43 good, any up time on the vehicle is positive, that's all
44 factors in the buying decision.

45 MR. BROWNE, Q.C.: Can we just go into the heavy
46 fleet there, Mr. Wells, before we take the break, so we
47 can leave this particular aspect, and in the heavy fleet
48 we see expenditures as well in 1995, Carbonear again,
49 \$162,000. In 1991, \$250,000. A truck like that, 712(a), an

50 International C & C, \$250,000, you've had it for 12 years.
51 Can you explain why you would spend \$250,000 over
52 that time on a truck like that?

53 MR. LUDLOW: Again, I don't have the maintenance
54 history in front of me, Mr. Browne, but which one is it
55 again, three?

56 MR. BROWNE, Q.C.: 712(a).

57 MR. LUDLOW: 712.

58 MR. BROWNE, Q.C.: 432, Carbonear.

59 MR. LUDLOW: Okay, 1991, she's currently 11 years
60 old. What would happen in those vehicles, there was
61 a time when we basically ran our superstructure or the,
62 the ... no disrespect meant, but the manlift portion of
63 the vehicle which ... through two chasses, okay, so
64 what we would do is we would buy a chassis, transfer
65 this thing onto it, the superstructure and, what do you
66 call it, the lockers, and we'd run that as hard as we
67 could, as long as we could till the transmission and
68 engine failed or whatever, run it to break. Then you'd
69 put another transmission and another engine under it,
70 but what we've been finding is that by the time you got
71 through two of these, the superstructure had far
72 exhausted it's useful life. What we're talking about here
73 potentially could be one of those. \$256,000 on a
74 changeover, okay, if we go into parts, bearings on that
75 manlift portion, and this is not just a cab and chassis,
76 by the way, this is the unit. This involves hydraulics,
77 this involves the whole superstructure of booms and
78 electroresistivity and so on within the unit. A turret
79 bearing could easily set that unit back \$25,000, one
80 bearing. The original purchase cost, 1991, I would say
81 it was probably \$200,000. If that unit is being maximized
82 on the road, I would anticipate significant maintenance
83 on the wear and tear, be they jack legs, and we have
84 had issues with jack legs and scrubber pads and so on
85 within these. We've had turret bearing problems, pin
86 problems, and that's going to come out. Hydraulics,
87 you overhaul a unit, easily you're in the \$20,000 range.

88 MR. BROWNE, Q.C.: And Mr. Ludlow, if you had
89 followed your policy where the lifespan of the vehicles
90 is five years or 150,000 kilometers, or 10 years or 250,000
91 kilometers, would the expenditures be the same? You're
92 saying the policy is 10 years or 250,000, just go to 494
93 Clarenville, it's 1995, well that's 382,000 ... maybe I'll look
94 at it again during the break, Mr. Chairman, and see if

1 there's anything else to be gleaned from that, so we'll
2 leave that for now, and it's okay to have the break.

3 MR. NOSEWORTHY, CHAIRMAN: Thank you, Mr.
4 Browne, thank you, Mr. Ludlow, we'll break and
5 reconvene at 11:30.

6 (break)

7 (11:30 a.m.)

8 MR. NOSEWORTHY, CHAIRMAN: Thank you, Mr.
9 Browne, can I ask you to continue, if you're ready, Mr.
10 Ludlow.

11 MR. BROWNE, Q.C.: Thank you, Mr. Chairman. In
12 addition to the vehicles in your fleet, do you also rent
13 vehicles from time to time?

14 MR. LUDLOW: Yes, we do.

15 MR. BROWNE, Q.C.: And the rental of vehicles, is
16 that, on average, how many do you do over a year? Do
17 you have any idea, do you keep stats on any of that?

18 MR. LUDLOW: I'm sure we have stats somewhere. I
19 don't know what they are offhand, but when we would
20 rent would purely be around construction, in the event
21 that there was a requirement specific to a job, that type
22 of ... or a time of year, probably in September/October
23 when we're into heavy construction is mainly where a
24 lot of those types of things would occur.

25 MR. BROWNE, Q.C.: Yes, when I was coming up there
26 on Carpasian Road today, you had a line truck and right
27 across from it was a rental vehicle. Would that be a
28 norm to see a rental vehicle near a line truck?

29 MR. LUDLOW: No, I have no idea what they would be
30 doing on Carpasian Road. An example could be that
31 they were in vegetation management, but then that
32 wouldn't be our line truck. No, I'm sorry.

33 MR. BROWNE, Q.C.: Why would you be renting
34 vehicles? Don't you have enough vehicles in your fleet
35 to carry out the work that you have a duty to perform?

36 MR. LUDLOW: No, we have a mix of vehicles. What
37 we try to do is we, it's no different than we manage our
38 human resources. We have a fleet to carry out the day
39 to day operations. At times there will be peak, and we

40 try to minimize the time when the vehicles aren't in use,
41 and we fill that peak through rentals.

42 MR. BROWNE, Q.C.: So during peak periods you'll
43 rent.

44 MR. LUDLOW: Pretty much, or if there's a specific use
45 vehicle that's not available, that type of thing, that's
46 what we'd use it for.

47 MR. BROWNE, Q.C.: Does someone monitor the rental
48 charges year over year that you have in your budget
49 for vehicles?

50 MR. LUDLOW: If you're referring to the costing of the
51 actual rental, that's done corporately and on the
52 marketplace. With respect to the level of expenditure
53 that goes to operating expense, which is where this
54 would go, in the leasing, is there a total built
55 (phonetic), no there's not.

56 MR. BROWNE, Q.C.: Is there any money in this capital
57 budget for renting vehicles?

58 MR. LUDLOW: The only place that there could
59 potentially be a charge to the capital budget is if in the
60 event that the construction project took place and a
61 vehicle was rented at that point, but there is no dollars
62 allocated right now to that purpose. It would be no
63 different than a corporate fleet vehicle that would be
64 charged to a project. Instead of the corporate fleet
65 vehicle charging to capital, it would be a lease.

66 MR. BROWNE, Q.C.: We'd be curious to see how
67 much money is spent on leasing of vehicles year over
68 year. Can you undertake to provide that information, if
69 it's within your corporate capacity to tell us how much
70 money year over year is charged to the rental of
71 vehicles?

72 MS. BUTLER, Q.C.: I wonder, Mr. Chairman, though,
73 with respect to a lease payment being an operating
74 expense and not a capital expense, and in view of the
75 witness' answer whether, in fact, the undertaking in
76 response to that request, would that be relevant?

77 MR. BROWNE, Q.C.: Do you prefer to do it during the
78 general rate application?

79 MS. BUTLER, Q.C.: I don't see that it has any
80 relevance to this.

MR. BROWNE, Q.C.: Okay, six of one, half dozen of the other. If you want to do it for that, that's fine. In U-4, your undertaking in reference ... I asked you the number of unmarked vehicles in Newfoundland Power's fleet from 1997 to 2002, and you say that the information was not available on a year by year basis, but as of November 1998, Newfoundland Power had a total of 20 unmarked vehicles in its fleet and this information was contained in the undertaking, Newfoundland Power's 1998 general rate proceeding, but as of October 2002, Newfoundland Power had a total of 44 unmarked vehicles in its fleet. Why is that?

MR. LUDLOW: Well, as we went through yesterday, in the first quarter of 2000 and ... sorry, 2000, we did change the guidelines, and those were the ones that we were discussing yesterday. There were blocks, I had mentioned the general foremen, but there were some technicians and also some others as well, and that's basically the reason that those numbers have changed, because of a policy change within our corporation.

MR. BROWNE, Q.C.: Okay, you have the policy change, and you make more available to your general forepersons, engineers and technicians. As a result of that policy change you make unmarked vehicles available to them, is that part of their compensation package?

MR. LUDLOW: What we have said yesterday and I'll repeat again, in here in those unmarked vehicles, there are some that are compensation, my own, the executive's. The use of the vehicles for the managers, superintendents and general forepersons, etcetera, that is not part of their compensation, if I were to put their compensation package out. However, I'm sure there is some residual benefit to them from that vehicle.

MR. BROWNE, Q.C.: Can you go to the Grant Thornton report, CA-124, Appendix D, please?

MR. LUDLOW: Appendix D?

MR. BROWNE, Q.C.: CA-124, Appendix D, you'll find the Grant Thornton report from 2001, the annual financial review, and if you go to page 14 of that.

MR. LUDLOW: Yes.

MR. BROWNE, Q.C.: Okay, down toward the end, the third bullet from the bottom, miscellaneous charges of \$339,722, 2000 ... 124 14 were charged to Belize

Electricity and relate to the purchase of two line trucks from Newfoundland Power. Why did Newfoundland Power sell two line trucks to Belize Electric?

