BEFORE THE WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION

In the Matter of the Pricing Proceeding for Interconnection, Unbundled Elements, Transport and Termination, and Resale	Docket No. UT-960369 Phase III Volume XII Pages 2608-2818
In the Matter of the Pricing Proceeding for Interconnection, Unbundled Elements, Transport and Termination, and Resale for US WEST COMMUNICATIONS, INC.	Docket No. UT-960370
In the Matter of the Pricing Proceeding for Interconnection, Unbundled Elements, Transport and Termination, and Resale for GTE NORTHWEST, INCORPORATED.	Docket No. UT-960371

A hearing in the above matter was held on March 1, 2000, at 9:08 a.m., at 1300 Evergreen Park Drive Southwest, Olympia, Washington, before Administrative Law Judge C. ROBERT WALLIS, Chairwoman MARILYN SHOWALTER, Commissioner RICHARD HEMSTAD, and Commissioner WILLIAM R. GILLIS.

The parties were present as follows:

US WEST COMMUNICATIONS, INC., by Lisa A. Anderl, Attorney at Law, 1600 Seventh Avenue, Room 3206, Seattle, Washington 98191.

THE COMMISSION, by Ann E. Rendahl, Assistant Attorney General, 1400 S. Evergreen Park Drive, S.W., P.O. Box 40128, Olympia, Washington 98504-0128.

NEXTLINK WASHINGTON, ELECTRIC LIGHTWAVE, INC., ADVANCED TELCOM, INC., NEW EDGE NETWORKS, INC. and GST TELECOM, by Gregory J. Kopta, Attorney at Law, 2600 Century Square, 1501 Fourth Avenue, Seattle, Washington 98101-1688.

GTE, by W. Jeffery Edwards and Jennifer McClellan, Attorneys at Law, Hunton & Williams, 951 E. Byrd Street, Richmond, Virginia, 23219.

TRACER and RHYTHMS LINKS, INC., by Stephen J. Kennedy, Attorney at Law, Ater Wynne, Two Union Square, Suite 5450, 601 Union Street, Seattle, Washington 98101.

WASHINGTON INDEPENDENT TELEPHONE ASSOCIATION, by Richard A. Finnigan, Attorney at Law, 2405 S. Evergreen Park Drive, S.W., Suite B-3, Olympia, Washington 98502.

MCI WORLDCOM, by Ann Hopfenbeck, Attorney at Law, 707 17th Street, Suite 3600, Denver, Colorado, 80202.

AT&T, by Susan Proctor, Attorney at Law, 1875 Lawrence Street, Suite 1575, Denver, Colorado, 80202.

Barbara L. Spurbeck, CSR
Court Reporter

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JUDGE WALLIS: Let's be on the record, please, for our March 1, it is today, session in Docket Numbers UT-960369, et al. For today's session, Commission Staff is calling to the stand its witness, Thomas L. Spinks, and a number of documents have been submitted in conjunction with his testimony. I would like to identify those documents for the record at this time.

The first is marked as Exhibit 251-T for identification. That is the testimony of Thomas L. Spinks. Exhibit 252 is the qualifications of Thomas L. Spinks. 253 is designated Deaveraged Rate Proposal for US West. 254 is Deaveraged Rate Proposal for GTE Northwest. 255-T is the responsive testimony of Thomas L. Spinks.

Two-fifty-six is US West Deaveraged Loop Rates. 257 is US West Deaveraged Loop Rates, Three-zone Option. 258 is GTE Northwest Deaveraged Loop Rates by Density Zone. 259 is GTE Northwest Deaveraged Loop Rates by Density Zone, Three-zone Option. 260-T is the rebuttal testimony of Thomas L. Spinks.

In addition, there has been distributed an errata sheet for Thomas L. Spinks containing errata to his responsive and rebuttal testimony. I'm going

to mark that as 260-E. In addition, Staff has distributed a Revised Exhibit 261, and I'm marking that Revised 261, dated February 29, 2000. The subject is US West Four-zone Three Distance Band Comparison. 262 --

MS. RENDAHL: Your Honor, I would say the title's somewhat -- it's both for US West and GTE, although it's titled US West.

JUDGE WALLIS: Very well, thank you. Two-sixty-two has been distributed, as have some other documents by US West, for potential use on examination of this witness. 262 is the Staff response to US West Data Request Number Seven. 263 is the Staff response to Data Request Eight. 264, the response to Data Request Nine.

Two-sixty-five is the response to Data Request 10. 266, the response to Request Number 11. 267, the response to Request Number 12. 268, the response to Request Number 13. 269 is the response to Request Number 14. 270, the response to Data Request Number 15. 271, the response to Data Request Number 16, and 272 is the response to US West Data Request Number 17.

Finally, GTE has presented a document for potential use on cross. That is a regression graphs

document, and it is marked as 273 for identification. Is there anything else of a preliminary nature?

I'd just note that Counsel for the Commission Staff has returned today, and is replacing Ms. Johnston. Ms. Rendahl, did you want to state your appearance for the record?

MS. RENDAHL: Yes, Your Honor. Ann E. Rendahl, R-e-n-d-a-h-l, for Commission Staff, Assistant Attorney General.

JUDGE WALLIS: Thank you very much. Mr. Spinks, would you please stand and raise your right hand?

Whereupon,

THOMAS L. SPINKS,

having been first duly sworn, was called as a witness herein and was examined and testified as follows.

MR. EDWARDS: Judge Wallis, may I ask a question?

JUDGE WALLIS: Mr. Edwards.

MR. EDWARDS: Is there an exhibit number, and I'm sure you said it and I missed it, with respect to the errata that was handed out yesterday?

JUDGE WALLIS: Yes, I've designated that as 260-E.

MR. EDWARDS: I'm sorry. Well, then, I'm

confused. There was an errata that was handed out the first day of hearings that I thought had been labeled 260-E, and then there was an additional errata that was distributed yesterday.

JUDGE WALLIS: Let's be off the record.

(Discussion off the record.)

JUDGE WALLIS: Let's be back on the record, please. In some administrative discussions, it's been determined that there is one errata sheet, which is marked as Exhibit 260-E, and there is a Revised Exhibit 261, designated Revised, and dated 2/29/2000. That is the only Exhibit 261 that we have marked for identification at this point. So now, with that, Ms. Rendahl.

D I R E C T E X A M I N A T I O N

BY MS. RENDAHL:

Q. Mr. Spinks, would you please state your full name for the record, state your position with the Commission, and your address here with the Commission?

A. Certainly. My name is Thomas L. Spinks, that's S-p-i-n-k-s. I am a telecommunication industry expert on the Staff of the Washington Commission. My business address is P.O. Box 47250, Olympia, Washington, 98504.

Q. Mr. Spinks, do you have any corrections or additions to the testimony that you are sponsoring today?
A. Beyond --
Q. The testimony and exhibits, excuse me, that you're sponsoring today?
A. No, not beyond what has already been identified.
Q. So the errata sheet that's been identified as Exhibit 260-E, you don't have any additional -- anything additional to that?
A. Well, no. During the course of the hearing, there were some -- through the testimony of other witnesses, there were a couple places in my testimony where I had got something wrong. But rather than strike that, I think we'd just deal with that as we got to it. And beyond that, there was Exhibit 261-R.
Q. And would you explain what that revision is for the record?
A. On 261-R, on Monday, GTE distributed a motion to strike specific references to HAI 5.0. And in reviewing that, I discovered that in -- it was pointed out that in my Hatfield 3.1 estimates, that there are four-wire centers out of the 210 that 3.1

did not produce cost estimates for. And what I had done was to use the 5.0 estimates in the 3.1 equations for GTE to fill in those gaps with. After the motion to strike, it was no longer appropriate to have that in there. It wasn't until Monday that I became aware of that, and so I prepared a new exhibit, which removed the four -- removed the HAI 5.0 cost data, substituted in the cost estimates that GTE itself had developed for Mr. Denney to use to fill in the gaps with, and used those, then, to redo the regression and the flat zone rates for GTE, and that's the only part of Exhibit 9 that's changed.

The bottom half for GTE, for example, in the zone average of 16.50 for the greater than 650 density zone, that was 16.55. So it made a small difference in the estimates, but made the cost estimates totally consistent with 3.1 cost data, per the Commission's directive.

MS. RENDAHL: Thank you. I'd tender the witness for cross-examination or voir dire, whichever the bench chooses.

JUDGE WALLIS: Are you offering the exhibits?

MS. RENDAHL: And I'm offering the exhibits.

JUDGE WALLIS: Mr. Edwards.
MR. EDWARDS: I do. I have an objection with respect to Exhibit 261-R, and I'd like to voir dire the witness.
JUDGE WALLIS: Please proceed.

V O I R D I R E E X A M I N A T I O N

BY MR. EDWARDS:

Q. Mr. Spinks, my name is Jeff Edwards. Good morning, sir.
A. Good morning.
Q. Your errata sheet, which has been labeled Exhibit 260-E, is unrelated, isn't it, sir, to Exhibit 261-R?
A. Well, they're both part of my rebuttal testimony.
Q. But your Exhibit 261-R -- well, first, your errata sheet has four specific changes; correct?
A. Yes.
Q. And at least in four paragraphs. Paragraph one, paragraph two, paragraph three all deal with numbers in your responsive direct testimony, which is Exhibit 255-T; correct?
A. Yes.
Q. And the only change with respect to your rebuttal testimony is the change in the designation

of the US West tariff in Exhibit 262 -- 260-T; is that correct?
A. Yes.
Q. And 261-R, that was handed out yesterday evening, is unrelated to any of the changes that you make in 260-E in your responsive testimony; correct?
A. Yes.
Q. All right. Now, with respect to 261-R, the original 261 that was attached to your rebuttal testimony -- let me ask it this way. The original 261 was attached to your rebuttal testimony; is that correct?
A. Yes.
Q. And that rebuttal testimony is Exhibit 260-T; correct?
A. Yes.
Q. And when you prepared Exhibit 260-T, you knew at the time that you prepared that document that a motion to strike all use of Hatfield Model 5.0a had been filed; correct?
A. Yes.
Q. So in fact, the motion to strike was not distributed on Monday of this week, was it, sir?
A. No, and I didn't say it was. I said that GTE's motion to strike specific references was

distributed on Monday.
Q. And that's what I'm asking you, sir.
Actually, the motion had been filed sometime before that, it had been granted, and what GTE distributed on Monday was those portions of the testimony that should be struck because the motion had been granted; correct?
A. Yes.
Q. All right.
A. And I might point out that there are delineations in there that are incorrect. We don't agree with all of the information that GTE has suggested should be struck.
Q. But with respect to what we're focusing on right now, which is your Exhibit 261 and your Exhibit 261-R, you agree with me that when you prepared that exhibit knowing the motion to strike HAI 5.0 references had been filed, you nevertheless included in your exhibit to your rebuttal testimony, 260-T, 5.0a information for Fairfield, Loomis, Malden and Thorton; isn't that correct?
MS. RENDAHL: I object right now, Your Honor. I understand that the intent of the voir dire is to indicate that there was an objection to the 5.0 data at the time the rebuttal testimony was filed.

However, the specifics of the objection were not filed until Monday. Now, the motion was not decided until after the rebuttal testimony had been filed, and so at that time there was still pending a question as to whether it was appropriate or not to include that information in the testimony, so I don't believe that there is a problem in having filed the testimony with that information in it.

Now, and once the motion was granted, then there is that issue pending, and I think that's what Mr. Spinks intended to address. So I understand the line of questioning here, but I'm not sure we need to go there.

MR. EDWARDS: With all due respect, the witness knew the motion had been filed when he prepared his testimony. And in fact, when he prepared the testimony, he stated that the 3.1 version that was contained in his exhibit was intended to exclude all 5.0a data. That's why he offered the alternative versions. But in fact, knowing the motion had been filed, 5.0a information was nevertheless included in the 3.1 run.

Once the witness, after the motion had been granted, I assume that the witness did not go back and check his papers or whatever to see whether any

of his runs were still tainted, even though the testimony said that they weren't. It was only when GTE distributed the specific testimony references that needed to be struck as a result of the granting of the motion that the witness, at that time, has now changed the analysis, changed the numbers, rerun a deaveraging, done additional regression analysis, which is a substantive change to the testimony which was distributed last evening.

MS. RENDAHL: Your Honor, I believe, as Mr. Spinks has stated on the record, that the change was to three exchanges out of a large number of them, and let me ask Mr. Spinks a question.

MR. EDWARDS: If I could finish my voir dire before we go back with redirect.

JUDGE WALLIS: Very well.

Q. In addition to the Fairfield, Loomis, Malden and Thorton exchanges, Mr. Spinks, you also used a 5.0a number for Stevens Pass; is that correct?

A. Yes.

Q. Now, in the revision that was handed out last night, I'm correct, aren't I, Mr. Spinks, that you, for Fairfield, Loomis, Malden and Thorton, did not use the 5.0a numbers, but instead used $55.97 for each of those, which is GTE's corrected number to

AT&T's original proposal?
A. I substituted that number in for those four wire centers, plus Stevens Pass, which also had HAI 5.0 data.
Q. Right.
A. Or five wire centers.
Q. But there's a difference between those other four and Stevens Pass; correct? Hatfield 3.1 actually does not have a number at all for Fairfield, Loomis, Malden and Thorton; correct?
A. Oh, that's correct, yes.
Q. But Hatfield 3.1 does have a number for Stevens Pass; correct?
A. It does, but that --
Q. You choose --
A. But that number is what I call a bad data point, and it should be eliminated from there, regardless of whether you substitute in a 5.0 number or simply leave it totally out of the analysis.
Q. So for Stevens Pass, 3.1 has a data point, but you decided that it was bad and excluded it?
A. Well, I'm not the only one. Mr. Tucek himself noted in his direct testimony that the Stevens Pass data point was some eight or 10 times higher value than any other wire center in the group,

and that -- I mean, I think it's clear that it's an erroneous data point.
Q. I don't want to quibble with you about that. Mr. Tucek did not rely on 3.1. You did, though; correct?
A. That's correct.
Q. All right. Are there any other bad data points in 3.1 that you changed?
A. Not that I recall.
Q. And in the work papers that you gave us yesterday evening, you did a regression analysis; is that correct?
A. I simply redid the regression that I had done earlier using the different data points, using the substitute data points. I didn't redo it as if I did a different analysis, no.
Q. You did not do a regression to determine the coefficient of the average loop lengths and, in fact, excluded all five of those exchanges we've talked about?
A. Yes, that's right. I excluded them in the regression. I included them in the flat zones, and I excluded them from the regression, because they're -- yes, that's right.
MR. EDWARDS: That's all the voir dire

questions I have, and then I have a motion.
JUDGE WALLIS: Ms. Rendahl.
MS. RENDAHL: I would just submit that when Mr. Spinks became aware of the problem with his exhibit and the data points on Monday, that he, at that point, made the necessary change to his exhibit, and I believe that's responsive to the Commission's granting the motion to strike references to 5.0 and to make the data useful to the Commission in considering the information.
And considering the late changes that have been allowed in this case so far, I think this is a minor revision to an exhibit to make it consistent with the Commission's wishes. And I don't believe it raises such significant evidentiary problems to GTE, given that the substitutes are data that they have provided themselves. It's not something that Staff has developed on their own.
So I would request that the Commission allow the revised exhibit to be admitted and used in this proceeding.
JUDGE WALLIS: Mr. Edwards.
MR. EDWARDS: The issue is not a minor one for several reasons. When the testimony filing began, I can tell you there was a lot of discussion

within my client regarding what model runs and what information could be used. We made the decision to play by the rules. That's why we filed our original direct testimony, about which there's been much cross-examination of GTE about why you changed your mind. But we played by the rules.

On the other hand, when we received testimony that did not follow the rules as we understood them, we responded with a motion. The motion was granted. Staff witness knew the motion was pending at the time the alternative analysis was prepared with the rebuttal testimony, and in fact, stated that he was providing an analysis that did not claim that -- did not include that information. That turned out not to be true.

When GTE brought that to the attention not only of the Staff, but everybody, so that everybody knew that, then a revision was filed the day before the witness files that changes substantively the proposal from the Staff with respect to the Hatfield 3.1 run. Not only does it change it in a way that is indicated to include data from 3.1 only. When there is 3.1 data for Stevens Pass, it's excluded. So again, my concern, even with the revision, is that the data that's being generated and is ostensibly

being relied on, in fact, is not. And for that reason, I move to exclude 261-R.

JUDGE WALLIS: Very well.

MR. KOPTA: Judge Wallis, may I be heard on this?

JUDGE WALLIS: Mr. Kopta.

MR. KOPTA: We support Staff's position on this motion. I think there are a couple of additional factors that Ms. Rendahl didn't mention that we think are pertinent here. First, GTE and US West, when they filed their motion to strike, did not at that time identify specific portions of the testimony that they sought to strike. Rather, they simply made a blanket motion to strike references and the use of Hatfield 5.0a.

Certainly, it has been my experience with this Commission that in filing motions to strike, one generally includes specific references to testimony that one wishes to strike, not just a general authorization to later specify those portions of the testimony.

JUDGE WALLIS: Mr. Kopta, I'm going to interject here in the sense that I think we have enough information, argument on the record to make a decision on the admissibility of the revised

document, and I'd like to try to confine the field of discussion, if we can, to what's been stated already.

MR. KOPTA: And that is simply what I'm going to, which is that I think Mr. Spinks has made clear this morning that once it became clear to him which specific references GTE has in mind, he made the corrections that he has identified to bring his testimony into compliance with the Commission's order based on information that was already in the record.

And that is something that certainly GTE's witnesses have done in preparing their alternative proposal, based on testimony that Mr. Denney provided. And in addition, Mr. Thompson, on the day he was to testify --

JUDGE WALLIS: Mr. Kopta, I think I'm ready to make a ruling.

MR. KOPTA: Thank you.

JUDGE WALLIS: That is that we are going to reject the motion to exclude. I don't see that there's been any nefarious action on the part of Staff. The Staff appears to have responded responsibly to information as they knew it. There appears to have been a mistake, which is being corrected. As to the significance of the mistake and the propriety of data that you've alluded to, you're

free to continue cross-examination on that point and to offer to the Commission the values that you think would be appropriate.

And let me ask if there is objection to any of the other documentary exhibits? It appears that there is none, and those exhibits are received.

MR. EDWARDS: Judge Wallis, I appreciate the indulgence of the Commission to allow me to make a record on that point.

JUDGE WALLIS: Thank you. Ms. Rendahl, do you have anything further of the witness?

MS. RENDAHL: No, I believe the witness is available for cross-examination.

JUDGE WALLIS: Very good. Mr. Edwards, would you like to lead off?

MR. EDWARDS: Sort of warmed up here, so --

C R O S S - E X A M I N A T I O N

BY MR. EDWARDS:

Q. Good morning again, Mr. Spinks.

A. Good morning.

Q. In your original testimony, you'd agree with me that you made a proposal to deaverage switching costs. And in your rebuttal testimony, Exhibit 260-T, you have withdrawn that proposal?

A. That's correct.

Q. With respect to Exhibit 251-T, Mr. Spinks, would you turn to page two?
A. I'm there.
Q. Line 19, sir. You'll agree with me that, in preparing at least your original proposal, you attempted to identify geographic areas having significant cost differences?
A. That's correct.
Q. And you'd agree with me that you were not able to do that, were you?
A. No, I wouldn't agree. I'll agree that I was not able to find unique areas with statistical differences, but nonetheless developed areas that do have statistically significant differences.
Q. Were you able to identify geographic areas having significant cost differences?
A. Yes.
Q. But you didn't use them in your proposal, did you?
A. I believe I did.
Q. In fact, sir, you just defaulted to the density zone levels in the Hatfield Model; correct?
A. Well, the density -- yes, I guess you could say it that way, but my point would be that the density zone from the model, there were significant

differences between them.
Q. Look at page four of Exhibit 251-T, and I want to say it the way you say it. Do you agree with me you said that Staff could not determine a unique -- I'm talking about line two, sir. Staff could not determine a unique set of geographic areas where costs differed significantly. Is that your statement?
A. That's correct, yes.
Q. And so Staff chose to use the preexisting HAI Model density zones; is that correct?
A. Yes.
Q. Your proposal, I think all of your proposals, is to determine a deaveraged cost at the exchange level, is that correct?
A. Yes, that's correct.
Q. Why do you believe use of an exchange level is preferable to wire center?
A. I think the two reasons that I think the exchange level ought to be pursued is, one, in Phase I -- or I'm sorry, not in Phase I, but rather in Docket UT-980311, the universal service case, we found the exchange to be the geographic level at which universal service costs would be determined. And as parties have recognized, there a linkage

between the universal service, wholesale and retail deaveraging.

And the idea was that to, maintain consistency between the level, the geographic level at which the wholesale deaveraging took place, and the level, geographic level at which universal service funding is determined. Let's see. That's right.

The second reason had to do with simply some administrative simplicity issues, where exchanges -- exchange areas are contiguous geographic areas, wire center areas in which people receive service at a common rate, for instance. And the idea that the wholesale rates beyond that level, just for administrative simplicity purposes, was the other reason.

Q. Did you conduct any direct analysis of the accuracy, if you will, of cost determination at the wire center versus the exchange level?

A. I didn't, but I've seen in the testimony of others that have calculated the cost on wire center level that you get a lower cost in, say, a Zone One with a pure wire center approach than you do with the exchange level approach. What that means is you're introducing some distortion into what are the -- what

would otherwise be the economically efficient costs on which you'd based your deaveraged loop rates.
Q. So your testimony is that you believe that use of a wire center introduces distortion at the exchange level, doesn't it?
A. No, just the opposite. It's exchange level. When you go to the exchange level, you engage in some averaging. And that averaging, because some of the wire centers don't belong in the density zone that the exchange is in, cause the rate to be otherwise higher or lower.
Q. Let me ask you to look at your direct testimony, Exhibit 251-T, at page five, lines six through 11.
A. I see that.
Q. Would it be fair to say that what you're saying there is that the choice of the model does not appear to be crucial to the outcome of the deaveraging process, and that one reason for that is that the disaggregated costs are scaled to a statewide average cost?
A. I think when I made the statement early in the case, in this process, I was somewhat naive about the scope of the models that would be presented. And I made the statement within the context of thinking

that what the companies would use would be a BCPM type estimate, and that really what we'd be talking about is the difference about deaveraged costs based on either a BCPM estimate or a Hatfield model estimate. And so it was within that context that I made the statement.

Q. In fact, in your responsive testimony, which is Number 255-T, on page four, you, in fact, included a discussion and an analysis that was intended to demonstrate exactly that the choice of the model matters; correct?

A. Can I have the page reference?

Q. Yes, sir, it's your response --

A. I'm there, I'm there.

Q. Page four.

A. Yes, that's correct.

CHAIRWOMAN SHOWALTER: We're not there.

MR. EDWARDS: I'm sorry. It is the responsive testimony, 255-T, at page four. And I'll repeat the question.

Q. The question is that, there in your testimony, Mr. Spinks, you in fact included a table, an analysis to demonstrate that the choice of the model does in fact matter, even when the disaggregated costs are scaled to a statewide

average; correct?
A. Yes.
Q. May I ask you to go back again to Exhibit 251-T, which is your direct testimony, page seven?
A. I'm there.
Q. Have you ever worked for a telephone company, Mr. Spinks?
A. No.
Q. In lines 11 and 12, you're addressing your proposal for distance-sensitive rates and indicate there that more aggregated rate structures may be appropriate if your proposal creates undue administrative burdens and costs. Do you see that?
A. Yes, I do.
Q. Did you perform any analysis of the administrative burdens and costs that your proposal would incur prior to the time you filed Exhibit 251-T?
A. No, I'm unable to. I don't have that information.
Q. And so your answer would be yes to the question you haven't done any analysis since that time, either?
A. I think the answer is it's impossible for Staff to do the analysis without the information. We

don't have knowledge of companies' administrative cost structures. The only thing we can do, in putting this out here, was to draw a response from the companies as to perhaps they could identify what they are, if they were significant.

Q. On that same page, if you look down at line 20, you say databases exist which can locate a census block for a given address. Do you see that?

A. Yes, I do.

Q. Did you have any specific databases in mind when you made that statement?

A. I just know that there is a website that you can go to to do that lookup.

Q. Do you know the accuracy of that lookup at that website?

A. No.

Q. Have you attempted to do any lookups in the state of Washington at that website?

A. I believe we've used it in a couple of instances.

Q. Did you use it with respect to your testimony here, though, sir?

A. No.

Q. Let me ask you to turn to your responsive testimony, Exhibit 255-T, page three, line seven.

A. Yes, I'm there.
Q. You state there that the Staff included some high-cost smaller wire centers in with larger, low-cost wire centers only -- but only because they're part of the same exchange. Do you see that?
A. Yes, I do.
Q. Is that still your testimony?
A. Yes. I could probably clarify this a little by referring to when I referred to high-cost smaller wire center and low-cost larger, I'm referring to wire centers that would be in different density zones if they were by themselves.
Q. If the Commission should not adopt your proposal and instead, for GTE, for example, would adopt GTE's compromise proposal that I think you've heard testimony about over the last couple of days at the wire center level, do you think the Commission should constrain that proposal to deaverage -- that the Commission should constrain it to put wire centers in the same exchange in the same zone?
MS. RENDAHL: Excuse me, the same zone as?
Q. Well, so that you would not end up with a situation where you have wire centers in the same exchange in different deaveraged zones, rate zones, which I understand is what you've done here on your

responsive testimony?
A. Right. I can't recommend that the Commission adopt GTE's alternative proposal, whether it be on a wire center basis or a exchange basis, because of the mixing of the density, low density, high-cost wire centers in with the high-cost low -- when they're not part of the same exchange. That is, it's not the same comparison as the analysis -- or the proposal Staff put together that's on an exchange level.

JUDGE WALLIS: Can I interject with a request that Counsel clarify what proposal it is that we're talking about here.

MR. EDWARDS: It was the compromise proposal that Mr. Dye testified to yesterday, where you would take the AT&T alternative, Column Three on page 16 of Mr. Denney's testimony, and collapse Zones One and Two.

JUDGE WALLIS: Thank you.

CHAIRWOMAN SHOWALTER: And it's not reflected in a separate exhibit anywhere?

MR. EDWARDS: No, the backup is in the exhibits that the Chairwoman asked about, but yeah.

CHAIRWOMAN SHOWALTER: Okay.

Q. Let me get back on my train of thought

here. Let me ask this way. In your responsive testimony, 255-T, Staff has taken high-cost wire centers and low-cost wire centers and grouped them together so that wire centers within the same exchange are within the same zone; correct?
A. Yes.
Q. And at least with respect to Staff's proposal, Staff thinks that's the appropriate thing to do?
A. Well, one of the -- as I said earlier, there were two reasons why we thought the exchange level would be the appropriate level.
Q. My question, though, is Staff believes that it is acceptable to put high-cost and low-cost wire centers together to serve the policy position that the wire centers within the same exchange be within the same zone?
A. Yes.
Q. Let me ask you to turn to what's labeled TLS-7, attached to your responsive testimony, which is Exhibit 259.
A. I'm there.
Q. Am I correct that what's contained in Exhibit 259 is an alternative three-zone proposal for GTE not by distance band, but simply three zones, and

in it you've used the Hatfield 3.1 model?
A. Yes, that's correct.
Q. You also use the 5.0, but we'll focus specifically on 3.1, all right, sir?
A. Sure.
Q. And as you have chosen to define your zones here, you agree with me that the exchanges in Zone One are the exact same exchanges that are in Zone One in your five-zone proposal, which is attached to your direct testimony; is that correct?
A. I believe so, yes.
Q. Now, look for me, if you would, at what's been admitted this morning as 261-R.
A. I have that.
Q. All right, sir. And in the lower left-hand corner is, for GTE, a three-zone proposal using Hatfield 3.1; correct?
A. Yes.
Q. And the zones you've chosen in Exhibit 261 are the exact same zones as in Exhibit 259; correct?
A. They should be.
Q. Right. Why, then, are the zone averages different?
A. I would assume that the primary reason would be -- well, the Exhibit 7, HAI 3.1 estimates,

would still have the Hatfield 5.0 numbers in them, would be one reason.
Q. All right. And then your original filed TLS-7 should, also; right? TLS-9, I mean.
A. The original.
Q. The original filed. All right. Let's look at that for a minute, attached to your testimony.
A. Yes.
Q. This should be the exact same run as appears in Exhibit 259, attached to your responsive testimony; correct?
A. Well, obviously not. There must have been some changes made between the two, and I suspect that what they were was -- if my recollection serves me right, in the original 261, I had made a change from the earlier three-zone proposal to recognize that the Stevens Pass data point, the $1,200 per month per loop or whatever, $3,000 per month per loop, whatever that estimate was, really should be taken out of these estimates, that it was clearly a bad data point, and it was at that point that I substituted in the -- I believe it was a 300-some dollar estimate that was used in the 5.1 -- or 5.0 model.
Q. Did you explain that change anywhere in your testimony?

A. No, but I did file the work papers that allows anyone to see it.
Q. If in fact, that's what you did, then the Stevens Pass number that you used in Exhibit 259 in your 3.1 run -- I guess I'm confused. Is that really from 3.1 or is that from 5.0a?
A. Well, I would have to go back and check the work papers, but, again, my recollection is this was sort of an evolutionary process. Each time I would go through and develop a new proposal, I would find a little associated adjustments, or tweaks, if you will, that I would do to -- with the idea of trying to produce a more accurate estimate.
And my recollection is that, between these two estimates, that what I had done was substitute the Stevens Pass number, and I may have done some other changes, but I don't recall. I would have to go back and check the work papers. I've actually relied heavily on Mr. Tucek's analysis to help me find those errors. He's been --
Q. He's pretty good at that, isn't he?
A. He's darn good at it.
Q. May I ask you to look at your rebuttal testimony, which is Number 260-T, page four? Here, beginning at about line four, I believe your

testimony is that actual loop distance is not important for your distance-sensitive proposal; is that correct?

A. Well, let me sort of try to restate that.

Q. Yes, sir.

A. What I would say is not important is that the rate that's used in a distance-sensitive band exactly reflects the physical distance of the loop that produces the cost within that band. And what that goes back to is the notion that you're smoothing costs across the band, even though some loops are longer and some loops are shorter. You're engaged in a smoothing operation.