MR. LUDLOW: I mentioned yesterday that in the, I do believe it was the fall of 2000, there was an emergency situation in that particular country with Hurricane Keith, and that rolled ashore in October, and having spent a month down there myself ...

MR. BROWNE, Q.C.: You spent a month there?

MR. LUDLOW: Yes.

MR. BROWNE, Q.C.: You spent a month yourself?

MR. LUDLOW: I spent, yes, I spent a lot of time on that project, and my time was adequately charged in that direction, I might add.

MR. BROWNE, Q.C.: We'll review all that at the appropriate time, but anyway, continue.

MR. LUDLOW: And as a result there was a requirement for two vehicles. We had two that we could, how would I say ... one that had just come in and we decided at that point to go to market and get the value from the market that the truck would draw, and that was the basis upon which we sold that truck to Belize Electric. And similarly, there was another truck, which was a new one, that hadn't even entered, and what we did is we reordered and put that one in, and they paid the bill, effectively is where those charges came from, and that's the basis upon which the rates were derived.

MR. BROWNE, Q.C.: So one was a brand new truck that was on order, you redirected it to Belize.

MR. LUDLOW: It may have been here and then sent on, but it hadn't been in service. If it was in service, it was very short.

MR. BROWNE, Q.C.: And the other one was in service?

MR. LUDLOW: The other one was a five year old vehicle, if my memory serves correct.

MR. BROWNE, Q.C.: But doesn't that beg the question, if you could take two vehicles and give them

1 to Belize, or sell them to Belize Electric, that you really
2 need these vehicles to begin with here?

3 MR. LUDLOW: Well, that's an interesting question as
4 well, because as you run a fleet of 88, 86 or 88 now,
5 large vehicles, it depends on the utilization rates of
6 those vehicles, whether you have spares, and where the
7 specific mixes are. What we have been doing over the
8 years, we've been bringing that number down. At one
9 point, if my memory serves right, we were as high as
10 103, 104, and we got it back to 88. At that point, and at
11 that point in the usage of those vehicles we saw that
12 we could manage to get by for a couple of months ... a
13 couple of months, it would be six, seven months, to
14 move those vehicles on to Belize at the market rates that
15 were available.

16 MR. BROWNE, Q.C.: The vehicle that you, that wasn't
17 new, how did you determine the price for that? Did you
18 offer it for sale on the open market here?

19 MR. LUDLOW: My recollection was that we went to
20 truck manufacturers or buyers or whatever the ... what's
21 the word I'm looking for ... it's very difficult to get a
22 market through an option, a market price through
23 option or anything of that type. What we did was we
24 would have gone to either trucking manufacturers, or to
25 companies such as GE capital, which would give us a
26 market based price. If memory serves right, there were
27 two, if not three market based prices obtained, and
28 that's how it was done. The local market is not big
29 enough to give a reasonable or accurate reflection of
30 the pricing of those vehicles.

31 MR. BROWNE, Q.C.: Is this something new for
32 Newfoundland Power, selling vehicles from its fleet to
33 a sister company?

34 MR. LUDLOW: No, I mean of this type and magnitude,
35 yes, I would think so, but I know when I worked at
36 Maritime Electric, that fleet was bought by Maritime ...
37 my fleet, my truck at that point in 1994. Similarly,
38 anyone else that's ever moved, so there's been vehicle
39 transfers through those periods, and they've been
40 evaluated accordingly.

41 MR. BROWNE, Q.C.: Yeah, where the executive is
42 moving between companies.

43 MR. LUDLOW: Correct.

44 MR. BROWNE, Q.C.: But Newfoundland Power
45 generally is not in the business of selling vehicles of its
46 fleet to third parties.

47 MR. LUDLOW: No, unless we're ... I mean ... well, that's
48 not totally true either. We have a situation existing
49 today that if I have a surplus vehicle, I'm not going to
50 keep it in the fleet and have it parked, I will sell it, and if
51 that becomes surplus for many reasons, it could be ...
52 I'll acknowledge, poor planning, it could be bad
53 specification, or in fact, something has changed in the
54 way we service our customers and it becomes surplus,
55 we would sell it.

56 MR. BROWNE, Q.C.: How often does that happen, Mr.
57 Ludlow, that you've had a surplus vehicle that you've
58 sold?

59 MR. LUDLOW: Well, within the last two months, we're
60 looking at the disposal of a vehicle right now that's
61 within the ... the age of it escapes me ... potentially to
62 Nunavut Power.

63 MR. BROWNE, Q.C.: To who?

64 MR. LUDLOW: Nunuvut Power.

65 MR. BROWNE, Q.C.: Who is Nunuvut Power?

66 MR. LUDLOW: The, what would you call it ... it's
67 Iqaluit.

68 MR. BROWNE, Q.C.: Was that a line truck you're
69 selling up there?

70 MR. LUDLOW: There is a line truck that's become
71 available because it's a digger unit that was in the fleet
72 that has been deemed surplus that we're getting rid of.

73 MR. BROWNE, Q.C.: And what year and model is it, do
74 you know?

75 MR. LUDLOW: I have no idea what it is.

76 (11:45 a.m.)

77 MR. BROWNE, Q.C.: You also have a number of
78 vehicles, through one of the information requests there
79 that I gave, on order from the previous budget, and
80 they haven't been filled yet for vehicles, is that correct?

81 MR. LUDLOW: That's correct, yes.

MR. BROWNE, Q.C.: And so you ordered them in, in this instance, in what year, 2001, is it?

MR. LUDLOW: Well, I can't order vehicles until I get the approval for my budget, to start with, and when I get the approval of the budget, then I have the requirements ... when I say a requirement, it's the specification for the vehicle. This is not a purchase that you would make ... and I go back to the information that was handed out earlier, these aren't lined up on a parking lot ready for purchase. These are unique, from height, storage, equipment storage, the ability to reach, chassis, tandems, and so on, so then you go through your design specifications, within the general parameters of what's been highlighted and expected for the budgets. Then we go to market, and then the things are made, so this year we were too late to meet the production runs for 2002, and they have now been carried to, I do believe expected delivery of the units are ... I've got April 2003. The date of the actual order, I don't know, but it would be in the spring/summer, 2002.

MR. BROWNE, Q.C.: And in the meantime you just made do with existing vehicles, did you?

MR. LUDLOW: That's the reason that you're seeing our operating costs climb, as we were talking just before the break, and you will see that from time to time, that some of these trucks will, in fact, go through substantive repairs to keep them going for an additional year.

MR. BROWNE, Q.C.: Okay, I'll move away from the area of vehicles now, and go to CA-29, please. Now in Schedule B, page 33 of 82, you stated that you're seeking approval of the Board to spend \$500,000 for a transmission system engineering study, and we've asked several questions about that. How did you come up with the figure of \$500,000?

MR. LUDLOW: Well, the \$500,000 was first of all looked at from two locations. It was the southwest coast, and the Conception Bay North. The labour component of that we would be estimating somewhere in the range of about \$60,000 to \$70,000 each, and the balance would be for what I would think about detailed engineering, we need surveys, we need to see whether or not this is even feasible, potentially to the point of environmental impact studies, if these are required, and that's how the \$500,000 was roughed in around those numbers.

MR. BROWNE, Q.C.: And I think you just said that it was sort of even, \$250,000 for each particular one, is that correct?

MR. LUDLOW: That's our best estimate right now, yes.

MR. BROWNE, Q.C.: Now, in reference to Port Aux Basques, and we'll just move with that for a moment, in Port Aux Basques you just completed the Rose Blanche development, and when you completed the Rose Blanche development, was there not an engineering study done in that particular area at that time?

MR. LUDLOW: There was an engineering study completed as to the feasibility of Rose Blanche Brook, and also the continued patterns for the area of reliability and so on, yes, that is correct, or at least it was considered.

MR. BROWNE, Q.C.: And when you completed Rose Blanche, did you not build the transmission line of a certain length in the Rose Blanche area?

MR. LUDLOW: No, we did not.

MR. BROWNE, Q.C.: There's no trans ...

MR. LUDLOW: We built a distribution feeder extension off Long Lake 02 which comes out of Long Lake substation, which is fed by a transmission line from Grand Bay West into the Rose Blanche Brook area.

MR. BROWNE, Q.C.: So in building that, would you not have then studied the terrain and what's required in reference to that particular construction?

MR. LUDLOW: The feeder section that was built is approximately five to six kilometers long, and it goes from the main road servicing the southwest coast, back in the access road to Rose Blanche Brook. That terrain is in the river valley. We are well aware of the terrain between Grand Bay and Long Lake and it's pretty rough terrain. The difficulty here is that this study for the southwest coast that we are proposing is to look at several options.