And the way companies have traditionally rated many of their distance-based services is to use, regardless of the route that the copper cable takes, is you use the as-the-crow-flies distance. And that -- I think that that's what I'm talking about here, that it matters, of course, in terms of the cost, and that would be important in the context of these rates but for the fact we've already set the statewide average rate that you have to reconcile back to. So as long as you're reconciling back to that rate, I don't see an issue with using a crow's fly distance versus the actual -- whatever the actual

length of the loop is within the band.
Q. You say there in line eight that as the crow flies is forward-looking. Do you see that?
A. Yes.
Q. Can you tell me what definition of forward-looking you're using there?
A. Well, sure. It's the difference between embedded cost and forward-looking cost at the physical level. At the physical level, you have loops -- you could have a loop in a four to five kilofoot distance band, but it actually traveled a distance of eight kilofeet from the central office till it got to its end position. Under the -- under an embedded cost approach, you would look at the entire cost of the loop if you wanted to know what the cost was. On a forward-looking basis, you don't pay attention to what was done historically. In fact, if it went out eight kilofeet, if you build the loop today and if the easiest way to do it is a loop that's five and a half kilofeet long, that's the loop that you build and charge for. And that's a straighter -- that's a straight distance, as opposed to the historic route that a loop may have taken.
Q. Would you agree with me, then, that a model that does not model outside plant as the crow flies

is not forward-looking?
A. No, that's not what that means at all.
Q. That's what I'm trying to explore. Is it your testimony, then, that to be forward-looking, it has to be as the crow flies or sometimes as the crow flies?
A. What this testimony is about is distance-sensitive rate structure, not -- I'm not talking about forward-looking in terms of the cost estimation process. And I can see where you're coming from with that, but what I'm talking about is the rate structure being a forward-looking rate structure, not to be confused with or intertwined with the process that we use to develop forward-looking cost.
Q. I'm trying to test the consistency of your proposal.
A. Sure.
Q. Does the Hatfield Model 3.1 model outside plant, quote, as the crow flies?
A. Well, not precisely. It can't do that. No model can. It models plant in the most efficient, geographically efficient way, given whatever geographic constraints that there are.
Q. And would you agree with me that

forward-looking may mean least cost, it may mean most efficient, but it also means reasonably available?
A. I'm a little confused. Reasonably available what?
Q. For implementation?
A. The cost?
Q. No, the outside plant, sir.
A. I'm sorry, I'm --
Q. You're measuring -- what does loop cost measure, cost of a loop?
A. That's correct.
Q. All right. Now, what I'm trying to get at is would you agree with me that in determining least-cost, most efficient reasonable alternative for outside plant placement, as the crow flies may not meet that definition?
A. That's correct. I said given whatever geographic constraints the model has, yes.
Q. Then, if you look on page four, line 11, you say there that the Staff's already provided parties with information on how locations can be readily identified with relative ease and at low cost. Does this refer to the database testimony in your direct testimony, 251-T, that I just asked you about?

A. I was referring there to the census block lookup as -- yes, one way that locations, albeit larger locations than an individual's dwelling, but it's one way locations can be cheaply and easily identified, yes.
Q. That's the website you just testified to?
A. Yes.
Q. That you hadn't looked at?
A. Yes, and then, since that, there's been other methods identified, which are actually probably better methods.
Q. Let's look at your rebuttal again, page five, line 17.
A. Yes.
Q. Would you agree with me that the size of the wire center measured by number of lines is a cost driver with respect to loop cost, average loop cost?
A. I think it is, but I think it's a weak measure.
Q. How about average loop length? Do you agree with me that that's a cost driver?
A. Yes.
Q. In fact, you state in your testimony that loop density, which I understand to be number of lines by whatever the area you're in?

A. Per square mile.
Q. Per square mile. Loop density and average loop length, in fact, can determine over 90 percent of loop costs?
A. It does in the US West, about 75 percent in GTE.
Q. And the analysis that you did was with respect to US West, and then you applied it to GTE; correct?
A. The initial one, yes. And again, since you're reconciling back to the statewide average, I -- so long as GTE has its reasonable opportunity to earn the 23.94, doesn't seem to me to be critical that the distance-sensitive rates be developed with GTE data.
Q. And in fact, you say that on page six; correct?
A. I said it somewhere, I think.
Q. Well, look back for me, if you would, at your responsive testimony, Exhibit 255-T, back at the table on page four.
A. Yes.
Q. And you'd agree with me that you tied the disaggregated loop cost in that table back to the statewide average for both US West and GTE; correct?

A. Yes, they should be.
Q. And it still made a significant difference with respect to the disaggregated or deaveraged loop rates; correct?
A. What still made a significant --
Q. There's still a significant difference between the zones in the deaveraged rates there, even though you tied back to a statewide average rate?
A. Oh, yes, yes.
Q. Look for me, if you would, at page 10 of your rebuttal testimony, 260-T, footnote four.
A. Yes, I have that.
Q. Would you agree with me that even if there is a high correlation between two sets of data, that does not mean that the data are substitutes for each other?
A. Absolutely.
Q. Would you agree with me that in footnote four, your correlation there is not particularly high?
A. No, I think that's a pretty -- let me explain it this way. There's a pretty -- there was a researcher who showed that there was a strong relationship between sunspot activity and stock market highs and lows. Obviously, the two variables

aren't related to each other, despite the fact that there's a high correlation.

In this case, the two variables, average loop length and the proportion of loops over 12 kilofeet, it seems to me, are both distance-related measures, and the 68 percent R-squared, you know, I think is quite suggestive that there is a relationship between the two.

Q. All right. Do you have what's been marked as Exhibit 273, which was the one cross-examination exhibit I had submitted?

A. Yes.

Q. Do you have that in front of you?

A. Yes, I do.

Q. Have you had an opportunity to look at that before this morning?

A. Yes.

Q. Let me attempt to explain what I think we did there, and see if you can agree with that, that we took the coefficients from your equation from your rebuttal work papers, used the same value for density in each of the three zones, and computed the cost line -- the cost per line by loop length and plotted the values for the three density zones. Do you see that?

A. I do. Let me clarify something. Did you say that you used the same density value in each of the three exhibits? It looks to me like you used the different density value in --
Q. Appropriate for that density?
A. -- appropriate for each zone.
Q. That's correct.
A. Okay.
Q. And with my tortured explanation of it, have you had a chance to try to replicate what has been done here?
A. No.
Q. Would you agree with me that, if in fact what's been done here has been done correctly, the shape of the curve was continuous for each of the density zones, with no point discontinuity?
A. Yes.
MR. EDWARDS: Your Honor, I move for the admission of Exhibit 273.
MS. RENDAHL: Your Honor, I guess I'd need to clarify this exhibit, in that it doesn't seem to show the appropriate -- I mean, it's got the same loop lengths under, you know, starting at 500 -- it's just not sufficient to show what they're trying to show here. Granted, I'm not a statistician, so I'm

having a little difficulty here, but I guess it's not clear from this exhibit what GTE is trying to show, and I think they need to demonstrate a bit more before placing it into the record.

MR. EDWARDS: I disagree, but let me ask a couple other questions.

Q. Would you agree with me that there is at least a reasonable debate among people that the cost per line should increase at some point as loop length increases?

A. Yes. Yes, I do.

Q. Would you agree with me, I mean, in your own opinion, that at some point in the loop length you would expect the cost per line to increase not in a continuous manner, but with some mark of discontinuity?

A. Well, I think if you used, like, an engineering approach to the cost estimation, cost estimates over distance, that's in fact probably what you would see, like a 12-kilofoot rate point, you might be able to jog up. In economic analysis, though, where you -- which aren't engineering-type approaches, that's right. The equations are smooth and they average those, smooth those out; that's right.

Q. You don't disagree with me that what's been plotted here is the way the Hatfield Model 3.1 would plot those values?
A. Well, I would disagree. It's the way my equation --
Q. That's a better way to say it.
A. -- would plot them. In other words, the coefficient for the distance doesn't change as the distance change; that stays constant. What changes is the density variable as you go through each density zone.
Q. All right.
A. And so you'd expect to see the same curve in all three; just in each density zone it's, as the density zone gets lower, the curve is higher up on the scale. So if you look at the Y axis, it starts out at 6 to $8 range in the most-dense zone and it's up in the $30 range at the same distance in the least-dense zone.
Q. And if you were to plot engineering costs, as opposed to economic cost, I guess, then you would, I believe you testified, expect to see some mark of discontinuity at perhaps the 12,000-foot length?
A. Yeah, I'm not sure what they would look like if you could even -- if it would make sense to

put them on this kind of a basis in engineering. But I understand the point, that there are two different approaches and they would result in different kinds of cost curves.

JUDGE WALLIS: I think the objection goes more to the weight than admissibility. The exhibit illustrates the discussions, and I think it's admissible, so we will receive it.

MR. EDWARDS: That's all I have, Your Honor. Thank you. Thank you, Mr. Spinks.

THE WITNESS: Thank you.

JUDGE WALLIS: Ms. Anderl.

MS. ANDERL: Thank you, Your Honor.

C R O S S - E X A M I N A T I O N

BY MS. ANDERL:

Q. Good morning, Mr. Spinks.

A. Good morning.

Q. Mr. Edwards asked you some questions that I would like to also talk to you about. On page four of your Exhibit 260-T, your rebuttal testimony, you have the discussion about the as-the-crow-flies --

A. Yes.

Q. -- distance measurement. And I apologize if you answered this question with Mr. Edwards. I didn't hear you answer it specifically, though. Do

you consider Hatfield to be -- or, yes, Hatfield, as used in this docket, Version 3.1, a forward-looking model?
A. Yes.
Q. What about RLCAP?
A. I'm not familiar enough with it to speak from personal knowledge, but it's my understanding that it is.
Q. What about BCPM?
A. Likewise.
Q. Do you know whether any of those three models deploy facilities in their cost modeling on an as-the-crow-flies basis?
A. No, I don't think they do. And I thought I tried to clarify that in my discussion with Mr. Edwards. I'm talking about a concept using the term as crows flies with respect to a rate structure, not the cost estimation process. Although forward-looking models do build plant in perhaps a more efficient way than plant was historically built, subject to geographic constraints.
Q. I'm sure I had more questions than that. Sorry.
A. Darn.
Q. You're not going to get off that lightly.

I apologize. My pagination here got a little bit confused, plus I'm trying to eliminate some topics that Mr. Edwards touched on. I want to make sure I covered them, but not in a duplicative way.

In your direct testimony, which is 251-T, page two, line nine, you state that the deaveraging proposals should not confer an unfair competitive advantage or harm upon any carrier. When you reference any carrier there, do you mean the ILECs, as well as the CLECs?

A. Yes.

Q. Is it correct, Mr. Spinks, that your final proposal to the Commission is 12 rates for US West?

A. Yes.

Q. And your final proposal for GTE is nine rates; is that right?

A. That's correct.

Q. Why did you choose 12 for US West, as compared with nine for GTE?

A. Because US West has exchanges or wire centers in a higher density range than GTE has. And so I'm recognizing that range that is between 2,500 and 5,000 lines per square mile that exists in the Bellevue, Seattle, Mercer Island area as a separate -- I'm proposing that as a separate zone.

Q. Now, is the Hatfield zone above 2,500 lines per square mile or above 2,550?
A. It might be 2,550. If you use the -- if you use the values that were directly in the model.
Q. Okay. Because, Mr. Spinks, let me direct your attention to your 261-R. And you characterize there or present there a density zone of greater than 2,500; is that right?
A. Yes.
Q. And yet, in some of your earlier exhibits, specifically Exhibit 257 -- I'm sorry, 256, you set forth a zone of 2,550 to 5,000. Is it greater than 2,500 or greater than 2,550?
A. Well, let me say first I'm pretty sure it's a distinction without a difference, and can be either one. I think the 2,500 is where -- is fine.
Q. But I mean, which is the density zone that Hatfield uses?
A. I don't recall. It could be the 2,550. That rings a bell, but, again, I'm pretty sure it's a distinction without a difference.
Q. Are you looking at Exhibit 256 right now?
A. No.
Q. Could you turn to that?
A. Sure. Okay, I've got that.

Q. And 257, as well. Is it correct that the difference between these two exhibits is the difference between a four-zone proposal and a three-zone proposal for US West?

A. Yes.

Q. In order to produce these deaveraged cost proposals in this and any of your other exhibits in which you produced a deaveraged cost proposal, did you have to have or use line counts for US West?

A. Yes.

Q. Okay. And what line counts did you use? Did you use US West-specific line counts that had been provided previously in this docket or did you use the Hatfield national?

A. I used the line counts which were provided to me by US West.

Q. Okay.

A. What I call current line counts.

Q. Is it correct, Mr. Spinks, that to produce the $14.20 zone price for Zone One on your three-zone option, you just took an averaged Zone One and Two in the four-zone proposal, the $12.53 and the 15.87?

A. I don't think I simply averaged them; I just put all of the wire centers that were in both of those into one and recalculated the cost.

Q. Let me ask you this. Is it mathematically correct that the average, mathematical average of 12.53 and 15.87 is $14.20, or would you accept that, subject to your check?
A. Yes, it appears to be. When you say three-zone proposal -- oh, for US West, okay.
Q. Right.
A. Yes.
Q. Exhibits 256 and 257?
A. Yes.
Q. So that number is a straight average; is that right?
A. Yes. Well, I don't know.
Q. Well --
A. Either the same amount -- either I made an error and averaged it, although that's not my recollection, it would have to be that the number of lines in the Bellevue-Seattle are approximately the same number of lines that are in the other groups, and that's probably why.
Q. That's where we're going.
A. Yeah.
Q. Okay. That's good, then. So it is a mathematical average -- the result there is a mathematical average, but whether you did it that way

or not, you don't know; is that right?
A. Well, my recollection is is when I recalculated -- when I did the three-zone proposal, I had all the wire centers in the same column, so I'm pretty sure that what you're saying is you had an almost identical number of lines in the two zones.
Q. Well, wouldn't they have had to have been exactly identical?
A. No.
Q. How --
A. No, they can be roughly identical because of the rounding, and you still come out at 14.20. But it's not my recollection that I straight averaged these. That wouldn't be the right way to calculate it. I can't imagine that I did it that way.
Q. Okay. Well, let's --
A. And the work papers were made available. I mean --
Q. Well, let me ask you, in the Bellevue exchange, which is, I think, a relatively small exchange in terms of number of wire centers included in it -- I'm not saying geographically or number of lines, but just in terms of the subset of wire centers that is included in the Bellevue exchange. Do you recall what wire centers you included in the

Bellevue exchange?
A. Well, I think it depends on whether Mercer Island belongs in Seattle or Bellevue. The two -- there are two Bellevue wire centers, Glendale and Sherwood, and then there's the Mercer Island office. I don't recall whether I, in the work papers, calculated an exchange value and then used that. My recollection is I simply grouped all of the wire centers, regardless of whether Mercer Island went into Bellevue or into Seattle, into the same grouping that I used to calculate the cost, the average cost with. So it didn't matter, in other words.
Mr. Tucek had raised an issue that I had included Juanita incorrectly in the Everett wire center instead of the -- or in the Everett exchange instead of the exchange it went to, and it's true that I did that. But it's also true it made absolutely no difference to the bottom line, so --
Q. And let me assure you that that is not where I'm going with this.
A. Okay.
Q. I don't really care whether Mercer Island's included with Bellevue or Seattle.
A. Go ahead.
Q. If it is your testimony that it was

included in one or the other.
A. Yes.
Q. And do you know what wire centers you included in the Seattle exchange?
A. All of those with the CLLI code that was Seattle's.
Q. And no others, unless the Mercer Island thing fell in there?
A. That's my recollection, yes.
Q. So if the CLLI code started STTL, you included it?
A. Yes.
Q. Do you recall whether you included any others, leaving aside Mercer Island, in the Seattle exchange?
A. No, my recollection is is that I used the density of the wire centers to do the selection, and if you look at the density, I believe that all of the -- there are no other wire centers, except the Seattle wire centers and the Bellevue and Mercer Island, that are in this very high-density range. In other words, Auburn, Des Moines, those are all in a lower range. And so it would have been drawing a line at the density zone that determined what wire centers went into and obviously exchanges went into

one zone versus the other. I don't recall that I had to pick any of the Seattle wire centers out of the lower density zone and bring them up, because I was using the exchange basis, although that could have been the case.

Q. Well --

A. That's not my recollection.

Q. You're doing a good job of anticipating my next questions, Mr. Spinks, because I was going to ask you whether or not each and every single one of the wire centers you included in Zone One, Bellevue Glencourt, Bellevue Sherwood, Mercer Island, and all the STTL CLLI code wire centers are individually at a density greater than 2,550 lines per square mile?

A. And I don't recall.

JUDGE WALLIS: Ms. Anderl, is this a good breaking point, or are you nearly through?

MS. ANDERL: The former.

JUDGE WALLIS: Why don't we take our morning recess now and reconvene in about 15 minutes.

(Recess taken.)

JUDGE WALLIS: Let's please be back on the record, following a morning recess.

MS. ANDERL: Thank you.

JUDGE WALLIS: Ms. Anderl.

Q. Mr. Spinks, during the break, were you able to gather some additional information with regard to some of the questions that I had asked you right before the break?
A. Yes, I did.
Q. And are you now able to tell me whether or not all of the wire centers that are included in the Seattle and Bellevue exchanges have a density of more than 2,550 lines per square mile?
A. I can tell you the -- in Seattle, there are 12 wire centers. Seven of them have a density greater than 2,500 lines per square mile and five have a density of less, between 2000 and 2,500 lines per square mile.
Q. Then you were not able to ascertain whether the $14.20 in the three-zone proposal was the result of a simple average of the Zones One and Two in the four-zone proposal or an independent calculation; is that right?
A. What I was able to confirm was that there are roughly 750,000 lines in the two zones. So they're rough equal lines.
Q. Isn't it true that the mathematical result would be something other than the $14.20, unless the lines in the two zones were exactly equal?

A. No, when you have that many lines, 150,000, one can be -- one of the values can be 7.49 and the other can be 7.55 or something like that. There's some distance that they can be different from one another and they still both round to 14.20.
Q. Let me understand how you reached the 14.20, then, for Zone One in the three-zone proposal.
A. Well, I wasn't able to check all my work papers. I was able to check on those two things. This would have been calculated by using all of the appropriate wire centers with greater than 650 lines per square mile in the calculations. That's the way it should -- that's what I should find if I can go back and find the work paper.
Q. It's correct, isn't it, Mr. Spinks, that an exchange, as they're described here in your proposal, Bellevue and Seattle, that the exchanges are smaller than the local calling areas for those exchanges?
A. Yes.
Q. In fact, isn't it correct that from Seattle, it's a local call to Bellingham, or I'm sorry, for Bainbridge Island?
A. I don't know that for sure, but I would assume it is. I know there's quite a large local calling area.

Q. And in your four-zone proposal, Seattle is in Zone One and Bainbridge Island is in Zone Three; isn't that right?
A. Yes.
Q. In connection with the other zones that you've identified in the four-zone proposal, say 650 to 2,550 lines per square mile is Zone Two, 100 to 650 -- is that 650 or 850?
A. Well, it can be either, because there are no wire centers between the two, and I think I used -- I might have used 850 in an earlier exhibit and 650 in this one. But, again, it's another one of those differences without a distinction.
Q. And then, so that's Zone Three. And then Zone Four is five lines to 100 lines per square mile?
A. Yes, and again, it could be zero to 100. There are no wire centers between zero and five, and I was looking at the traditional way they had set up the zone breaks, zero to five, five to 100, so --
Q. That's fine. And within each of the exchanges identified in each of those zones, there is one or more wire centers; is that right?
A. Yes. Mainly one, especially in the smaller zones. There's only one or two wire centers, I think. My recollection is that if we had to do an

aggregation at all, they're almost all individual -- the wire center is the exchange. It's only until you get into your Bellevue, Seattle, I think, that you really start -- where you have a large number of wire centers.

Q. Well, actually, Zone Two consists of a number of exchanges that have multiple wire centers; isn't that right?

A. Tacoma certainly does. Vancouver has three. Tacoma and Seattle are the two, and Spokane both have anywhere from eight to 12 wire centers.

Q. And what is true in the Seattle exchange, which is that there are some wire centers that have a density which is less than the density of the zone that they're in?

A. That's correct.

Q. Could that also be true in the wire centers in the exchanges in Zones Two and Three?

A. Yes, yes.

Q. Mr. Spinks, are you on Exhibit 256 or 257?

A. Two-fifty-six.

Q. Two-fifty-six, okay, good. Now, your proposal there for US West loop cost for HAI 3.1 is exactly the same as what your final proposal is, isn't that right, that it didn't change?

A. Yes.
Q. For the zones?
A. Yes.
Q. Okay. Not for the loop length?
A. I understood that, yes.
Q. And you've got a footnote there that says you ought to add 57 cents to each of the above rates for the groomed loop. Do you see that?
A. Yes, I do.
Q. You did not include that footnote in your final exhibit, Exhibit 261-R. Is that intentional or was that an inadvertent omission?
A. I'm pretty sure it was an inadvertent omission.
Q. So is it correct that, for a groomed loop on your final proposal, one ought to add 57 cents to each of the proposed rates either for the zone average or for the distance band pricing?
A. Yes.
Q. Turn to your rebuttal testimony, please, Mr. Spinks, Exhibit 260-T, on page five.
A. I'm there.
Q. Do you see the statement that starts on line 19 in the middle of the sentence, the fact remains that over 90 percent of the variation in cost

between wire centers?
A. Yes, I do.
Q. Okay. Is it more correct to say that over 90 percent of the variation in average cost between wire centers is explained by the two factors that you list?
A. Yes. And it might even be even more correct to say about 75 percent of the variance is explained by the final regression using the HM 3.1 data that was in -- provided in 261 Revised, the final proposals. The regression analysis was redone from the -- that was the 5.0 data that produced the 90 percent, but Staff's recommendation is to use the 3.1 data and that R-Square was lower than the regression using the 5.0.
Q. So you would be willing to say that you could correctly amend this testimony to read 75 percent, instead of 90 percent, and insert the word "average" in front of the word "cost" on line 20?
A. Well, at the time I wrote this, this was correct.
Q. I'm not suggesting that --
A. I wouldn't be willing to amend the testimony for that, simply because this was accurate at the time. I'm certainly willing to acknowledge,

in fact, volunteered that the new equation does have a different correlation coefficient.
Q. Yeah, I'm not suggesting that you gave incorrect testimony at the time, Mr. Spinks. I'm just asking you, if I were to ask you this question today, could you agree that the answer could be correctly stated that 75 percent of the variation in average cost between wire centers is explained by the two factors that you list?
A. I think so.
Q. And on your rebuttal testimony, this same testimony at page 15, line 18, you say, Between which costs are significantly different?
A. Yes.
Q. Do you mean average costs there, as well?
A. Well, I mean wire center loop costs. And the wire center loop costs are average costs for the wire centers.
Q. Thank you. Mr. Spinks, were you in the room when Mr. Denney testified?
A. I believe so.
Q. Do you recall when he showed his diagram, which ended up being admitted as Exhibit 8, which was a description of the two wire centers with different customer locations?

A. Yes, I do.
Q. Okay. Thinking with that exhibit in mind, would you agree that two wire centers can have the same average loop costs, but significantly different individual loop costs?
A. Could you repeat that?
Q. With Mr. Denney's Exhibit Number 8 in mind, is it true that two wire centers can have the same average loop costs, but significantly different individual loop costs?
A. When you say significantly different individual loop costs, are you referring to -- are individual loops within a wire center different than the average, yes.
Q. Well, but can individual loop costs between Wire Center A and Wire Center B differ from one another significantly and yet produce the same average number?
A. Well, certainly in each wire center you have a different dispersion of loops which drive loop cost, and it is possible for two wire centers to have the same loop cost, but those costs are developed in different -- due to different kinds of dispersion patterns.
Q. So just to clarify, you could have a wire

center -- two wire centers, each of which contain, on a very simplified model, 20 loops. Ten of them cost $10 in one wire center and 10 of them cost $20 in Wire Center A. You have an average of $15; right? That's just Wire Center A.

A. Okay.

Q. And then, in Wire Center B, you could have 20 loops and all of them could cost $15, and that would be an average of $15; is that right?

A. Yes.

Q. And in those two wire centers, they would have the same average loop cost; is that right?

A. Yes.

Q. And yet the $10 loops and the $20 loops in Wire Center A would be different from the $15 loops, the population of $15 loops in Wire Center B; is that right?

A. Yes.

Q. Okay. That's all I was trying to ask.

A. Okay.

Q. I suppose we can save for later the discussion of whether those are significantly different or not. Would you characterize the differences that I gave you in the hypothetical just now as significantly different individual loop costs

between Wire Center A and Wire Center B?
A. Well, I'd say that they weren't relevant to establishing deaveraged rates.
Q. That's not what I asked, Mr. Spinks.
A. No.
Q. They're not significantly different?
A. That's my answer, yes.
Q. What would be significantly different?
A. I don't know. I don't think that's relevant.
Q. Well, you use the term significantly different on line 18 of the testimony, at page 15 that we were just talking about, so what do you mean when you say there significantly different?
A. Well, like I explained at the beginning of this, that when I say that, I'm talking about average loop costs between wire centers. That's the level to which the cost models have aggregated costs, is the wire center level. And if you're asking me is there averaging going on in that process, the answer's yes.
Q. What I'm asking you now is how much of a cost difference is a significant difference?
A. I don't know. Within a wire center, the way I've designed the rates for it, the regression analysis captures the relationship between density,

distance and cost as it's averaged at the wire center level and uses that to develop the distance-sensitive rates. Are you asking me are there significant differences between the distance-sensitive costs within the zones?

Q. I'm asking you what you mean when you characterize costs as significantly different, and --

A. Okay.

Q. You disagreed earlier that loop costs of $15 are significantly different from loop costs of either $10 or $20, and so I'm trying to further explore that answer. If that's not significant, what is?

A. Okay. The reason I answered no -- it probably would have been a more correct answer "I don't know." In order for statistical significance to be determined, you have to have a number of observations to begin with, 10, 20, 30 observations, which you can subject to a test to see whether there are significant differences between however you want to divide them up. And in your hypothetical, you don't have any of that. You just have this five and this 10, and I really can't say that -- there's no basis on which to say they're significant.

Q. And so that is using the term significant

in its statistical sense?
A. Yes.
Q. Okay. On page four of this same testimony, Mr. Spinks, you recommend a Commission workshop to resolve customer identification issues. Do you recall that?
A. No.
Q. Line --
A. Do you have the line?
Q. Thirteen and 14.
A. Okay, yes.
Q. And I don't know if it's fair to characterize it as a Commission workshop. I don't know what you had in mind there. Why don't you tell me?
A. All right. I think I was keying off of Mr. Montgomery's testimony at this point, where he had suggested that if there -- to the extent that there are issues with customer identification, distances, how this process would actually be implemented and work, and we've had examples like pole attachment agreements, where the industry agrees how it's going to work together to accomplish something, I sort of thought that that was maybe what needed to be done to bring the industry together to some common ground as

to how the distance-sensitive identification and the like would take place.
Q. Mr. Spinks, at the conclusion of that same piece of testimony on page 16, you recommend that the Commission adopt your proposal because the 12-zone proposal for US West strikes a fair balance between administrative ease, customer identification issues, and implementation costs. Is that your testimony?
A. Yes.
Q. Does that recommendation assume that customer identification issues have been resolved?
A. I think it assumes that they're resolvable, that I've not seen, through the company's testimony, evidence that the issue of how far a customer is from a wire center poses some problem that makes the proposal impractical or unachievable. I didn't see that. And so to the extent -- although I do accept that this is something new that's not been done in the context of unbundled loops before and that there are going to be some issues, perhaps, that will need to be addressed.
Q. Mr. Spinks, in response to a data request by US West, you stated that you believe the cost of mapping census blocks to exchanges is minimal, approximately $50,000. Do you remember giving that

response?
A. Yes, I do.
Q. What does one get for $50,000?
A. Well, what I had in mind was a database which, for each US West wire center, identified within the wire center boundaries what the census blocks were, what census blocks were contained within what places within each wire center, and that that database could then be used to essentially do the lookup.
Q. And your testimony is that that database is available for US West for the entire state of Washington for $50,000?
A. No, I don't think that was my testimony.
Q. But is that your testimony, if I were to ask you that question today?
A. No. My testimony today would be there's even better ways that are cheaper, and that is through the MapQuest type of an approach. And I think that's probably a better approach than the census block, although I think that they're both valid approaches.
Q. MapQuest does not identify census blocks, does it?
A. No, it's a different way of identifying

customer locations or distances.
Q. And MapQuest does not have a data resident within it that identifies US West's wire center boundaries, does it?
A. No, you shouldn't need them. Well, no, I don't think you would need them with that approach. You just put in the address of the wire center and the address of a customer.
Q. Did you undertake any formal study to analyze or determine the cost to US West to implement your proposal?
A. Well, I read very carefully what the company had to say about its implementation costs, I asked, through a number of data requests, different questions about that cost, and reported that in my rebuttal testimony.
Q. Did you do anything else, independent of asking the company?
A. Well, not so much analysis as understanding of what information is out there today that's already available versus what the company said it would have to create, but which already exists.
Q. Mr. Spinks, do you agree that there are five functions that US West is required to provide for CLECs through its OSS, including pre-ordering,

ordering, provisioning, repair and maintenance, which is a single function, and billing?
A. Yes.
Q. Do you know what modifications US West would have to make to its systems to incorporate loop distance information into its pre-order functionality?
A. None.
Q. Do you know that?
A. Well -- I'm sorry.
Q. Do you want me to repeat the questions?
A. No. If US West wants to undertake incorporating loop distance information into its pre-order system, I'm sure that it has some cost. My issue and concern is with the necessity for doing it, and I simply did not see anything in the company's testimony or data request responses that convinced me that the company needs to incorporate each customer's, two and a half million loops data, into the CLEC's OSS database prior to implementing distance-sensitive rate proposals, or at any time. I mean, you know, if the data is available from another source, I just don't understand the rationale that is necessary to modify those pre-ordering systems.
The only thing that I could see, and I

agree that the billing system obviously has to be able to bill. And so if you said what the billing system -- does the billing system need to be able to reflect the 12 different rates that would exist under the proposal, I would say yes, you do.

Q. Again, you're anticipating my questions, so let me just kind of get there quickly. Do you know what modifications US West would have to make to its billing system to incorporate loop distance information into the billing functionality?

A. Well, I think that your witness yesterday explained that they would use a USOC. So I guess you'd create 12 USOCs, which would populate for each customer who is a CLEC customer on a distance-sensitive rate schedule, that one of those 12 USOCs would be attached to that customer's billing record.

Q. And in order for that to happen, isn't it correct that US West would have to have loop length information for the particular loop in order to associate the correct USOC with it?

A. No.

Q. Why not?

A. What's the matter with using MapQuest data?

Q. Is MapQuest -- I think I already asked you

this. Is MapQuest -- maybe I didn't. Let me just ask now. Is MapQuest data incorporated into US West's ordering or billing systems?
A. No.
Q. Do you know whether or not there are any databases that contain loop length information that are linked with or integrated with US West's billing systems?
A. Would you repeat that question, please?
Q. Do you know whether or not there are any databases that contain loop length information that are linked with or integrated with US West's billing system?
A. No.
MS. ANDERL: Your Honor, if I might just have a moment to check my notes, I think that concludes my cross, but I want to get through all my papers.
JUDGE WALLIS: Yes.
Q. Mr. Spinks, could you take a look at the Exhibit 261-R, which is your final recommendation, and compare that once again with Exhibit 256? Do you see that?
A. Not yet.
Q. Those two documents? Not yet. Sorry.