MR. BROWNE, Q.C.: Can you go to the Rose Blanche study itself, can you go to CA-17(h).

MR. LUDLOW: 17(h)? Okay, I'm sorry, yes.

1 MR. BROWNE, Q.C.: Sure, can you go to paragraph 4
2 of the executive summary and read that into the record,
3 please?

4 MR. LUDLOW: Paragraph 4?

5 MR. BROWNE, Q.C.: That's on page (i).

6 MR. LUDLOW: Paragraph 4, page (i), beginning with
7 Port Aux Basques?

8 MR. BROWNE, Q.C.: Yes.

9 MR. LUDLOW: The Port Aux Basques area is served
10 by a long 184 kilometer series of radial transmission
11 lines that traverse an area which is subject to some of
12 the harshest weather conditions in the province. For
13 this reason, an additional source of generation in the
14 area will provide enhanced security and reliability of
15 supply. While upgrading of the lines has resulted
16 improved reliability in recent years, a weather induced
17 interruption in the transmission supply would leave the
18 Port Aux Basques area with only enough power to meet
19 45 percent of its peak requirements.

20 MR. BROWNE, Q.C.: Okay, that paragraph makes
21 reference to upgrading of the lines has resulted in
22 improved reliability in recent years. Are these the same
23 lines now that you want to do the study on?

24 MR. LUDLOW: The lines references in this paragraph
25 are lines currently owned and operated by
26 Newfoundland and Labrador Hydro and, yes, that is the
27 case. Those are the ones, they are still long radial
28 transmission lines and are still subject to the worst and
29 harshest weather conditions anywhere in this province.

30 MR. BROWNE, Q.C.: Yes, and that probably won't
31 change no matter what happens. Can you go to the
32 introduction, please, page 1. Can you read out
33 paragraph four to us, please?

34 MR. LUDLOW: Page 1, introduction, paragraph 4. The
35 1997 capital expenditures for the first phase which
36 included engineering costs constructed a 6.5 kilometer
37 access road and a portion of the five kilometer
38 transmission line.

39 MR. BROWNE, Q.C.: Now, didn't you just tell me you
40 didn't construct a transmission line there?

41 MR. LUDLOW: What I said is I built a line along the
42 access road into the plant and it operates at a
43 distribution voltage, and that's what's referenced here
44 as a transmission line.

45 MR. BROWNE, Q.C.: Okay, so I'm not entirely wrong
46 in that.

47 MR. LUDLOW: No, but I guess we're both right. We'll
48 agree on this one, Mr. Browne.

49 MR. BROWNE, Q.C.: Okay, you're being a bit cute, I
50 would say, anyway, continue.

51 MR. LUDLOW: And a portion of the five kilometer
52 transmission line and certain expenditures in relation to
53 the supply of mechanical electrical equipment were
54 approved by the Board. Construction of the first phase
55 is now nearly complete and were approved by the
56 Board. Sorry, and complete, and the mechanical
57 electrical equipment is now on order. Since the filing of
58 the initial application, design improvements have
59 resulted in the upgrading of the plant's capacity to 6.1
60 megawatts, and the projected average annual energy
61 production of the plant has increased from 22 gigawatt
62 hours to 23 gigawatt hours.

63 MR. BROWNE, Q.C.: Okay, and on page 2 of the
64 project description, can you read paragraph 4 into the
65 record, please?

66 MR. LUDLOW: Project description, page 2, paragraph
67 4. A five kilometer, 25 kV, single wood pole
68 transmission line is to be constructed from an existing
69 distribution feeder near Rose Blanche, Harbour Le Cou,
70 to a substation adjacent to the powerhouse. The
71 substation will step up the generation voltage to 25 kV
72 from a 6.9 kV generator powered by the single
73 horizontal Francis (*phonetic*) dual turbine located in
74 the concrete and steel powerhouse.

75 MR. BROWNE, Q.C.: Now, as part of your estimates in
76 doing Rose Blanche, if you had already constructed a
77 five kilometer transmission line, 25 kV, single wood pole
78 transmission line, you must have some idea of the cost
79 that would be involved in constructing a line in that
80 particular terrain.

81 MR. LUDLOW: To answer this question, may I bring
82 up the slide that I used in my presentation, please,
83 Chris, if you could?

1 MR. BROWNE, Q.C.: If you can answer the question
2 rather than give us a lecture it would help. I'm trying to
3 get this done with as well.

4 MR. LUDLOW: I'd only be too happy, sir.

5 MS. BUTLER, Q.C.: Yeah, Mr. Chairman, that's not fair.

6 MR. NOSEWORTHY, CHAIRMAN: I think, no, I think
7 ... go ahead.

8 MR. BROWNE, Q.C.: Yeah, okay, fair enough.

9 MR. NOSEWORTHY, CHAIRMAN: Go ahead, Mr.
10 Ludlow.

11 MS. BUTLER, Q.C.: Can you give us the slide number
12 please?

13 MR. LUDLOW: It would be ...

14 MS. BUTLER, Q.C.: Are you looking for the Port Aux
15 Basques radial line there?

16 MR. LUDLOW: Slide 13.

17 MS. BUTLER, Q.C.: Yes.

18 *(12:00 noon)*

19 MR. LUDLOW: Maybe it's not. There you go, just the
20 next one, go to 15, Chris? Mr. Chairman, yesterday
21 when I spoke to this slide, and in trying to put out the
22 perspective of why we're trying to address, or at least
23 study and look at this area of the province with a formal
24 proposal, or if, in fact, there is no alternative, we don't
25 know. If you look at this slide, Long Lake in the bottom
26 of the slide then goes on to Rose Blanche, the red dot.
27 That's Rose Blanche Brook that Mr. Browne is referring
28 to. The transmission line 416-L is the one I referred to,
29 operates at 69,000 volts that we built back in the early
30 eighties. There's some pretty rough terrain down on
31 the south coast. The alternative that's being looked at
32 here is whether or not we tie back to Bottom Brook, tie
33 into Hope Brook, or in fact, not do transmission work
34 and further increase our ability to back up the
35 customers on the southwest coast, which is currently
36 at 65 percent. We do have general estimates of
37 construction in rough terrain, however, we are not
38 familiar with what the alternative costing would be for
39 the various alternatives.

40 MR. BROWNE, Q.C.: Page 6 of the Rose Blanche
41 study, can you go to that, please, the fourth paragraph
42 where it reads, "the transmission line has also been
43 surveyed and designed", that refers to the five
44 kilometer transmission line in reference to the
45 construction of Rose Blanche, is that it?

46 MR. LUDLOW: That is the transmission line that's
47 referenced in this report from the powerhouse back out.
48 There is no work that I'm aware of on any ties back into
49 any of those other areas that I have completed or been
50 party to. This is a new project that we have put forward
51 to secure the southwest coast, so that is not a
52 reference.

53 MR. BROWNE, Q.C.: Now, in reference to that, you
54 would have knowledge of the exact length of your
55 transmission lines now, wouldn't you, out there?

56 MR. LUDLOW: Yes, I would.

57 MR. BROWNE, Q.C.: And you would know roughly
58 what it would cost, from a replacement perspective, to
59 replace those lines, wouldn't you have some idea of
60 that?

61 MR. LUDLOW: I could rough that in, yes, I can.

62 MR. BROWNE, Q.C.: So really it's not rocket science.
63 Why do we need a study at this particular interval?

64 MR. LUDLOW: I'm a little bit perplexed here. We are
65 not looking at the rebuilding of the radial line. We are
66 looking at a means or a way to secure alternate feeds for
67 our customers on the southwest coast. To your
68 question regarding average construction costs, those
69 would be on a single pole structure, roughly \$65,000 a
70 kilometer, slightly higher for H-frame. That's the rough
71 ranges. What we are studying here is not the cost to
72 replace a line, but whether or not it's even feasible to
73 build and tie in an alternate source through Hope
74 Brook, or alternatively through the addition of
75 generation or what can be done down through the
76 valley through Doyles.

77 MR. BROWNE, Q.C.: Are you aware that
78 Newfoundland Hydro, as part of its capital budget,
79 wants to spend an amount to improve reliability in that
80 very area?

81 MR. LUDLOW: Yes, I am, and I'm very glad to see
82 some aggressive moves on those fronts.

MR. BROWNE, Q.C.: Okay, I just want to show you this for a moment, from Newfoundland Power's (*sic*), Newfoundland Hydro's capital budget, I guess it is.