A. Okay.
Q. Look at the proposal for the 100 to 650-line density band. And I think you'll see, on Exhibit 256, it's $18.95, and on Exhibit 261-R, it's $24.72, although the other numbers match up quite perfectly. Can you tell me what accounts for that difference and which number is correct?
A. I can't without referring to my work papers. Perhaps I could check those over lunch or something.
MS. ANDERL: If I can follow up with additional questions, Your Honor, after Mr. Spinks answers that question, I believe that that does, in fact, conclude my cross.
JUDGE WALLIS: Very well. Mr. Kennedy.
MR. KENNEDY: I have no questions.
JUDGE WALLIS: Ms. Hopfenbeck.
MS. HOPFENBECK: I have no questions.
JUDGE WALLIS: Ms. Proctor. Mr. Kopta.
MR. KOPTA: I'm tempted to ask some questions about how crows fly and whether their eggs make good omelets, but I think I'll reserve that.
MR. KENNEDY: But they're always forward-looking.
CHAIRWOMAN SHOWALTER: I thought you were

looking forward to lunch.

E X A M I N A T I O N

BY DR. GABEL:

Q. Good morning, Mr. Spinks. I'd like to begin by asking you a question about Staff's response to Bench Request Number Three.

MS. ANDERL: Your Honor, were those just responses distributed to the parties? Because, in fact, I've not been in my office and not received a copy of that response.

MS. RENDAHL: I haven't been in my office, either, and they were distributed in my absence. I had requested that they be distributed to all parties. Now, whether that was done or not, I don't know. I can make sure that we get copies today, but I'm not sure if that will --

JUDGE WALLIS: Let's be off the record for just a moment.

(Discussion off the record.)

JUDGE WALLIS: Let's be back on the record, please. It appears that the responses to bench requests from Staff were not distributed to parties in a way to reach them prior to the start of the hearing, were not distributed at the start, so we are securing additional copies and we'll move on to

another topic before taking up issues relating to those responses. Dr. Gabel.

Q. Mr. Spinks, do I recall correctly that you participated in the USF proceeding before the Commission Docket 980311?

A. Yes.

Q. And you're familiar with the Commission's order in the adjudicatory part of that proceeding?

A. Yes, I am.

Q. In preparation of your rate proposal, did you review the Commission's finding on the topic of the geographic level of granularity, how the size of the fund should be measured by looking at wire center cost or exchange cost or some other measure of granularity?

A. I think I recall that they had agreed with the Staff recommendation to use the exchange level.

Q. I'm going to hand you, Mr. Spinks, a copy of one or two pages from the 10th Supplemental Order, and in case your attorney would like to see a copy, I'd like you to take a look at paragraph 71 of that order. Mr. Spinks, could you read into the record the Commission's statement at paragraph 71?

A. Certainly. It says that the Commission has estimated cost of service for each wire center. At

this point in time, verifiable data, such as line counts and loop lengths, are unavailable at a finer level of granularity.

Q. Okay. Now, your proposal is to provide unbundled loops at a rate that's at a finer level of granularity than the wire center; is that correct?

A. Yes.

Q. All right. Would you just address the concern that I believe the Commission raised at this paragraph about the quality of the data that's available below the wire center level, why that -- well, just -- I don't know how to precisely phrase the question, other than saying that this is an issue that was of concern to the Commission in the USF docket, and what would you say regarding that similar issue today in this proceeding?

A. Sure. What Staff has done -- well, in talking about that data is unavailable at a finer level of granularity, we're talking about the ability to estimate costs at lower than the wire center level. What the Staff's distance-sensitive proposal has done is create a way in which you can estimate costs at a finer -- at a level of granularity less than the wire center by estimating the statistical relationship between costs, loop lengths, and the

density of the wire centers.
Q. Well, then, let me turn now to Bench Request Number Three, Staff's response to Bench Request Number Three.
JUDGE WALLIS: Let me ask if the parties have a copy of those documents? Have they been distributed, Ms. Rendahl?
MS. RENDAHL: Yes.
JUDGE WALLIS: Thank you.
Q. Mr. Spinks, you prepared Staff's response to Bench Request Number Three?
A. I did.
Q. How did you produce the plot of points that are attached to this response?
A. The regression software in the Excel program has an option to produce residual plots. It also prints out the specific residual data associated with the regression, and this plot was -- it was asked for that I plot the residuals against the log of cost in the bench request, and that's what this graph reflects.
Q. And I thank you for that response. Are you aware of statistical programs that also plot such diagrams?
A. Yes, there's lots of different regression

software.
Q. And I've handed you a four-page document with four diagrams. Would you accept those as the product of such a program?
A. Yes, that's what they appear to be.
Q. Okay. Would you accept that on the first page, that this plot corresponds to your US West residual plot that you generated using Excel?
A. It doesn't look the same.
Q. Right. But at the top of page one of this four-page handout, you see the regression results?
A. Yes.
Q. And would you accept that those are the same regression results that appear in your Excel file, US West regression in folder sheet one?
A. Yes, they are. I don't doubt that they're the same; I just note that they look different.
Q. Okay. And looking at the plot of the residuals that I have provided you here in the first page, do you observe anything in the pattern of the residuals that -- do the residuals, for example, do they look random?
A. No, they -- no. There appears to be a pattern in them.
Q. And that pattern, for example, let's look

at the high-cost wire centers. What would that pattern, where the value of E, the residual being greater than zero, what would that pattern indicate?
A. Well, there are a number of -- the reason we do this and the reason I laid the plots out to begin with is that when we do regression analysis, we hope to create the best linear unbiased estimators in the regression. That's why we look at the residuals, examine them visually, to see whether patterns exist. When patterns exist, they can indicate a number of statistical problems, such as nonconstant variance, multicollinearity.
THE REPORTER: I'm sorry, multi --
THE WITNESS: Multicollinearity.
THE REPORTER: Can you spell that for me?
THE WITNESS: No.
M-u-l-t-i-c-o-l-l-i-n-e-a-r-i-t-y.
Q. Never look at me for guidance on spellings.
A. I was looking at the heavens. And in any event, this first graph appears to show a pattern that would be indicative of one of these statistical concerns.
Q. And would you agree, Mr. Spinks, that the dependent variable E, the variable that's on the Y axis, is the residual, and the residual is calculated

as the actual value minus the predicted value?
A. Yes.
Q. And so where we -- would you agree, Mr. Spinks, that where we observe a value of E greater than zero, that indicates that the actual cost estimate from the Hatfield Model is greater than the value being predicted by your regression?
A. That's correct.
Q. And so finally, just on this last page, where we see to the right of the word line -- right of the word LN cost, the log of cost, that most of the values are greater than zero. That would indicate, for high-cost exchanges, that the model is under-predicting the level of cost?
A. That's correct.
Q. Now, Mr. Spinks, could I ask you to turn to page two of this four-page handout?
A. I have it.
Q. Okay. Now, looking at the plot of this -- of these residuals, where on the X axis we have distance, the average wire center distance, and on the Y axis, we have residuals, do you observe anything of note in the pattern of these residuals?
A. Not a great -- there isn't a very strong pattern here, but there is somewhat of a pattern,

similar to the first pattern.
Q. Okay.
A. But, again, not -- it doesn't seem to be as strongly --
Q. And then, if I could now ask you to turn to the third page, which is the GTE data, and first, at the top of the page, you see some regression results. Do those regression results look familiar to you? They're identified as corresponding to what appears --
A. Yes.
Q. -- in TLS-9, revised work papers?
A. Yes.
Q. Okay. Now, looking at these residuals, do these residuals appear to you to be random, or do you see a non-random pattern in these residuals?
A. I think it looks very good until you get to the upper end of the cost. And once again, I think you see that same phenomena, although you don't see the nonlinearity that you've seen in the first plot.
Q. And then, looking at page four, looking at the relationship between distance and the GTE residuals, do these residuals appear to you to be random?
A. Yes, these are clearly random.

Q. Okay. Now, having looked at these residual plots, Mr. Spinks, do you have concerns about your rate recommendations associated with your regression analysis of the Hatfield data?
A. Well, I think what the residual plot shows is that in my data transformations, I wasn't successful in removing the nonlinearity from the data, or not completely successful, because we didn't wind up with a random set of residuals. What that means is something I was perfectly willing to concede without going through this, and that is it was likely that there was some bias in the estimation coefficients.
The question -- but if you're asking the question, well, does some bias in the estimation coefficients mean that your proposal should be thrown out and not used, I wouldn't agree with that. And the reason for that would be that the -- because we're reconciling back to the statewide average, even if you have some bias in the coefficients and you haven't -- to begin with, we don't know the true cost and we never will, so this is just another estimate of what that tries to estimate what the cost is. The fact that it, again, may have some bias in it shouldn't be taken too seriously insofar as you're

reconciling the numbers back to the statewide average anyway, so --

Q. Thank you. Mr. Spinks, you testified also in Phase I of this docket?

A. Yes, I did.

Q. And are you familiar with Staff's position in Phase I regarding deaveraging of loop prices?

A. Yes.

Q. Would you please explain for me what factors changed between Phase I and Phase III, wherein Phase I Staff did not favor deaveraging, and then, in Phase III, you have a proposal not only to deaverage wire center cost, but also by distance. So it seems like you moved from not favoring deaveraging to a very aggressive proposal.

A. Sure. In Phase I, our position wasn't that you don't deaverage; it was that we're not ready -- it's not prime time for deaveraging, because we had concerns with unless a universal service fund, we knew where we were going with that, that it would be -- if you deaveraged, you may cause rates to increase in rural areas without having offsetting funding to produce what the act requires, which is reasonably comparable rates.

The events of the FCC have now made it

important to consider the question of deaveraging. And I have to say, from the time of Phase I up until this fall, we had discussed a number of different ideas for it. This is something that has always been on the back burner and on the blackboard. We had several different ideas for how to deaverage. And because we had this time to kind of think about different ways of doing it, we had one proposal that was just simply, there's three zones, it's the urban, suburban and rural, and it didn't matter what wire center you were in, whether it was the smallest one or the largest one. Everyone had a central zone, Zone A, and that was the cost.

But as we began looking at the data, it's very clear that density is a very strong explainer of cost. So we then developed some models that looked like we had density zones, and within each density zone we estimated a distance-sensitive equation. And in the largest density zones for US West, this worked out fine. In the first two, we had very significant results. But when we got down to the rural wire centers, where you had so much diversity of density and loop length and cost, we didn't get significant results. So -- but that would have been the ideal. That's what we thought would have been the ideal, was

to hold density costing and simply estimate the loop length within each density zone. But again, we didn't have the statistical data to do that with, is the other thing. If we had, like, route miles or other data, which isn't available yet, we might have been able to develop something.

So in order to make any kind of a distance-sensitive proposal, we found we had to aggregate all that data together. It wasn't the most desirable way to do it from a statistical approach, and I think one of the results that you see here is the problem that you get when you estimate an equation across the large range of density and the large range of loop lengths, is as the density decreases, loop lengths get longer, and that's just a fact of the data. And you've also got loop length, specific loop length data, and the two variables are related to each other to some extent. I think that's part of what you're saying in these residual plots, which means coefficients aren't exactly what there would be.

But if you put the two together, you still have a legitimate equation with which to estimate cost with. So that was kind of the process that we used to get to where we were going. Again, it's not

what we think is the ideal, but we think it is sufficient.

Q. My last area of questioning, Mr. Spinks, is the implementation issue. This morning, in response to a question from -- I believe it was Ms. Anderl, you said you believed that distance could be measured using the MapBlast, or that's one possibility.

As a cost analyst, I'd just like you to address one issue here. Is there a problem using one source of information for distances, perhaps MapBlast, when the network was laid out in the Hatfield Model, it may have been taking a different approach to running the cables than the driving distances that are provided by MapBlast? Is there any problem with the mismatch or --

A. I don't think -- I don't think that it creates a problem. It creates a difference, but those are the sorts of differences which the industry has had and dealt with in rate designs for services far into the past, in terms of the way it measures rates for an exchange, mileage, various interoffice mileages. The actual route is one distance, the crows flies distance is another distance, and so long as the cost that underlies the actual route is captured in the rate of the crow flies distance, I

think you're okay. And then, on top of that, in this case, you're reconciling back to the statewide average. So I don't see a problem.
DR. GABEL: Thank you.
JUDGE WALLIS: In conjunction with Dr. Gabel's questions, there was some reference to the Staff responses to bench requests. Let me identify those for the record now. Exhibit 401 for identification is the response to Bench Request One; 402, the response to Bench Request Two; 403, the response to Bench Request Number Three. The Exhibit 403 for identification contained the residual plots to which Dr. Gabel referred.
And I'm marking as Exhibit 404 for identification a four-page document, also with residual plots, that Dr. Gabel used in his questioning. And let me ask if there's objection to receiving Exhibits 403 and 404?
MR. EDWARDS: May I ask a question?
JUDGE WALLIS: Yes.
MR. EDWARDS: With respect to page three, at the top, where it says corresponding with file TLS-9 revised work papers, am I to understand that's from the work papers distributed last evening?
JUDGE WALLIS: Mr. Spinks?

THE WITNESS: I provided Dr. Gabel with that disk. He said that it was the revised he was referring to.

MR. EDWARDS: I'm just trying to make sure I know which work paper.

DR. GABEL: That is the name of the file that Mr. Spinks gave me.

MR. EDWARDS: Okay, thank you.

THE WITNESS: And then I'd point out that I don't think there was any difference in the residual plots that I originally used.

MR. EDWARDS: You're beyond me there. I don't have any objection.

MS. ANDERL: I have a question, Your Honor. I don't believe that I have an Exhibit 402, because I did not think Staff responded to a Bench Request Number Two.

JUDGE WALLIS: What I would like to do now is just concentrate on 403 and 404, and we can handle the administrative details on the others at a later time.

MS. ANDERL: 403 is response --

JUDGE WALLIS: The Staff response, and 404 is the document that we provided that Dr. Gabel prepared.

MS. RENDAHL: Your Honor, I believe 402 would be US West's response to Bench Request Number Two; is that correct?

JUDGE WALLIS: Let's just kind of hold that for right now.

MS. ANDERL: No objection to 403 and 404.

JUDGE WALLIS: Okay.

MS. HOPFENBECK: No objection, Your Honor, but we were one copy short of 404. So I'd like to have an additional copy.

JUDGE WALLIS: We'll see that one is provided.

MS. HOPFENBECK: That would be great.

JUDGE WALLIS: 403 and 404 are received in evidence. Let me ask if there are questions from the Chairwoman or the Commissioners?

CHAIRWOMAN SHOWALTER: I've got a few. Try to get through them fast.

JUDGE WALLIS: See how far we get.

E X A M I N A T I O N

BY CHAIRWOMAN SHOWALTER:

Q. I see from my comments yesterday I subtly converted Dr. Gabel from MapQuest to MapBlast, which, while we're on that subject, do I understand from you that, at this time, in the evidence that we have, we

don't have a good estimate of the time or cost that it would involve to automate MapQuest or MapBlast into the ILECs' systems?

A. No, I'm sure we don't. I don't, but I also don't see the need to do that.

Q. Why not? Do you think manual lookup is sufficient?

A. Well, it seems to me that the industry was able to work together on the pole attachment type of agreement, wherein the companies can agree on a set of procedures that will be done that avoid this manual lookup question.

I think that Mr. Montgomery had suggested that they could do some sort of a billing adjustment. And while that's not probably the best way, I think the point is that there are alternatives out there. And I sense a great deal of reluctance on the part of the ILECs to work towards a cooperative agreement because the Commission hasn't ordered the distance-sensitive type proposal.

If such were to become the -- maybe not immediately, but it was understood that we would be using this type of a rate structure and we were set to the task of figuring out the detail of how we're going to use and what we're going to use, that we

would be able to produce results.
US West does have to change its billing database to incorporate those USOCs in there to bill. I don't deny that. That's not a seven and a half to 12 and a half million-dollar job. So the question about the location data and how that gets done doesn't seem to me to be an insurmountable problem. It's just that we have to put our heads together and figure out how to do it.
CHAIRWOMAN SHOWALTER: Okay. I don't want to hold people up for lunch, so why don't I pick up after lunch.
JUDGE WALLIS: Okay. Let's be off the record for a minute.
(Discussion off the record.)
JUDGE WALLIS: Back on the record. We'll resume the hearing at 1:15.
(Lunch recess taken.)
JUDGE WALLIS: Let's be on the record, please. Commissioner Gillis.
COMMISSIONER GILLIS: I have a couple.