MS. NEWMAN: I stand to be corrected, but I guess that would be information eight.

MR. LUDLOW: Thank you.

MR. BROWNE, Q.C.: And I've just given you the summary of a study conducted by TRO Engineering, I guess. I think I got this from the Newfoundland Hydro budget. I stand to be corrected, but I suspect that's where it comes from. There's been a bit of water under the bridge. Can you just read the first two paragraphs of that summary for us, Mr. Ludlow?

MR. LUDLOW: Transmission line TL-214 is a 138 kV transmission line which runs from Bottom Brook to Doyles, a distance of 118 kilometers. The line was constructed in 1968 and is a radial line serving Newfoundland Power's customers from Doyles to Port Aux Basques and surrounding areas. The second paragraph as well?

MR. BROWNE, Q.C.: Sure.

MR. LUDLOW: For the last number of years concerns have been expressed regarding the reliability of TL-214. The performance of a transmission line can be measured and compared by two statistics, delivery point and equipment performance. Since this is the only line serving the area, it is important to review both statistics.

MR. BROWNE, Q.C.: Okay, and they continue on there to give a summary and give four areas of concern, and then if you see in the next page, their capital budget proposal, can you read that out?

MR. LUDLOW: A capital budget proposal for \$2,946,900 has been submitted for the 2003/2004 to carry out the work. The planning and design will be undertaken in 2003, with the actual construction scheduled for 2004.

MR. BROWNE, Q.C.: Okay, so their spending is not much shy of \$3 million, so they're proposing that the Board give that amount for that area to improve reliability at the same time that you are proposing a study. Wouldn't it be prudent and reasonable to wait and see how that goes, to see if the Board approves

that aspect of the budget and if work is carried out there, and what effect that has on the system totally prior to embarking upon any further studies in Port Aux Basques? I mean how much money do you pour into an area?

MR. LUDLOW: Where I'd stand on that one, Mr. Browne, is fairly clear. These are two separate issues. Number one, Newfoundland and Labrador Hydro is spending money here to perform maintenance, capital maintenance, which is an oxymoron in itself, on that 118, I think it is, kilometer line to bring it up to a performance level with which both they and us have discussed to great lengths through the inter-utility reliability committees. It is currently underperforming. Am I willing to wait another five years to see whether this investment has done its work? No, I am not. What I am saying is even after this investment in 2004, you will still have a radial transmission line, a total extent of about 145 kilometers ... working through the worst areas of the province, and our proposal is to investigate alternatives to the radial transmission system serving the southwest coast. That is our proposal, and now is the time to do this study.

MR. BROWNE, Q.C.: But if you go back to page (i), you told the Board in 1997 that the upgrading in the lines had resulted in improved reliability in recent years when you sought money to put \$14 million into Rose Blanche, isn't that correct?

MR. LUDLOW: If you're referring to the Rose Blanche study?

MR. BROWNE, Q.C.: Yes.

MR. LUDLOW: That is correct, we have improved reliability. Since that time there have been fixed diesels that had exceeded their useful life, been removed from the generating capacity in that area, and even today, as I said before this Board yesterday, if we had an outage overnight, albeit short, to that whole area, the result of this transmission line reclosing, if it went out, we can only support 65 percent with everything working properly, and that's everything.

MR. BROWNE, Q.C.: Okay, we'll just move away from that study that you're proposing in reference to, in reference to Port Aux Basques. Can you go to PUB-4.2, please?

MR. LUDLOW: Was that 4.2, Mr. Browne?

MR. BROWNE, Q.C.: Yes, thank you, and here we're dealing with your proposal to purchase a portable diesel generator at \$1,500,000. I think I asked some questions on it and I was referred to this particular response you gave the Public Utilities Board.

MR. LUDLOW: Yes, if you can bear with me one second.

MR. BROWNE, Q.C.: Sure.

MR. LUDLOW: I'll get myself tied together here. Yes sir, sorry.

MR. BROWNE, Q.C.: And I think this is a proposal to purchase one of two portable diesel generators. You're proposing one this year and another the next year, is that correct? You say you'll have \$3 million worth of portable diesel generation on the island?

MR. LUDLOW: You'll have five megawatts of portable diesel generation if we proceed with next year's budget allotment as well, yes.

MR. BROWNE, Q.C.: Okay, and the Board asked you to do a study or to provide your study, I guess, in reference to this proposal. The proposal was made in your budget and your budget was submitted in August to the Board. If you go to PUB-4.1, Attachment A.

MR. LUDLOW: Yes.

MR. BROWNE, Q.C.: And we see here a study, I guess, that's been prepared. The study is dated October 2002, so was that prepared after your budget was submitted?

MR. LUDLOW: This document was prepared, and is a consolidation of various pieces that have been within our business for a while, so the actual report is so, yes.

MR. BROWNE, Q.C.: So you proposed the budget expenditure and what did you do then, provide the justification for it after you decided to purchase the proposed purchase of the portable generator?

(12:15 p.m.)

MR. LUDLOW: No, Mr. Chairman, what we did is we've been studying portable diesels, and we have a fair bit of expertise and experience in this area and we've been watching where things are going, and the, when

the Board asked the question, what we decided to do was to pull this all together in one concise document and that's the report that was presented to the Board in response to PUB-4.1(a).

MR. BROWNE, Q.C.: Now the study itself, you propose to locate these particular portable generating units, and if you go to page (ii), where is it that you're proposing to put them exactly?

MR. LUDLOW: Page (ii)?

MR. BROWNE, Q.C.: Yes.

MR. LUDLOW: The last paragraph?

MR. BROWNE, Q.C.: Sure.

MR. LUDLOW: It is recommended that one of these units be located on a semi-permanent basis at a substation in the Avalon area, possibly Trepassy or Old Perlican, and another in the Stephenville area, possibly Abraham's Cove or Port Aux Basques.

MR. BROWNE, Q.C.: So you haven't decided exactly where you'll place it if you get it. If the Board grants you approval for this particular portable generator, and you go out and purchase it, where is it going?

MR. LUDLOW: The whole idea behind a portable generator is during the ice seasons and winter seasons, it's parked in a place we're at most risk, hence the identification of the four locations identified in the report. It's available for short-term haul into areas in the event the ice storm occurs. Right now I would predict, Mr. Browne, that that unit would be parked in Port Aux Basques since there are two pending decommissionings of the existing portables that are in Port Aux Basques from the early seventies.

MR. BROWNE, Q.C.: So you're planning to park this one in Port Aux Basques?

MR. LUDLOW: Yes, we are.

MR. BROWNE, Q.C.: Okay, page 2, can you go to that in the study, please, and can you read the third paragraph there into the record, beginning with, "while the past"?

MR. LUDLOW: While the past in this circumstance is the best information for projecting the future, it is not

without its problems. There have been many improvements in the power system over the past ten years and many of them focused on areas that have had the worst reliability. The use of the statistics for purposes of this analysis also focuses on the worst reliability areas. Care has to be taken in using the data, that a possible benefit of a portable generation has not already been addressed through the rebuilding of a transmission line or feeder in recent years. In addition, the reliability improvements ... in addition to reliability improvements in some areas, deterioration of other lines has also occurred, and to some extent these two factors will offset one another. In general though, NP's system has seen a net improvement in reliability over the past ten years, and as a result the improved reliability estimated from this analysis may be slightly overstated.

MR. BROWNE, Q.C.: Okay, and it's my understanding from reading this report that if you have a portable generator, you wouldn't move the portable generator for 24 hours until it could be determined if it was needed in a particular area during an outage, is that correct?

MR. LUDLOW: No, that's not correct. It will take us 24 hours to move this unit, and that includes start-up, set-up, and what have you, and I may be slightly off, that may go to 30, it might be slightly under, depending on the travel, but it's ... this is a ... sorry, that's my answer. I'll be here till Christmas.

MR. BROWNE, Q.C.: I put it to you, sir, that if you parked that out in Port Aux Basques and it's a storm in the Wreckhouse area, you might have to wait longer than 24 hours to move that.

MR. LUDLOW: I agree, but if we have a storm in the Wreckhouse area, and we lose that transmission line, it will be in good use in the Port Aux Basques area as well.

MR. BROWNE, Q.C.: And say Port Aux Basques, so what would the parameters be? You'd move this portable generator from where to where geographically?

MR. LUDLOW: Let's bring it back to an example, if that would help, okay. This unit at two and a half megawatts, to put it in perspective, will not carry a typical distribution feeder in Newfoundland Power's system. I like mathematics, I'll go back there a little bit. Our typical, our load last year peaked at 1,200 megawatts. We have 300 feeders. The average feeder

loading is roughly four megawatts. Now, what we're doing with this unit is threefold, and in response to Mr. Browne's question, right now is a very vulnerable time for this business, as is April/May. Ice and wind is not a good combination. This unit would be used to support long radial lines, distribution level lines, and that would be at the 4,160 or 12,500 level.

Example, prior to rebuilding, and I'll go back to Old Perlican for a minute if I may. 1998, the Old Perlican barrens, the barrens were flattened by ice. The community of Bay de Verde, Redhead Cove, Grate's Cove, were isolated. We couldn't fit the distribution voltage out there, we had no poles. Literally, it was mechanical failure, it was gone. What we would do is we would take this unit and transport ... and I use the extremities to make the point, from Port Aux Basques, which is probably the farthest reaching place to put it, move it to Old Perlican, and tie it into a base on the distribution system out there and run the Old Perlican, Redhead Cove, Grate's Cove, separate from the other part of the company. All that said and done, we may be able to carry half of the load, but what we can do is we can supply seniors' homes, soup kitchens, and provide some necessities of life, such as firefighting and water supplies, and that's the type of thing that we would try to do in areas such as Trepassey with this type of unit. It's not big enough to carry the full loading on these feeders. That's where the 24 hours would come in. It may be 36, it might be 48, but our repair time could easily be multiples of days.

MR. BROWNE, Q.C.: So it would go to a select area.

MR. LUDLOW: Correct.

MR. BROWNE, Q.C.: Now if power was out on the whole island, say if we got a Quebec situation, a major sleet storm, how would you pick and choose where it would go?

MR. LUDLOW: Well, I guess that's going to be a real big problem, because that would be based upon the need. From sitting here, and if I was in the, what I would call ... I would be on the hot seat at that point really, we would be addressing necessities of life, we would value the hospitals in the event that their standby is not adequate. We would have to be looking at different types of scenarios, such as that. In addition to this, we run a 7.2 mobile gas, 7.2 megawatt, that's also ready for dispatch, so all said and done, if this

1 island is flattened, two and a half megawatts is not
2 going to do you very much good.

3 MR. BROWNE, Q.C.: Do you have a portable
4 generator, a comparable generator on the island that
5 you are using right now, or is this a new purchase?

6 MR. LUDLOW: We have two mobile diesels parked in
7 Port Aux Basques. There's a 670 kilowatt, and a 700
8 kilowatt unit. Both are from the 1970s. One is no longer
9 roadworthy for safety reasons. We have also, we are
10 under environmental restrictions on fuel storage on
11 both units because of the age and the construction of
12 them. Both, parts are near impossible to get and are in
13 need of repair, hence the reference to their
14 decommissioning in, I think it's 2003.

15 MR. BROWNE, Q.C.: Can you just go to 17(b), please.

16 MR. LUDLOW: 17 ... CA?

17 MR. BROWNE, Q.C.: 17(b), Mr. Ludlow, yes, I'm sorry
18 ... CA.

19 MR. LUDLOW: Yes sir.

20 MR. BROWNE, Q.C.: Okay, I asked you there, the
21 portable generator that's presently in Port Aux Basques,
22 to give us the locations it has been used ... and I just
23 chose since 1996, the last seven years. Can you read
24 out the locations for us, where it's been used, or has it
25 been used anywhere other than Grand Bay, Port Aux
26 Basques, where it's parked?

27 MR. LUDLOW: According to Table No. 1, it has not
28 moved.

29 MR. BROWNE, Q.C.: Yeah, okay, so that's one of them.
30 Now go to 17(c), the portable generator, 17(c), and
31 that's the other portable generator. Where has that
32 moved in the last, since 1996?

33 MR. LUDLOW: It hasn't moved, sir. It can't move. It's
34 not roadworthy.

35 MR. BROWNE, Q.C.: Yeah, and we may get to that, so
36 you're saying you're replacing these two which haven't
37 moved since 1996, so really this is something new
38 you're bringing in. You're going to park it out there
39 again, in Port Aux Basques, you're telling me. What
40 guarantee would the Board have that you are, indeed,

41 going to move it or just let it there, leave it there on
42 site?

43 MR. LUDLOW: Again, I'd take you to 17(a), which is
44 the mobile gas, and as you scan through the mobile
45 gas, you will see it has been used.

46 MR. BROWNE, Q.C.: If you keep going you'll probably
47 find a usage there.

48 MR. LUDLOW: It's there, it's in Abraham's Cove, it's
49 been in Trepassey, and it's been in Robinson's. It's also
50 been in Deer Lake, and it's also been in Bonavista in
51 previous years, and the main difference is that this 7.2
52 megawatts has the capacity to carry a distribution
53 feeder rather than 670, which is one, I can't do the math
54 on that one ... what, one quarter of what we're
55 proposing.

56 MR. BROWNE, Q.C.: Now, in your proposal as
57 outlined in the, in your budget, as justification for the
58 project, and if you want to go back to that where it's
59 first mentioned in the budgetary item, the Schedule B,
60 page 15 of 82. Okay, if you can just keep on going you
61 can give us the project justification for it. Okay, just
62 stop there. It might be on the next page, Mr. Wells.
63 Okay, one of the justifications you give is that the
64 company also has a 2.5 MW diesel plant in St. John's,
65 and it was initially built to provide black start for St.
66 John's and that's no longer used. It's going to be
67 decommissioned, but when I asked you the question of
68 the usage in St. John's, and the schedule of usage, you
69 go to CA-18(c).

70 MR. LUDLOW: 18?

71 MR. BROWNE, Q.C.: We see that that St. John's diesel
72 plant over the last seven years, according to your
73 answer, the majority of the start-ups were for testing
74 purposes, and I don't believe it's been used since 1999,
75 has it?

76 MR. LUDLOW: That's correct.

77 MR. BROWNE, Q.C.: Well, how can that be used as a
78 justification for the purchase of this particular portable
79 generator, where that's not in usage since 1999 and
80 prior to that time it was just used for start-ups?

81 (12:30 p.m.)

MR. LUDLOW: The point made on page 16 of 82, Commissioners, is that this 2.5 megawatt diesel plant was built in the fifties to black start the southside steam plant which was decommissioned and removed from site two years ago. This diesel is beyond safe operating conditions electrically. Having been in the plant, I would not use that plant. That's the way I think about it, that's the way it is. We haven't called on it. Therefore, our proposal, and what we will do, we will apply to this Board next year to remove the two and a half megawatt diesel from the system and a justification, it's brought up here because we will remove it, simply as an information point.

The last time this was run in 1998 was for 600 minutes on two successive days, is the word I'm looking for, two successive days, and that was to facilitate repairs at the St. John's substation. That same work would be done in the future by a portable.

MR. BROWNE, Q.C.: Now, also on Schedule B, page 15 of 82, you say that the, I think the portable generator, the chassis of the portable generator ... just keep going down a ways there, Mr. Wells, thank you ... you say the transport chassis of Portable Diesel No. 2 is badly deteriorated. The unit is no longer roadworthy. When did that first come to your attention?

MR. LUDLOW: That unit, I would suggest about two years ago, three years ago.

MR. BROWNE, Q.C.: Was there a way at that time to repair that chassis?

MR. LUDLOW: Looking at the size of this diesel, the age of the diesel, the environmental concerns of the diesel and these have been all highlighted in these reports. Combine that with the expenditure on a 30 odd year old diesel, to put a new chassis under it, it was felt not to be a prudent expenditure.

MR. BROWNE, Q.C.: Can you go to CA-17(n), Attachment C. Now, we see here a document called the Diesel Power Plant Review. What's that document, Mr. Ludlow?

MR. LUDLOW: It's a review of our diesel plants that was conducted in 1997.

MR. BROWNE, Q.C.: And if we go to the executive summary of this, it's dated July 1997, if you go to the top of the page of the second page of the executive

summary, you'll see Portable Diesel No. 1 and No. 2. These are the portable diesels to which you're referring in Port Aux Basques, the two that haven't been moved since 1996?

MR. LUDLOW: I'm after missing the page, I'm sorry. It's page 2?

MR. BROWNE, Q.C.: Page 2 of the executive summary.

MR. LUDLOW: Okay.

MR. BROWNE, Q.C.: In CA-17(n), Attachment C, July 1997.

MR. LUDLOW: And that's the one on the screen there now, switch gear in the main plant, this one?

MR. BROWNE, Q.C.: It says Portable Diesel No. 1 and No. 2, yeah.

MR. LUDLOW: Okay.

MR. BROWNE, Q.C.: Can you read that out for us?

MR. LUDLOW: Instrumentation (inaudible) require replacement. Chassis of No. 2 in poor condition. Some spares available.