E X A M I N A T I O N

BY COMMISSIONER GILLIS:

Q. You were answering some questions or asked some questions about the potential cost of

incorporating some of these commercial databases, like MapQuest, into carriers' systems as a way to implement your recommendation. But kind of a related question I'm interested in is not so much cost -- that's one question, but another question is that type of procedure, using commercial databases, would, as I understand it, rely -- or make assumptions that the highway route miles is a reasonable representation of distances the way the system is engineered, and I'm interested in your perspective on it.

Is that a reasonable assumption to make, that highway route miles fairly represent the way that the loops are deployed, or not?

A. Yes, I think, in the main, that it is representative of distance. I think it's a real good measure to start with, at least, in this process, if we're going to have distance-sensitive rates. I think the thing to keep in mind is the Staff proposal is zero to 12 kilofeet, 12-24, and greater than 24. There are a number of exchanges in Seattle where almost all, if not all the loops, are within the 12-kilofoot range. There isn't even an issue of identification. Every single loop in the wire center is going to be in the 12-kilofoot range. In their

largest wire center down there, all but 1,800 of the some 60,000 or more loops are within the 12-kilofoot range.

So the only time that I see an issue coming up with distance to begin with is when a customer might be located, they do a MapQuest, and he's 11 and a half kilofeet. And the question is, well, is it really -- should he be in the 11 or is it the 12. And in those cases, you might want to do a manual check. You might want to take your map and, in that case, look at the distance from the central office to the location and get a measurement that way.

But I think, far and away, the greatest number of loops for the company are not -- they don't all lie on that 12-kilofoot boundary or the 24-foot boundary. There's relatively few numbers of loops that need to be where identification might be an issue.

Q. So you're suggesting that the issue arises more on loops that are in wire centers outside of major metropolitan areas?

A. Well, the question of identification --

Q. Yeah.

A. -- using the MapQuest question, is that I think MapQuest does a good job of getting you close

to the distance, and certainly with respect to the distance bands that we're proposing, there's only three of them, it would seem to me MapQuest is, far and away, more times going to give you an estimate that's two, three, four, five, six, seven, eight, nine, ten kilofeet. And every one of those cases, you don't have to do lookup, you don't have to do a check; you just have to know it's that distance and you know which USOC applies, depending on what density zone you're in.

Q. Do you think incorporating a distance measure into the cost calculation, making differentiation on distance, has any implications for investment patterns within an exchange relative to alternatives that might treat the costs as averages within the exchange?

A. Well, yes, and that's one of the major impetus behind doing the recommendation. Even though the estimates are admittedly imperfect, the fact is the farther out from the central office one goes, the more they have to pay for the loop. And that sends the right price signal in terms of what alternative facilities options they have available, as to whether they're economically effective.

Q. But for, at least intuitively, a competitor

entering on UNEs would tend to focus on the shorter loops, wouldn't they, under your proposal, compared to the alternative of if the loops were priced the same?

A. Well, my understanding is they intend to focus on the densest areas of the state to begin with, which is also the place where there's the shortest --

Q. This is within an exchange?

A. Yes, but the zero to 12-kilofoot range is so broad now. See, under the old proposal, with the kilofoot increments, one could -- I think there might have been incentive to really tightly focus in the downtown core. I think with this broader proposal that goes out 12 kilofeet, you're now out clearly into residential neighborhoods in most of the exchanges, and so there's less incentive, I think, there to focus on very narrowly in the downtown.

But as far as your business plans have been stated, is that they tend to -- intend to focus, I guess, in urban areas versus rural in terms of offering local service.

Q. But I mean, where it seems like it would come into play would not necessarily be the question of investing in downtown Seattle versus investing in

Omak. The question is, within the Omak exchanges, when you have a distance-sensitive pricing versus the alternative, not having distance-sensitive pricing, that, intuitively, at least, it seems like the structure you propose would encourage more investment close to the central office and then, for the longer loops, perhaps less investment. Is that right? In the Omak area, within the rural area?

A. Investment by?

Q. Well, by UNE -- first of all, UNE-based competitors?

A. Okay.

Q. Who would be purchasing these loops. I mean, that's the cost then and becomes higher as you go out farther?

A. That's right. So they would -- I guess I don't see the investment piece as -- I think they would tend to focus in rural areas in the core where the loop price is less costly and use those loops to the extent they don't have more economic facility-based alternatives. Whereas under a flat zone proposal, the flat rate may be so high in a rural area -- and I think I need an example of one of the tariffs or -- with 100-some dollar a month wire center rate, that versus a distance-sensitive rate

where, at least in the downtown, you could get a loop for 30 or $40.
That may act as an incentive for CLECs to be willing to serve a larger area than simply the dense, urban parts of the state.
Q. But as I understand, the general belief that you're putting forward is that the alternative would be no investment in a Pateros --
A. Yes.
Q. -- in your example?
A. Yes.
Q. Versus some investment that would occur close to the loop?
A. Yes.
Q. I mean, to the central office?
A. Yes, you could get -- yes, you have more potential for drawing them out there and getting those investments.
Q. Just given everything you've just said, the series of questions I just asked you, I'm wondering, does it really make a difference? I mean, the fine tuning that you're suggesting, you started off by saying that in Seattle, the loops are under 12 kilofeet anyway, so the distance-sensitive measure really doesn't matter, and it may matter in more

rural locations where investment is, at the present time, not going anyway. So what's in it for us, this additional fine tuning?

A. When I was talking about Seattle area, the large zone size, what that facilitates is customer identification. So --

Q. But there wouldn't be a distinction in your proposed zones or tariffs, would there?

A. Well, there are --

Q. If they're all under 12 kilofeet?

A. But they're not, they're not. There are several wire centers that were almost all -- all or almost all are, but there's 12 wire centers there. There are a lot of loops in the 12 to 24-kilofoot range in that Seattle metropolitan area. They represent residential suburban areas, and they would be served under a distance-sensitive rate with I think a rate that's lower than -- well, it would be 14.90, as opposed to 11.88, if you're within 12 kilofeet, so --

Q. But to the extent, going back to the urban area, then, in Seattle, you're saying there are some loops that are longer and may be served under the distance-sensitive measure, but in fact, using your proposed structure, it would be less attractive for a

UNE-based competitor to serve those distance-based -- those customers on the long loops than under an average proposal?

A. Yes, in the sense of buying and using the unbundled UNE, but it also correctly aligns or attempts to align the prices with the relevant economic costs that the ILEC faces at that particular distance. And when the CLEC is faced with that cost, he can make a correct -- they can make correct economic choices about whether facilities-based or what type of ways they can serve the customers out there in an economically efficient way.

Q. I understand that concept and why you're proposing it from a theoretical point of view, and the desire to make prices close to cost to send the right economic signal. I understand that. But from a very pragmatic point of view, where we sit today, is that the competitors are investing in -- primarily, there are exceptions, but the competitors are investing in downtown areas, investing in business customers, and I guess one question we've already explored is does your structure change that incentives beyond what they are now to get out to other areas quicker.

But, secondly, given that's where they

appear to be investing, and who knows whether those investment plans will change quickly or slowly, but is the additional complexity that you're suggesting to us worth it right now, given the prices are going to be about the same anyway in the places where people are really investing, or is that complexity something you may want to look at a few years from now?

A. Well, my thought was if the Commission had some -- wasn't completely comfortable with implementing a distance-sensitive proposal, that one of the options it has is to certainly adopt one of the flat zone proposals with directives regarding future work and timetables for how to implement distance-sensitive. I think that's a reasonable way to go, too.

Q. Let me turn to one other set of questions. A couple of the witnesses we've heard over the past couple days have made the observation that the level of precision that we can estimate the average cost within a zone decreases the more disaggregate way we go. The justification is the law of averages. Do you agree with that?

A. I think I do and I don't, if I'm allowed to. Yeah, I think there's some truth that the

farther out you get, the more diverse the situations are in which costs get incurred and you get a wider variation in cost, and it does probably get more difficult to find a single cost that's representative of -- there's a wider variation in cost the farther out you get.

On the other hand, the proposed structure is certainly nothing less than a step in the right direction. You are aligning prices with the way costs are incurred. And I think every witness in this case that has testified to cost has said something to the effect, yes, nobody disputes the longer the loop is, the higher the cost.

What the dispute's about is, at 10 kilofeet, you might be into a kind of terrain condition that actually causes you to incur a higher cost than the cost is at 11 kilofeet. And the question is, you know, what does that mean for the model.

And I guess the way I looked at those variations, and it's true that they could exist, is that you smooth all that over in a rate design. That is, you don't try to mimic -- I mean, the whole reason we use models is to keep from going out and actually physically measuring and assigning a cost to

each individual loop. That would be an expensive and time -- you know, time consuming sort of an undertaking that nobody would really ever do, so we estimate use averages to do this estimation.

Q. Now, I don't think I've heard anybody dispute the theoretical notion that the price should be aligned with the cost, but it seems like the dispute is over how accurate we can be in actually estimating those costs to base prices on.

And the question that's raised is -- I'll just put it to you more directly. Do you believe that we can be as accurate in estimating average costs at a wire center level with models as we can be estimating average costs at say a study area level? Just the nature of models and the fact that, you know, there are wide differences and local levels don't get averaged out.

A. Yes, I think I agree with what I heard some of the witnesses say yesterday about the higher up you go, the -- and the broader area you go, the less -- the more accurate the estimate becomes. And I agree with that.

But, again, at the wire center level, where you're disaggregating and you don't really have the underlying, the granularity of the data that you need

to do it in a perfectly accurate way, you still have estimation methods like that Staff's used that give you what I think are reasonable ways, if you want to do this, that you can accomplish it. And it necessarily involves smoothing over a number of situations that -- such as a case where you could actually have a higher cost at 10 kilofeet than 12 kilofeet.

Q. And just -- your proposal suggests the most zones of any of the proposals on the table, at least suggested, so I take it from that that you are comfortable that the level of disaggregation or the number of zones that you're suggesting, that we can be confident that we are accurately estimating underlying cost at all the zones?

A. Well, I guess where I get my comfort is from the fact that we've already found what the statewide average rate is, and that we're reconciling back to that. The second thing is that if you look at the unbundled loop rate -- or not the unbundled, but the distance-sensitive Centrex rates, for instance, that US West has, and if you look back at my proposal when I had it broke into kilofoot zones, you'll find that the costs were quite similar to each other.

In other words, the model isn't predicting copper cable costs that are widely different from the same kinds of cost estimates that GTE -- or I'm sorry, that US West has made for its Centrex loops in distance-sensitive schedules. So that's where I feel comfortable that the model isn't widely -- you know, that the cost in the greater than 24, the true cost, is widely different than the cost that's being estimated.

Q. And your point is that -- tell me if this is a wrong statement, but as I understand what you're saying is that you're not necessarily arguing that the models can provide accurate point estimates of costs at the wire center level, but they serve as an appropriate statistical method to allocate costs that were estimated at the study area for purposes of disaggregation; is that what you're saying?

A. Yeah, I think that's --

COMMISSIONER GILLIS: Okay, thank you.

JUDGE WALLIS: Chairwoman Showalter.

E X A M I N A T I O N

BY CHAIRWOMAN SHOWALTER:

Q. Back on MapQuest, it may be a small technical point, but at least the web services I've seen measure it in terms of miles, not kilofeet. Do

you know, does MapQuest yield a kilofeet answer itself?
A. I doubt it, but 5.280 kilofeet is a mile. A kilofoot is a thousand feet, so a mile is 5,280, so it's a fairly simple conversion. And also, in miles, they're also in tenths of miles, I think, is what I've seen. So if it's 1.1 miles, that's easily converted to kilofeet, to six point --
Q. But either some person or some computer or program has to do that conversion -- or alternatively, can you state your proposition in tenths of miles, as opposed to kilofeet?
A. True, true. You could. I was working with kilofeet data. They could certainly be converted, 12 kilofeet to two point zone miles. In fact, that might be the simpler way to do it. That's a good point.
Q. That's certainly the way most people think, is in miles. I guess I want to ask some -- well, I want to compare wire center levels to exchange levels to your distance/density formula.
A. Okay.
Q. And I guess the first question is, compared to some division of the list of wire centers into three or four or five, any number of segments or

zones, comparing that to your approach of a distance/density formula, superimposed on -- well, not just wire centers, but the exchange, can you help me with how much more meaningful that is? Is there any kind of measure for how much more accurate that is?

A. No, I don't -- the idea behind the exchange was to preserve for us the question about trueing up universal service costs with unbundled loop rates, because subsidies need to be portable. So you know, if there's a loop that costs -- that has a $15 subsidy associated with it and a CLEC starts providing that loop to -- starts providing service to the customer and the loop goes to the CLEC, the CLEC pays the full cost of the loop, but then gets the subsidy back.

Q. I mean, it seems like you're answering the question in a qualitative sense. I understand that if you could do this distance/density formula, it should be more accurate than just the wire center level, but how much more accurate?

A. Okay. We don't know what the true costs are. That's the big mystery. And what all the models are competing to do is say, I got the right answer, or my answer's closer than your answer. And

we go through this process of what inputs and how the calculations are made, and I think it's through that process that you have to develop your own level of comfort with the relative robustness of the estimates that are coming out of the models.

There have been a number of issues, I guess, pointed up with the relative accuracy question. I would suggest that that's not the issue. The issue is rate design. Do you design rates that exactly mimic cost if you knew what the true cost was, or don't, you know, or do you average them somewhere.

And you know, if you go to the McDonald's in Tumwater, it costs the same there as it costs over in Lacey or in Olympia or anywhere else for a burger, but are the costs of producing that burger there the same? I doubt it. Everybody in competitive industries -- averaging goes on all the time. So this kind of quest for the exact cost and then attach the price to that I think is a bit of a red herring. I think that with rate design, you can overcome those issues by simply we found a statewide average, we reconcile our estimates back to that, and that gives us a rate design which is usable.

And although it can't exactly mimic costs

at every point along where they're applicable on the average, we should be comfortable with it.

Q. I guess maybe I used the wrong word to say accurate, if I did say accurate. I meant how much richer or how much more appropriate are the cost zones produced by your method versus the simple straight wire center method?

A. Well, I don't think there's a way to quantitatively measure it, but if you look at the design, it's more -- it's richer in the sense that not only do costs vary because you're in a rural versus a suburban or urban area, but they also vary by the other driver of cost, as you get farther away from a central office, your loop will cost you more.

So you have two sieves, if you will, that you're sifting things through, instead of one, and that produces a finer estimator.

Q. Okay. Then, also, I'd like to talk a little bit about a wire center level versus exchange level. If we were not going to go any finer than wire center level and we're looking at a list of wire centers, would you agree that it's better to keep at the wire center level than aggregate into exchange levels if the concern is -- I want to say accuracy, so I know that's the wrong word, but --

A. No, I understand.
Q. Appropriate reflection of cost.
A. You do get more economically efficient prices if you use the wire center. And in fact, that's one of the reasons why I said that using wire centers versus exchanges is not a drop-dead issue for Staff. It's the idea that we've used exchanges in the -- for the USF purposes, and my thinking is we need to think through, if we're going to go to the wire center, what that means ultimately for how we do universal service, what level -- are we going to calculate those costs at the same level.

I'm not even sure, and that depends on a yet to be had universal service plan from the legislature. So although we have something temporary in place today which doesn't rely on zones, if we went forward and that was the plan going forward, or something similar to that, then I don't think maintaining the exchange level matters.

But if we eventually see something coming out of legislature and we have our own state USF plan, we've already decided that that should be calculated at the exchange level, and we should examine what that's going to mean for the unbundled loop at the level that we aggregate that.