MR. BROWNE, Q.C.: Okay, and if we go down to the table there, it has plant historical costs, projected expenses, projected grossed up capital expenses, and life extensions, and if you look to Portable 1 and Portable 2, in terms of historical projected and projected grossed up capital expenditures, it's stated if you spent certain amounts of money there, what would the life extension of Portable No. 1 and Portable No. 2 have been?

MR. LUDLOW: It would have been ten years in 1997, with the ...

MR. BROWNE, Q.C.: So it would have brought us to what year?

MR. LUDLOW: It would have brought us to 2007.

MR. BROWNE, Q.C.: And the amount of money that's involved there, particularly Portable 1 and indeed with Portable 2, would you say that is, in terms of your budgets, not a significant amount of money?

MR. LUDLOW: I wouldn't say that, \$80,000 is quite substantial. That's \$79,000. In relation to \$56 million it's not substantial.

MR. BROWNE, Q.C.: And if we continue on with this, with this study, and you go to page 8, just continue on and go to page 8, and you talk about portable units, and under portable units, and I guess this is still July 1997, can you just read that into the record for us, sir?

MR. LUDLOW: The whole thing?

MR. BROWNE, Q.C.: Beginning with "portable units".

MR. LUDLOW: Okay, portable units, each unit consists of diesel generator sets mounted in a self-contained high bed road trailer. Each trailer includes all auxiliaries such as fuel tanks, switch gear and transformers. Unit No. 1, purchased in 1973, is rated at 700 kilowatts and has 4,610 operating hours. Unit No. 2, purchased in 1976, is rated at 670 kilowatts and has 2,204 operating hours. Both portables are currently stationed at the Grand Bay substation in Port Aux Basques. Both generating units are in good condition, mufflers are rusty and there are minor oil leaks on both engines. Radiators and fans are dirty, the trailer chassis on Unit No. 2 is very deteriorated. The machine is no longer roadworthy and, in fact, requires attention so that it's safe for stationary use.

MR. BROWNE, Q.C.: And can you give the consultant's recommendations?

MR. LUDLOW: Consultant's recommendations, units should undergo maintenance on the engine and the control panel instrumentation. The Unit No. 2 chassis should be refurbished if future portability is required.

MR. BROWNE, Q.C.: Now, why weren't those units overhauled at that particular point?

MR. LUDLOW: My predecessor, Mr. Evans, would have had responsibility for the generating portion of that area. I took this area in 2000/2001. From where I took it at that point, I can't comment why it wasn't. I can say that today those units, from everything I'm receiving from my supply group is that the units are hard to operate, it's difficult to get spare parts, and also the size of those units and the tender loving care that's required to keep them going is no longer of significant advantage. In 1970 the average load on the system, and I wish I had the number because I could give it to you,

it would be in relation to where we're projecting two and a half on the average feeder. It has grown. To invest money in these right now would not be a good investment.

MR. BROWNE, Q.C.: Right now, I don't know if you're right or wrong, but this is 1997 we're talking about, and we're talking about reasonableness and prudence there and following the recommendations of the consultant. The consultant also said Unit No. 2 chassis should be refurbished if future portability is required. Why was that not done? Was there ever a budgetary item that you can recall that would have been approved to replace that chassis in Unit No. 2? Do you recall that as a budgetary item anywhere?

MR. LUDLOW: I don't recall a budgetary item for the replacement, and one of the reasons that it hasn't been replaced is, again, due to size. To pull that 670 kilowatt across the island, Flight Canada would have a 400 there in the City of St. John's. So let's keep this in perspective, of the time it was purchased that was a substantive power plant. Today a 670 kilowatt unit will run one quarter of the Avalon Mall, that's what we're referring to, so what we have done is we've kept that unit stationary, as you so ably pointed out, Mr. Browne, in that it hasn't moved from Port Aux Basques. It can generate .67 of a megawatt in its current location, and that's what, the decision we took to use it in that manner, so it's a generator, on wheels, not portable.

MR. BROWNE, Q.C.: On page 13, the writer again says that with an investment the life extension would be for Portable 1 and Portable 2, ten years. Would you not agree that that's then ... under Table 4.

MR. LUDLOW: I agree, on page, Table 4, page 13, the life extension from 1997 was estimated at ten years with those costs.

MR. BROWNE, Q.C.: And on Table 6, in the evaluation matrix, on page 15, there's a rating of various plants that you have there. One is the best and nine is the worst. Where does Portable No. 1 come in in the overall ranking?

MR. LUDLOW: According to this table it's at No. 2.

MR. BROWNE, Q.C.: And where is Portable No. 2?

MR. LUDLOW: It's at No. 4. Wait now, I'm reading it wrong, 2 and 5, I'm sorry.

1 MR. BROWNE, Q.C.: Yeah, No. 5.

2 MR. LUDLOW: Too many numbers.

3 MR. BROWNE, Q.C.: Sure, so there are worse around
4 than that.

5 MR. LUDLOW: There were, and they were Aguathuna,
6 Gander, both of which have been decommissioned.
7 Port Aux Basques' main plant, that has also been
8 decommissioned, and not all the plant but those diesels
9 that were in there have been removed from service. Salt
10 Pond, No. 8, that has been decommissioned and
11 removed from site and remediation conducted at that
12 site. Port Union, that's a 500 kilowatt indoor generator,
13 and that's still in place.

14 MR. BROWNE, Q.C.: On page 19, after the Rose
15 Blanche Plant came on, it tells concerning the capacity
16 that would be required out there. In page 19, the third
17 paragraph from the bottom, the last sentence. The
18 combination of the 5.5 MW Rose Blanche Plant and a
19 2.5 MW refurbished diesel would replace most of the
20 capacity. Is that true?

21 MR. LUDLOW: Can I just take one second to read it in
22 context? That's correct.

23 MR. BROWNE, Q.C.: Does that stand true today?

24 MR. LUDLOW: It would replace most of the capacity.
25 The capacity referred to is, as I read this by reading
26 sentence by sentence here, refers to the installed
27 generating capacity in the area, not the capacity of our
28 ability to supply customers. Prior to Rose Blanche that
29 was at 45 percent, currently, at best, we're at 65.

30 MR. BROWNE, Q.C.: Now, and that brings us to these
31 two diesels, these portable diesels now. In March 1997
32 there's another report, and if you can go to that for a
33 moment, please?

34 MR. LUDLOW: Where would that be, sir?

35 MR. BROWNE, Q.C.: That's in the same exhibit under
36 diesel power plants, CA-17(n), Attachment C, and I
37 guess you just have to find the, find the page, it's called
38 Diesel Generator Review, March 1997, by Akers
39 International Limited. Akers International Limited, Mr.
40 Ludlow, do you know them?

41 MR. LUDLOW: It's an external consulting firm,
42 engineering firm. Oh, you've got me.

43 MR. BROWNE, Q.C.: Maybe Mr. Alteen can give you
44 a hand there.

45 MR. LUDLOW: Hold on, I'm on to something.

46 MR. BROWNE, Q.C.: It's a long morning.

47 MS. BUTLER, Q.C.: What page are you going to?

48 MR. LUDLOW: Okay, I have it.

49 MR. BROWNE, Q.C.: The page we're going to is page
50 27.

51 MR. LUDLOW: Okay, I have it, sir.

52 *(12:45 p.m.)*

53 MR. BROWNE, Q.C.: Okay, and on page 27, it begins
54 at the bottom of page 26, plant description on
55 (unintelligible). Can you read those two paragraphs
56 into the record, beginning with the last word on page
57 26, portable, and the first two paragraphs of page 27.

58 MR. LUDLOW: "Portable No. 1 is located in a steel
59 framed enclosed tractor trailer. The unit is complete
60 with a generator room, transformers, two 250 gallon
61 steel fuel tanks, and a switch gear/office room. The fuel
62 tanks are similar to those of those used for home
63 heating oil storage and are located inside the trailer
64 behind a wooden partition. They can not be inspected
65 as the partition wall is permanently fixed in place. The
66 trailer has valid", sorry, "a valid license for 1997, and is
67 presently connected to the grid. The trailer access,
68 stairs", I'm sorry, let me try again. "The trailer access
69 stairs are constructed of checker plate and can be
70 slippery in winter conditions. The trailer is heated,
71 engine cooling is by a radiator located at one end of the
72 trailer with a fan driven off the engine, into the engine
73 glycol is used. Portable No. 2 is contained in a steel
74 frame enclosed tractor trailer similar to Portable No. 1.
75 The steel underframe is badly corroded and should be
76 inspected and (unintelligible) prior to the next move.
77 The siding is in good condition. The interior is clean
78 and dry and contains a generator room and an
79 office/switch gear room. The trailer has a valid license
80 for 1997. The 500 gallon fuel storage tanks are attached
81 underneath the trailer and have recently, and have been
82 recently refurbished. The trailer is heated and is

1 presently connected to the grid. Engine cooling is by
2 a radiator located at one end of the trailer with fan
3 driver off the end of the engine, glycol is used".

4 MR. BROWNE, Q.C.: Okay, and at the end of the report
5 on page 32, the recommendation. The last paragraph
6 there beginning with the words "The portables", can
7 you read that into the record?

8 MR. LUDLOW: "The portables should undergo a
9 rehabilitation of engine instruments and safety devices
10 and calibration of control panel instrumentation. The
11 trailer base of Unit 2 should be refurbished if there is
12 any future requirement for portability, both units
13 should be retained in service".

14 MR. BROWNE, Q.C.: Both units can be retained in
15 service.

16 MR. LUDLOW: Well, okay, I've said "said"(sic).
17 Sorry, "Both units can be retained in service".

18 MR. BROWNE, Q.C.: Where the recommendation was
19 by the outside consultant that they should undergo
20 rehabilitation, I guess an overhaul of some kind, would
21 that be the, my understanding of what that would be?

22 MR. LUDLOW: That's the instrumentation and the
23 safety devices and what have you, yes.

24 MR. BROWNE, Q.C.: Why wouldn't the overhaul have
25 been done to preserve these two units so they could be
26 retained in service?

27 MR. LUDLOW: Well they have been retained in
28 service. We're now five years in, we will lose the five
29 years that you referenced earlier, Mr. Browne. Whether
30 this was complete or not, I can't speak to. I cannot
31 speak to whether all the safety and the instrumentation
32 checks were complete, but I do know from reading this
33 that the fuel storage tank was refurbished, so that tells
34 that those units did undergo a level, an appropriate
35 level of operating maintenance to keep them to this
36 point in time.

37 MR. BROWNE, Q.C.: Okay, because the outside
38 consultant said that they should be retained in service,
39 yet three years later we have, if you can go to that, the
40 Newfoundland Power Inc. Diesel Power Plant Review of
41 May 2000. Can you go to that for a moment?

42 MR. LUDLOW: I have it.

43 MR. BROWNE, Q.C.: And that's Newfoundland Power,
44 is that an outside consultant doing this now?

45 MR. LUDLOW: No, this would be internal.

46 MR. BROWNE, Q.C.: That's internal, okay. That's
47 Newfoundland Power Inc. Diesel Power Plant Review,
48 May 2000.

49 MR. ALTEEN: It's Attachment D to CA-17 in ...

50 MR. BROWNE, Q.C.: If you can go to the executive
51 summary, and I don't think it gives an author. Who
52 would have authored this, do you have any idea of
53 that?

54 MR. LUDLOW: No, sir, I would not.

55 MR. BROWNE, Q.C.: Page 3, the May 2000 report, if
56 you go down to portable diesel the table is there,
57 Portable Diesel No. 1 and Portable Diesel No. 2.

58 MR. LUDLOW: Yes.

59 MR. BROWNE, Q.C.: One, two, it's page 2, actually, of
60 the executive summary. It gives an historical annual
61 operating cost, what would it be for Portable Diesel No.
62 1?

63 MR. LUDLOW: You've got me ... okay, wait now. I'm
64 on ... okay, you're on page 2 ...

65 MR. BROWNE, Q.C.: Page 2 ...

66 MR. LUDLOW: I got it, it's on the screen, historical
67 annual operating, and your question was again, sir?

68 MR. BROWNE, Q.C.: Portable Diesel No. 1, can you go
69 over, can you review for us the historical annual
70 operating cost, the projected maintenance cost, the
71 projected capital expenses, and the extended life of each
72 of those, can you read those into the record for us?

73 MR. LUDLOW: I certainly can. Portable Diesel No. 1,
74 the historical annual operating cost was \$11,321. The
75 projected, the projected additional maintenance expense
76 was \$38,500, and the projected capital expenses were
77 \$31,200, with an extended life of ten years. Portable No.
78 2, Diesel No. 2, historical annual operating cost,
79 \$11,727, projected additional maintenance expense was
80 \$29,000, and projected capital expenses, \$96,200, with an
81 extended life of ten years.

1 MR. BROWNE, Q.C.: Okay, that would have extended
2 the life on those for ten years, but ... then you look at
3 the condition of diesel power plants, just continue on,
4 please, the Condition of Diesel Power Plants. I don't
5 think the pages are numbered here. Okay, the last two
6 paragraphs, can you read those into the record?

7 MR. LUDLOW: I can't even, I'm not even sure what
8 page you're on, Mr. Browne.

9 MR. BROWNE, Q.C.: Well there's no page so I can't be
10 of ...

11 MR. LUDLOW: Okay, I'm trying, I'm just, I'm just ...

12 MR. BROWNE, Q.C.: I can't be of too much assistance.

13 MR. LUDLOW: Condition Assessment of Diesel
14 Plants, Appendix A?

15 MR. BROWNE, Q.C.: It's Condition of Diesel Power
16 Plants. I think Mr. Wells has it correctly on the screen.

17 MR. LUDLOW: Okay, I have it, I have it.

18 MR. BROWNE, Q.C.: The last two paragraphs.

19 MR. LUDLOW: You wish those read into the record?

20 MR. BROWNE, Q.C.: Sure.

21 MR. LUDLOW: "Portable Diesel No. 1 is in satisfactory
22 condition with only minor oil leaks and dirty radiators
23 and fans. The continued use of this unit will require the
24 installation of secondary containment for the fuel tanks
25 on board, an engine overhaul and some minor repair
26 work to the trailer chassis. Portable Diesel No. 2 is in
27 satisfactory condition, with the exception of the trailer
28 chassis. The chassis is in very poor condition and is
29 not roadworthy. Continued use of this unit would
30 require the replacement of the chassis with a new unit
31 as well as an overhaul of the engine".

32 MR. BROWNE, Q.C.: And then the next page, the last
33 paragraph ...

34 MR. LUDLOW: Okay.

35 MR. BROWNE, Q.C.: They state, the third sentence of
36 the last paragraph, the two portable diesel units are also
37 out of production but some spares are still available.

38 MR. LUDLOW: Do you wish that ...

39 MR. BROWNE, Q.C.: If you go to the next section,
40 Remaining Service Life.

41 MR. LUDLOW: Okay.

42 MR. BROWNE, Q.C.: There they say for Portable
43 Diesel No. 1 and Portable Diesel No. 2, the remaining
44 service life and years is two years and two years, but
45 then on the next page they say that Portable Diesel No.
46 1 and Portable Diesel No.2, if you did those
47 maintenance, the extended life would be ten years, and
48 then ... what I don't understand is the analysis. If you
49 go to the analysis and the conclusion from your
50 internal document ...

51 MR. LUDLOW: Which is further on, conclusions?

52 MR. BROWNE, Q.C.: Further, further down.

53 MR. LUDLOW: Okay.

54 MR. BROWNE, Q.C.: The, the last two paragraphs, can
55 you ... the last paragraph, just read that into the record,
56 that's what counts, because you're advising to
57 decommission Portable Diesel No. 2. Can you read that
58 into the record?

59 MR. LUDLOW: "In reviewing the associated costs
60 with the diesel units it becomes obvious that the more
61 expensive plants to operate are the older units, namely
62 St. John's diesel, Port Aux Basques main diesels, and
63 the portable diesels. If you factor in the age of these
64 units and the potential future costs and environmental
65 liabilities, it backs up the rankings of the plants, thus it
66 is advisable to decommission the Port Aux Basques
67 main diesel units, the St. John's diesel, and the Portable
68 Diesel No. 2".

69 MR. BROWNE, Q.C.: Now, how is it that we got to,
70 from the recommendation for decommissioning Portable
71 Diesel No. 2 when the outside consultants suggested
72 that it was viable with the, with some refurbishing, and
73 all along we were told it was viable for another ten
74 years. How did we all of a sudden get to the fact that is
75 should be decommissioned?