Q. But I'm glad you brought that up, because I think you said that you, in part, based your -- or maybe in whole, based your exchange level recommendation on the earlier proceedings of this Commission making a recommendation to the legislature about universal service fund.
A. Right.
Q. And as you know, I wasn't there at the time. But since we don't have authority to set the level, one or the other, is it appropriate for us to be basing our zones now where we do have authority on what we recommended two years ago to the legislature, which hasn't yet acted?
A. Right. I don't know.
Q. Another question on -- I think it's Exhibit 259. You were questioned, I think, about some wire centers are hooked up with an exchange that's not really reflective of the wire centers' average cost?
A. Density zones.
Q. Density zones, all right. I'm just wondering, of this list here, how many wire centers are, quote, out of place, close quote, relative to the zone they would otherwise be in?
A. And well, in the greater than 650, Duvall is in with Bothell, and Duvall is a small wire

center. I think Sammamish is included in maybe Hall's Lake. Sammamish is about 500 lines per square mile, so that one would also be out of there. And I believe that there's a key somewhere in the work papers, anyway, that shows the aggregation of the wire centers to the exchanges. So they have somewhere around a dozen or 15 exchanges that group wire centers, and I just don't have right before me what all the mixing is that goes on.

Q. Okay. And does that dozen relate just to GTE or GTE and US West?

A. No, those are just GTE. They have relatively a lot of them, I think. US West has maybe a half a dozen. And those are primarily Seattle, Tacoma, and Spokane all aggregate eight or 10 or 12 together.

Q. Okay. I think I'm trying to get at the issue of how much difference does it make to use exchange area versus wire center in your proposal?

A. It's a dollar or two, it's a dollar or two.

Q. Meaning it's a dollar or two for the average cost of a zone or --

A. Yes.

Q. Okay.

A. Yes.

Q. I've got a note here to look at Exhibit 273. I think you were being questioned about the smoothness and lack of discontinuities, and you explained that. But a follow-up question I was going to ask is if you put all three of these graphs that are on 273 on a common grid or scale, then wouldn't that show the distinctions you're trying to get at between zones?

A. Yes, if it was all on one graph, you'd see three lines that are identical in shape, but each line would be above the other, because -- and the difference between them is caused by the difference in the density zone. The shape of the line is determined by the distance, so the distance determines the shape, and how far up or down on the graph it is is determined by the density of the wire center.

Q. Then, last question is, just before lunch, we left off with, I think, an acknowledgement that we don't have anything like MapQuest automated in a system right now, and I think you suggested before and after lunch that the Commission could nevertheless order such a plan to be implemented over some period of time?

A. Right.

Q. But in the meantime, where we left off at lunch, I think I heard you say we're not terribly concerned that we operate manually in the meantime, or did you mean that this system would not go into effect until we had taken the time and money to automate MapQuest or MapBlast or something into the system?

A. I think, back then, what I was talking about was I wouldn't worry about the manual, and that's simply based on the acknowledgement of information that's been put in the record here during the course about the number of loops to date that have been purchased under existing agreements, and they're a very, very small number.

It doesn't seem to me that there's going to be a sudden explosion of loops, especially since these distance-sensitive prices are not very far off from what they pay today for an unbundled loop under the agreements, it's 12 versus $13, or somewhere in there, and in some cases, they're actually going to be more. So I don't see a sudden flurry of activity, where all of a sudden you've got hundreds and hundreds of customers that you need to identify distances with every day and no way to do it.

Q. But I guess wouldn't it be a sign of

competitive success if, in general, we did start getting hundreds and hundreds of requests a day?
A. Well, yes.
Q. To the extent this is successful, wouldn't the necessity of looking up MapQuest manually push things back the other direction?
A. You couldn't hope to identify distances on any kind of a permanent basis without eventually getting a database in place that automates that process for these things to some degree. But you know, in the next three months, May, June, July, or end of the fall, I do think that we will eventually see, hopefully by the hundreds, some success in this, as CLECs have more assurances to what prices they're going to be paying on a permanent basis, which is the process that we're about today.
So they will eventually pick up, but I think you could do it either way. And I think a more aggressive way would be to implement it and use some kind of a process where the CLEC can provide the MapQuest, and here's the distance and here's the rate that that customer pays and, at least in the short term, the billing would take place on that basis and with the understanding that within so many months, this stuff would become automated.

The other way that's also reasonable is to simply go ahead and implement one of the flat rate proposals with the understanding that it's a temporary situation and that, as of the first of the year, whatever, tariffs have to be filed to implement a distance-sensitive kind of proposal. And then set -- the parties would be set to task to resolve these issues.

Q. Well, then, speaking of flat rate systems, if we were to adopt zones based on wire centers only, do you have an opinion on the desirability of Mr. Denney's page 16, Column Three alternative, perhaps versus the GTE compromise, which collapses the first two rows of that column?

A. Yeah, I think the GTE/AT&T proposal would be -- is the better of the two, and that's because --

Q. You mean the one that collapses the first two rows, or Mr. Denney's?

A. Mr. Denney's proposal would be preferable to Staff.

Q. And why?

A. As we demonstrated yesterday, there's a lot of Zone One -- Zone Three, low-density, high-cost wire centers that are now in Zone One, in that proposal, due to the estimation method that Mr. Tucek

used to develop wire center-specific costs for those wire centers. I don't think they came out very good. I don't think loops in Pullman are cheaper than loops in Everett Main. So there's just too much mixing of high-cost and low-cost wire centers there.

Q. Okay. Is there, in your opinion, a better wire center-based set of zones that has been discussed here in these hearings or that you could describe?

A. Well, I think it would be relatively easy to, for instance, in the Staff's proposal, Exhibit 9, to undo the exchange level calculations and simply move those wire centers back over where they belong and recalculate the rates. All of that information is in my work papers. And if you did it that way, you would have your wire centers all aligned with density zones.

And I realize there's been some disagreement about how you do that, but I think Staff is more comfortable using that external measure, if you will, to determine what density zones wire centers go into as opposed to the much larger degree of judgment that has to be used if you're simply going to go down the list and find a number and say, okay, everything from there on goes in this zone.

Q. So what you're describing, wire center classified or ranked by density zone?
A. Yes.
Q. Okay. What about the number of zones in any of these three alternatives we've been talking -- well, really only two. Mr. Denney's page 16 has four. Do you feel there's a -- either that one or the one you just described, is there a greater value to having five, six or seven?
A. Well, yeah, we considered at the outset why not have, if there's 111 wire centers, why not have 111 rates. After all, you can't get more deaveraged than that.
Q. Well, you probably could, but not if you're going to keep it at the wire center level.
A. And the practicalities, I think, is that both CLECs and ILECs want administrative simplicity in their choices. They don't want to make -- you know, they want -- I think Mr. Denney was saying yesterday, he has 14 states that he has to keep track of what the prices are for all of the individual rate elements. And likewise, the ILECs have complained that there can be substantial cost in having to alter databases to carry out various proposals.
So I think where those arguments lead us is

that unless there's some driving public interest kind of issues that Staff would feel the Commission should ignore what both of these guys are saying and do it this way, if they can reach a consensus, that's okay with us.

And so it seemed to us that they both liked -- thought three zones would do it. The trade-off there is very clear. The level of detail, they seem willing to live with that and work with it and, you know, we don't think that's a drop-dead kind of issue, whether you have three or four or five. That's a matter of your own comfort level.

It's clear that -- I don't know if it's clear, but it's probable that most of the activity's going to take place in one or two of those zones, even if you had seven or eight. There's only one or two zones that are going to be relevant for the CLECs.

CHAIRWOMAN SHOWALTER: Okay. That's all the questions I had.

MS. ANDERL: Your Honor, I have several follow-up questions, as well as an inquiry into what Mr. Spinks was going to check on over the lunch hour. I don't know -- I think it's customary that we kind of do the re-cross before we go back to the redirect.

JUDGE WALLIS: Very well. Mr. Edwards.
MR. EDWARDS: Just one area.

C R O S S - E X A M I N A T I O N

BY MR. EDWARDS:

Q. In response to several questions from Dr. Gabel and also from Commissioner Gillis, and with respect to the charts that Dr. Gabel handed out, I think you testified as to some bias in the estimation coefficients that you agreed exist with respect to Hatfield 3.1, but then said you took some comfort in the fact that the disaggregated costs are then reconciled to the statewide average; is that correct?

A. Yes.

Q. During the reconciliation process, I don't want to over simplify it, but it's basically a ratio that's applied to determined how the costs are reconciled back to the statewide average; correct?

A. Yes.

Q. So to the extent that there is a bias in the disaggregated cost, that relative bias stays in the reconciled cost simply through the ratio process; correct?

A. Well, I think that the question of bias and coefficients doesn't go away when you scale the numbers up or down.

Q. That's my question. The bias remains?
A. Okay.
Q. Is that correct?
A. Sure.
MR. EDWARDS: That's all I had.
JUDGE WALLIS: Ms. Anderl.
MS. ANDERL: Thank you.

C R O S S - E X A M I N A T I O N

BY MS. ANDERL:

Q. Mr. Spinks, before lunch I asked you whether the price in the density zone of 100 to 650 lines, as shown on Exhibit 256, of $18.95, was the correct price, or if the correct price was contained in Exhibit 261-R in that same density zone of $24.72. Do you have an answer to that question now?

A. Yes, over the lunch time, I went back and looked at the work papers and found that I, in Exhibit 261-R, for US West, in the 100 to 650 density range for that -- under the Hatfield 3.1 estimate, that all -- not only the 24.72, but the three distance numbers under that were the numbers that came out of the distance-sensitive equation before adjustment, and it was -- I basically picked up the wrong column of numbers.

The column of numbers that I should have

picked up was the one that said 18.95 instead of the 24.72; and then it was 16.44 instead of the 21.44; it was 20.61 instead of the 20.88; and it should be 23.66 instead of the 30.86. It was a clerical transposition kind of an error. I just picked up the wrong column when I made this exhibit out of the worksheet.

Q. You said you picked up the column of numbers before adjustment. What adjustment was made?

A. The scaling.

Q. What's that?

A. The reconciling the distance-sensitive estimates back to the zone average estimates.

Q. Well, I don't understand that, I guess. What happened to the $24.72 for the zone average that reduced it to $18.95?

A. The fact that the statewide average rate is 18 -- was set at 18.16 and these values produced a larger statewide average rate than that. They're in the work papers. I mean, it's not something that's a mystery. They were filed with the --

MS. ANDERL: May I ask, Your Honor, if the work papers have been identified and admitted as an exhibit?

JUDGE WALLIS: I understand they have not.

Is that true, Ms. Rendahl?
MS. RENDAHL: That's my understanding. These are -- if I might clarify with the witness, these are the work papers that were submitted with your rebuttal testimony?
THE WITNESS: Yes, this had been sent to each of the parties.
MR. EDWARDS: Actually, I think they were work papers that were distributed last night. Was that GTE's?
THE WITNESS: That was just GTE's.
Q. Mr. Spinks, we talked about whether or not some wire centers that were less dense than their zone were included in the zone because they were included within the exchange. Do you recall that?
A. Yes.
Q. Is the converse also true? Are some wire centers that are more dense than their zone in that zone because they're in the larger exchange? Spokane, for example?
A. I'm not sure if I understood your question.
Q. Does Spokane, which is an exchange which is in the 100 to 650 lines per square mile zone, does it have wire centers in it that are more dense than 650 lines per square mile?

A. Yes, there are.
Q. Sorry. I had forgotten to ask the converse.
A. Okay.
Q. I think that you testified earlier, and you can correct me if I'm wrong, that you said that there's a lower cost produced in Zone One using wire centers only than with exchanges. You may have been comparing your analysis to Mr. Denney's. Do you recall giving that testimony?
A. I think that's right.
Q. Now, Mr. Denney's Zone One proposal for US West is $14.26; isn't that right?
A. Yes.
Q. And your proposal is $12.53, plus 57 cents; is that right?
A. Right.
Q. Okay. So in that case, you don't get a lower Zone One number; is that right?
A. Yes. If you rank -- if you use -- I'm using the same Hatfield numbers he is, and I think the difference is he didn't use density zones to rank the wire centers. He just used the cost break. And because of that, it's an apples and orange comparison to look at the two numbers and conclude that Mr.

Denney's is more expensive than mine.
As a general matter, if you -- the use of exchanges dilutes the cost, because you're bringing lower-density wire zones into upper density, and those lower-density wire centers have a higher cost. So your average cost in the higher-density zone -- I'm sorry, your cost in the higher-density zone is higher than it would be if you had left out the lower-density wire centers.
Q. But your cost in your Zone One is not higher than Mr. Denney's cost in his Zone One?
A. That's because they have different wire centers in them. It's apples and oranges to look at them.
Q. Do you know if there are any licensing issues associated with using MapQuest for commercial applications?
A. I would suspect there might be, but I don't know, as a matter of fact.
Q. If US West were, on an interim basis, to perform the loop length determination and the billing adjustment each month on a manual basis until there were automated systems in place -- could you assume that with me for a moment?
A. All right.

Q. And can you assume that there are approximately 6,000 loops currently in service sold by US West to CLECs --
A. Yes.
Q. -- in Washington? And if I were to take on a monthly basis approximately 10 minutes each loop to do the lookup, would you agree that the mathematics of that is it would be 60,000 minutes?
A. Sure.
Q. And that's a thousand hours?
A. Well, the existing customer base that you're doing an initial lookup for? Yes, if you did it that way, that's what the mathematics would show. Another way to do it is each CLEC can identify for the company what the customer distances are and, using a MapQuest-type application, and the company can review those and if it sees any around 12 kilofeet or around 24 kilofeet, where it wants to do a manual check on that, it can do that. I would suggest it would be a lot lower cost to initially establish than you're suggesting.
Q. All right. But if you made no changes whatsoever to US West's systems for purposes of incorporating this loop length data, isn't it true that the lookup and billing would have to be done

each month?
A. I don't know.
Q. Okay.
A. I would expect that the parties -- if there were such a directive to do it, you would find a way to do that. And I don't know that it would necessarily involve that or not.
Q. Let me ask you one or two final questions here, and that is on Exhibit Number 401, which is Staff response to WUTC Bench Request Number One.
A. I have that.
Q. Okay. Did you indicate earlier that you're the author of that response?
A. I don't know what I am. I don't know if I'd indicated earlier if I am, but I am.
Q. You answered my question. Thank you. Are you, yes. Do you see the one, two, three, four -- fourth paragraph down in the Staff response?
A. Yes.
Q. That indicates that, due to a number of errors in the HM 3.1 model data for the US West wire center areas for purposes of classifying wire centers to the correct density zone and the regressions, wire center area data for US West was obtained from the HAI 5.Oa version of the model?

A. Yes.
Q. Is that how you classified wire centers into the correct density zone for the proposal that's set forth in Exhibit 261-R, your final proposal for the -- under the column --
A. Yes.
Q. -- HM 3.1?
A. Yes.
Q. Did you find HM 3.1 Model data to be unsuitable for the purposes of classifying wire centers to the correct density zone?
A. I found a number of errors in the square miles that were -- that HM 3.1 said were the exchange areas that were the exchange areas for US West or wire center areas. I had also recalled from Phase I, I think it was, some concern being raised by US West about that. I could have sent a data request to the company to get the data, but it was available in 5.0, and when I compared the two, I noticed that a number -- a fair number of corrections had been made that led -- believed by me to be much more representative.
It was also my recollection that in 0311, US West no longer had the criticism of the Hatfield model with respect to errors in the exchange areas. And so I just picked those out as a matter of

convenience.
MS. ANDERL: I think that's all my questions.
JUDGE WALLIS: Any other follow-up? Ms. Rendahl.
MS. RENDAHL: I just have a few, Your Honor.