76 MR. LUDLOW: Are you asking ... sorry, you're
77 obviously asking me. Well, the way we look at these ...
78 we have, as I said earlier ... there's one point definitely
79 missed in this whole discussion, it's the size of those

units, that's not even coming into play. You're still working with 30 odd year old equipment. I'm going to leave that for a second. For me to explain the absolute detail of every point, I'm not in a position to do it, but I have the utmost confidence of my people, they work with these, they know the reliability, these people, they're the ones trying to get them running, and we have not had a great deal of success with those units, and I have been advised that there are issues of repairability. If we wish to ... maybe what we should do is invest capital in these and bring the two and a half on to complete the part as well, but from end, the call that's been made by my staff has been it's advisable to remove the 670 and the 700 from service, it's outside its useful life, if we can squeeze another two or three years we're not doing anyone any good. It's costly to run, the production costs are high and reliabilities are low, those are the combinations. Why we did not proceed with the external consultant, there's lots of times we do not follow every recommendation of a consultant, and that probably is one of them.

MR. BROWNE, Q.C.: Because if you look, the last time it was inspected by K. Nicholson (*phonetic*), who's K. Nicholson, date, 2002 02 10, (unintelligible) of your documents, and I'm reading from an appendix to this report, Appendix A. Condition assessments of diesel plants, portable diesel units. It's about four or five pages in. It's not ...

MR. LUDLOW: Okay.

MR. BROWNE, Q.C.: It says portable diesel units. I think you keep on going, Mr. Wells, thanks.

MR. LUDLOW: Just for your information ...

MR. BROWNE, Q.C.: Yeah.

MR. LUDLOW: ... Kent Nicholson is a mechanical engineer working within our energy supply group.

MR. BROWNE, Q.C.: Okay, sure. And it says the general condition in talking about these units as well, can you read that into the record?

MR. LUDLOW: I certainly can. "Both generating units are in good condition, the mufflers are rusty, minor oil leaks on both engines, radiators and fans are dirty. The trailer capacity on No. 2 is very deteriorated and no longer roadworthy. Unit No. 2 is also fairly difficult to

start at times and local operators sometimes use quick start or ether to start the unit.

MR. BROWNE, Q.C.: So there seems to be a fair amount of ambiguity here. Nicholson has told us they're in good condition, someone else says they're out of service, should be out of service, but consistently throughout these reports that we've been reading, we've been told that with some repairs of, of tens of thousands of dollars on occasion, that the life of them could be extended to ten years. Why would we as ratepayers choose, if the choice was ours, albeit it's the Board's, to give you \$1.5 million for a portable generator when these two have kept up, perfectly fit the bill with some refurbishing and engine overhauls?

MR. LUDLOW: The question is on a false premise, I do believe, Mr. Browne, in that, first of all the units, as I said earlier, are old, we can't move them, one of them is not movable. I will not authorize the movement of that unit. That's a statement of fact.

Secondly, if we did repair the chassis on this, do the engine overhauls, bring up the controls and the safety requirements, and do the environmental concerns, or address the environmental concerns, Mr. Chairman, you're still dealing with a 30 odd year old piece of equipment that can at best meet one third of your requirement on average. Now, I haven't mentioned the fact that if I had to pull a 670 kilowatt unit from Basques, I'll use back to my Old Perlican example, I still have nothing, I can't even run the school. So times have changed so much.

The question from the future viability of 670 kilowatt generator, the statements of its condition, the roadworthiness and those items, that's a significant part. The addition of two and a half megawatts is necessary for us to continue the viable service that we provide to those rural customers, and that's the basis upon which we have submitted this budget to the Board.

There is one other point that hasn't come up here and that's the use of these diesels, or this diesel that we're proposing, in the off season, the construction season. The difference when we do work between, what we call hot work and dead work, de-energized work versus live line work ... we've been using portables, or generation, on the ends of line so we can take out the feeding section, so you work the line de-energized. The ratio is at least two, if not two

1 and a half times on productivity, your ability to take
2 and do the work under those circumstances, thereby
3 increasing your productivity on your capital work.
4 That's a tertiary role that we play in bringing these
5 units, this unit for 2001 into the system. The 670
6 cannot fill that role, it has not got, what I would use in
7 my terms, the umph to do it, it cannot do it. It's like
8 trying to pull a trailer with a Hyundai, although it may
9 have a good warranty. I'm sorry, Mr. Browne, but
10 that's, that's the pieces. There's three pieces, it's
11 capacity, it's the installed units today, and that's a
12 decommissioning question, but it's also the addition of
13 the two and a half.

14 MR. BROWNE, Q.C.: I put it to you, sir, that if you had
15 followed the consultant's reports back in 1997 and did
16 the overhauls on these engines as recommended, they
17 would be in superb condition today. Is that a
18 probability?

19 MR. LUDLOW: The probability that they'd be in
20 superb condition, we would have invested capital and
21 we would still have a 670 megawatt engine is what we
22 would have. Though it's possible we would get
23 another five years maximum out of them, assuming the
24 consultant was right. We did not go there.

25 MR. BROWNE, Q.C.: The consultant said ... with due
26 respect, sir, the consultant said ten years.

27 MR. LUDLOW: From 1997.

28 MR. BROWNE, Q.C.: What is the purpose, what is the
29 purpose of commissioning consultants to do work if
30 you're not going to follow their recommendations?

31 MR. LUDLOW: The reason we engage external
32 consultants is to get an unbiased third party opinion,
33 and in areas that we may not have expertise in. This
34 case, we engaged Akers, and I do believe one of those
35 was '97/'98 ... I forget the ... we've gone through about
36 ten reports here. And it was 1997 with a ten year
37 extension on those two units. We did not, as far as I
38 understand, complete all the recommendations. We did
39 do some of the recommendations and we completed
40 them, references to the fuel tank is an example that
41 comes to mind.

42 MR. BROWNE, Q.C.: You'd have to that or you'd be in
43 trouble with the Environment Department, I guess,
44 wouldn't you?

45 MR. LUDLOW: And we wouldn't want that.

46 MR. BROWNE, Q.C.: So you did what is absolutely
47 imperative, is that what you're telling us?

48 MR. LUDLOW: No, sir. My point here is that we took
49 those reports, and I can assure you that under the
50 guiding hand of Mr. John Evans that the investment
51 was prudent and handled accordingly in 1997, '98, '99,
52 and 2000.

53 MR. BROWNE, Q.C.: Just as a curiosity, has anyone
54 checked there to see if these two diesel units, have they
55 been fully depreciated?

56 MR. LUDLOW: I would not know, but I would think
57 that a portable diesel probably would be in the 30 year
58 range.

59 MR. BROWNE, Q.C.: So it would be close to fully
60 depreciated.

61 MR. LUDLOW: I would think it would be, I would hope
62 it would be getting pretty close to it. If the chassis is
63 no longer usable, it should be.

64 MR. BROWNE, Q.C.: If it weren't fully depreciated
65 would it still be part of your rate base?

66 MR. LUDLOW: Sir, I said earlier yesterday that when
67 I was preparing this capital budget that whether it was
68 in rate base or whether it wasn't, was not a determining
69 factor. This project has been included on three factors.
70 It's the parking during the winter season, it's the ability
71 to service customers in catastrophic situations, and a
72 tertiary role with the ability to expedite, or more
73 productively complete our capital programs. And to be
74 quite honest, the reason I cannot answer the question
75 if it's fully depreciated, because I did not look to see
76 whether it is and whether it's in rate base, from that end.

77 MR. BROWNE, Q.C.: Thank you sir, no further
78 questions.

79 MR. NOSEWORTHY, CHAIRMAN: Thank you very
80 much, Mr. Browne. Thank you, Mr. Ludlow. Good
81 morning, Mr. Young. How are you? I think you were
82 here at the start, welcome. Would you be able to start?

83 MR. YOUNG: Well, I could start, it's a matter of
84 judgement, I suppose. I don't think I'll be finished in 21
85 minutes, on the other hand, I don't anticipate being

1 more than an hour. I'll leave it to the Board's discretion.
2 I'd be happy to leave it to the morning, but I could, you
3 know, have a start. The only thing I would advise on
4 that is that most of my cross-examination is on one
5 area, and I will be comparing three different issues, so
6 it might be better for me, actually, if I had one
7 continuous period. It might be easier to follow.

8 MR. NOSEWORTHY, CHAIRMAN: Mr. Ludlow, are
9 you up to this?

10 MR. LUDLOW: All I need, sir, if we're going to
11 continue I need at least a five minute break.

12 MR. NOSEWORTHY, CHAIRMAN: Well that's going
13 to take us up to quarter after. Okay, we'll adjourn for
14 the day and we'll ... that will take us up to quarter after
15 or twenty after, and I think it has been a long morning
16 and rather than ... we've stuck by the 1:30 fairly
17 diligently and I wouldn't want to go beyond that. I
18 think that takes (unintelligible). So we will adjourn for
19 today and we'll at reconvene at nine o'clock tomorrow
20 morning.

21 *(hearing adjourned to November 21, 2002)*