R E D I R E C T E X A M I N A T I O N

BY MS. RENDAHL:

Q. Mr. Spinks, you've entertained a few questions on the distinction between separating into exchange level versus wire center level, and distinctions between the two and having high-cost and low-cost variations of wire centers within the exchange level.

Is it true that if you were to move certain wire centers from one zone to another, that you might have other distortions or what might be seemingly odd alignments in the corresponding census block or where certain streets or houses were located that -- do you understand what I'm asking you? That in the sense that there are variations within whatever category you're going to go look at, whether it's a census block group, a wire center, an exchange, or down to the street or house level?

A. Yes, that's true.
Q. Okay. And so you're going to have some dense -- relatively dense or relatively sparse areas in whatever category you're looking at?
A. You will, because such exists within all of the wire centers. That's true.
Q. So how you categorize them is a choice based on factors that you may want to use or may not want to use?
A. That's correct.
MS. RENDAHL: I think that's all I have.
JUDGE WALLIS: Is there anything further of the witness? Let the record show that there is no response. Mr. Spinks, you're excused from the stand. Let's be off the record while the next witness steps forward. That would be Mr. Knowles; is that right, Mr. Kopta?
MR. KOPTA: That is correct.
(Recess taken.)
JUDGE WALLIS: Let's be back on the record, please, following our afternoon recess. And there is pending a request for official notice of a portion of a tariff, and weighing the discussion that has taken place on this and the nature of it, I think it's appropriate to allow official notice, and we will

allow the parties to refer to this in the briefing.
MR. KOPTA: Thank you, Your Honor.
MS. ANDERL: Your Honor, two other administrative matters, if we're going to do that for just a moment. One is I'd like to move the admission of Exhibit 401.
JUDGE WALLIS: Is there objection?
MS. ANDERL: Staff response to Bench Request Number One.
JUDGE WALLIS: I hear no objection, and Exhibit 401 is received.
MS. ANDERL: The other thing is --
CHAIRWOMAN SHOWALTER: Quick, while everybody's gone.
MS. ANDERL: Yeah, a couple of others. No, Your Honor, I think that when we were all here this morning in our administrative discussion, you indicated that the ruling on Exhibit 73-C would be to admit that, as well, which is the corrected data request response, and I don't believe that that ruling has been made on the record yet.
JUDGE WALLIS: I believe it has not. You are correct. The exhibit will be received.
MS. ANDERL: Thank you.
JUDGE WALLIS: And I will call the parties'

attention to WAC 480-09-736(6)(c), which directs parties, as soon as a mistake is discovered, not after a corrected exhibit has been prepared, to alert other parties of that fact. And I have to say that I am quite concerned about the process here. I'm not in any way alleging that there was anything nefarious in US West's response to it. I know that when there are many complicated matters going on, it's easy to lose track of details, but these are sometimes very important details.

And it is essential in our process that the parties have the opportunity to prepare. And while it is necessary for us to make corrections from time to time, it's also necessary for us to make sure that other parties are aware that those corrections are being made so that we all can get to the hearing and avoid the disruption that a surprise causes and the time that it takes to work through it.

So with that, let's acknowledge that the CLECs are calling to the stand at this time witness Rex Knowles. In conjunction with Mr. Knowles' appearance today, a document has been filed with the Commission. I'm assigning that the Exhibit Number 281-T for identification. That is the response testimony of Rex Knowles. Mr. Knowles, I'm going to

ask you to stand and raise your right hand, please.
Whereupon,
REX KNOWLES,
having been first duly sworn, was called as a witness herein and was examined and testified as follows.
JUDGE WALLIS: Please be seated. Mr. Kopta.
MR. KOPTA: Thank you, Your Honor.

D I R E C T E X A M I N A T I O N

BY MR. KOPTA:

Q. Mr. Knowles, would you state your name and business address for the record, please?

A. My name is Rex Knowles, and my business address is 111 East Broadway, Suite 1000, Salt Lake City, Utah, 84111.

Q. And do you have before you what's been marked for identification as Exhibit 281-T?

A. I do.

Q. Was that exhibit prepared by you or under your direction or control?

A. It was.

Q. Do you have any corrections to make to the exhibit at this time?

A. Yes, I do. My title on page one, line two, has changed. I am now vice president regulatory.

And based on what I understand happened in -- earlier in the week, there are some references in my testimony to numbers that were apparently developed using HAI 5.0, which should be modified to reflect the corresponding numbers in the resulting determinations using the HM 3.1, I believe.

Q. And with those corrections, if I were to ask you the questions that are contained in Exhibit 281-T, would your answers be the same as those contained in that exhibit?

A. They would.

MR. KOPTA: Your Honor, at this time I would move the admission of Exhibit 281-T.

JUDGE WALLIS: You've indicated that there are some corrections to be made. Are you going to draw those out in further questions?

MR. KOPTA: I had not anticipated doing so. I realize that the issue of how to treat references to HAI 5.Oa and any derivative references is yet to be determined. Mr. Knowles simply wanted to ensure that should the Commission decide to strike -- physically strike portions of the testimony, that it would have a record basis for realizing that Mr. Knowles is still making the same testimony, just using different numbers than those using HAI 5.0a

Model.
JUDGE WALLIS: Let's be off the record for just a moment.
(Discussion off the record.)
JUDGE WALLIS: Let's be back on the record, please. During a brief off-record discussion, we learned that the difficulty with numbers relates to the use of the HAI 5.0a cost model in earlier versions of one of the witnesses' testimony. And Mr. Kopta, on behalf of Mr. Knowles, has agreed to provide an errata sheet that corrects those numbers, even though they are descriptive, as opposed to substantive in nature. With that, we will receive Exhibit Number 281-T.
MR. KOPTA: Thank you, Your Honor.
Q. Mr. Knowles, for the benefit of the Chairwoman, who wasn't here earlier in the phases of this docket in which you testified, would you provide a brief summary of your background and responsibilities with Nextlink?
A. Certainly. I graduated from Portland State University back in 1989 as a business major, finance emphasis. I then started working in the telecommunications industry, United Telephone of the Northwest in Hood River, Oregon, where I had

responsibilities for incremental costing, 911, extended area service and related subject matters.

In 1993, I moved to Las Vegas, where I worked as a regulatory manager for Sprint Central Telephone Nevada, and there I was responsible for incremental cost studies, as well as alternate regulation plans and deregulation type initiatives.

In 1996, I came over to Nextlink as a director of regulatory, and I've been responsible since that time for all regulatory, legislative interconnection and carrier relations issues for Nextlink, mostly in the US West states, and also in Nevada.

CHAIRWOMAN SHOWALTER: Thanks.

MR. KOPTA: Thank you, Mr. Knowles. He's available for cross-examination.

JUDGE WALLIS: Mr. Knowles, I'm going to ask you -- I note that you're relatively soft-spoken. Even though I'm quite close to you, I'm having difficulty hearing you. I'm going to ask you to pull that microphone much closer to your mouth. I think, that way, we'll all be better able to hear your responses. Thank you very much.

THE WITNESS: Sure.

JUDGE WALLIS: Much better, thank you.

Questions from GTE.
MS. McCLELLAN: None from GTE.
JUDGE WALLIS: Ms. Anderl, US West.
MS. ANDERL: Thank you,

C R O S S - E X A M I N A T I O N

BY MS. ANDERL:

Q. Good afternoon, Mr. Knowles.

A. Good afternoon.

Q. I understand you have an airplane to catch. We'll try to make this brief.

MR. KENNEDY: Talk really slow.

Q. Turn to your exhibit on page five, please. Why do you believe that amortization over a three-year time period is conservative, referencing your testimony on lines two and three of page five?

A. The time frame that we're looking at to be able to recover the cost, the nonrecurring cost in particular of getting a customer to change over is one of those areas where you don't really know how long you're going to keep a customer, whether it will be one year, two year, three year, four year, five years. When we are doing our general business planning, we typically try to amortize those internally in a time frame shorter than three years. So from our business planning perspective, it's

typically -- three years would be conservative.
Q. And if you had chosen a period of, say, five years, the resulting total on line 15 would have been a smaller amount; isn't that right?
A. Certainly, although whether you would actually recover it is the question.
Q. And as opposed to -- assuming that you could amortize those nonrecurring charges over a three-year recovery period, you could also have set up a model wherein you would recover those nonrecurring costs up front by charges to your end user customers; is that right?
A. Of course you could always do that. The question is whether the retail market will allow it. The problem there is that we are in competition with US West, and US West and GTE's nonrecurring charges don't anywhere approximate the numbers we'd be dealing with here. It would make it much more difficult to actually attract a customer to come over to the CLEC.
Q. Let me ask you about some of the numbers that you have in your column here. You have, on lines 10 and 11, cable unloading and bridged tap removal. Do you see that?
A. I do.

Q. Would you accept, subject to your check, that the Commission order in this docket permits US West to recover one or the other of those charges, but not both on the same loop?
A. Subject to check.
Q. And on your line eight, installation with designated testing, do you see that?
A. Yes.
Q. Is that correct that that is the most expensive installation option that is available?
A. That's my understanding. That's what Nextlink typically purchases, because we want to make sure that when we get a loop, that it first of all meets the quality that it needs to have. Secondly, when we do a coordinated cut-overs, that the customer isn't put out of service, and that is the option that has both of those available.
Q. There are options available that are priced in the $40 range, though, aren't there?
A. I would have to check.
Q. Would you accept that, subject to your check, that US West's compliance filing reflects a rate for installation at the lowest price of under $45?
A. I would, but I would suggest that that does

not include coordination, nor testing.
Q. Do you know, going back to the cable unloading and bridged tap removal, what percent of loops overall require this work?
A. I'm not.
Q. Do you know what percent of loops that Nextlink has purchased from US West have required that work?
A. I am not familiar with that number, either.
Q. In your calculation here, Mr. Knowles, is it your -- are you suggesting by this testimony that the $18.16 loop price, on an average basis, is too high?
A. What I'm suggesting is that when the Commission is looking at the prices that CLECs pay for unbundled loops, that they need to take into consideration the practical ramifications of whatever price we're paying. That is there is a cap on how much revenue we can generate by offering the services to customers and the cost that we're paying for unbundled network elements, for instance, the loop and all the associated elements there, collocation, intertransport to get to those collocated areas all have to be looked at as a whole when you're trying to determine whether or not a competitor can affordably

go in and offer service to a customer.
So with that in mind, the 18.16, when you put it together with everything else, is the relevant number on average that the Commission needs to look at to see whether or not a competitor can have potential entry into a market.
Q. Is that a yes or a no?
A. I believe it was a modified yes.
Q. And have you presented any evidence in this docket, Mr. Knowles, that your average revenues per customer do not exceed $38.73?
A. I have provided no testimony one way or another about what our revenues are per customer.
Q. And the next page of your testimony, lines 24 and 25, is what you're saying there, if I can restate this, and tell me if it's a fair paraphrase, that if the average recurring price of the loop is significantly above the actual cost, it creates a disincentive to competition?
A. Can you repeat that, please?
(Record read back.)
THE WITNESS: I'm not certain, even with having it read back, that I understand exactly what the question is. Are you --
Q. Well, let me see if I can explain it for

you.
A. Okay.
Q. You've stated that unless the Commission adopts cost-based loop prices, some of which are less than the statewide average, effective competition would be unlikely to develop --
A. Correct.
Q. -- beyond the region of the CLEC's own networks?
A. Correct.
Q. So I'm asking you if what you're suggesting there is that if the average price is above the actual cost, it creates a disincentive to competition?
A. If you're saying if the average statewide cost is greater than the specific cost that a CLEC would incur or an ILEC would incur providing a loop in a less -- in a lower-cost area, would that be a disincentive to competition, then, yes, I would agree.
Q. Okay. And if the average price in a particular zone is above the average -- I'm sorry, let me try it again. If the price of a loop in a particular zone is significantly above the average cost in that zone, did that also create disincentive

to competition within that particular zone?
A. It depends on what degree you're looking at. I mean, what we're trying to do here is provide a practical balance between the disaggregation of costs and the practicality of implementing those costs.

But you're always going to have some averaging going on, and you know, I refer to Mr. Montgomery with respect to, you know, what level is enough to get the right balance, but at some point, you're always going to have some above and some below a particular average cost. The question is what is the disparity between those, and is there a way to practically eliminate those for the majority of the areas where it's significantly larger than it need be.

MS. ANDERL: That's all my questions. Thank you.

JUDGE WALLIS: Mr. Kennedy.

MR. KENNEDY: None.

JUDGE WALLIS: Ms. Proctor. Ms. Rendahl.

MS. RENDAHL: None.

JUDGE WALLIS: Dr. Gabel.

E X A M I N A T I O N

BY DR. GABEL:

Q. Good afternoon, Mr. Knowles. I just have one or two brief questions. First, referring to page five of your Exhibit 281, line 10, cable unloading, that refers to removing load coils?
A. That's my understanding, yes.
Q. And are you familiar with the resistance design standard for loops?
A. I am personally not an engineer and don't know the standards myself.
Q. Okay. Item line seven, expanded interconnection channel termination?
A. Yes.
Q. That's a rate of $2.12?
A. That is the rate we've included there, yes.
Q. That's for connecting an unbundled loop to your collocation page?
A. Yes, correct.
Q. And if you were to buy the port and the loop from US West or GTE, if you were to get the UNE platform, would you then avoid this cost, or even with the UNE platform, do you still need the expanded interconnection channel termination?
A. I have not tried to buy anything off of a UNE P type platform, so I don't know what costs would be included in US West's perspective, depending upon

whether US West is doing the connections or whether the CLEC would do the connections.

It's very possible, in prior scenarios -- I'm not sure what US West's position is on this right now, but in prior scenarios, they were requiring the use of a spot frame, which would have required two EICTs to make that appearance available on the SPOT frame. And therefore, it would have doubled this cost, not deleted it. I'm not certain what their proposal is or what, if any, resolution the Commission has made to that issue at this point.

DR. GABEL: Thank you. I have no further questions.

JUDGE WALLIS: The Commissioners.

COMMISSIONER HEMSTAD: No.

CHAIRWOMAN SHOWALTER: No.

COMMISSIONER GILLIS: No.

JUDGE WALLIS: Mr. Kopta.

MR. KOPTA: Just a couple of questions.

R E D I R E C T E X A M I N A T I O N

BY MR. KOPTA:

Q. Mr. Knowles, Ms. Anderl asked you a question about nonrecurring charge of somewhere in the neighborhood of $40 for getting an unbundled loop. Do you recall that discussion?

A. I do.
Q. And what does Nextlink get for that $40?
A. It's my understanding that Nextlink gets an unbundled loop made available sometime within a -- I believe it's a 24-hour period, but I'd have to check that, that comes available for that customer. It is not tested. It's basically the loop as it is or as it has been. We don't know what its characteristics or quality is, and we don't have it coordinated at a particular point in time so we can keep the customer from having to go out of service.
Q. And how long would the customer potentially be out of service if Nextlink simply obtained a $45 nonrecurring charge?
A. My understanding is it could potentially be up to a day.
Q. And without testing, what's the result if Nextlink obtains a loop without any testing having been done on that loop?
A. Well, if you don't have your testing done, you don't know what your loop characteristics or quality is, and your probability for maintenance problems could be increased. We have found that it's been much more effective to get everything tested, know what the quality is when you're starting out,

and doing that up front rather than waiting till you have problems and having a customer that's unsatisfied.

Q. You also had some discussion with Ms. Anderl about whether there are disincentives to competition if prices exceed or are lower than the statewide average. Do you recall that discussion?

A. Yes.

Q. From Nextlink's point of view, in terms of pricing of unbundled loops vis-a-vis the statewide average, what impact does it have on Nextlink to have the ability to obtain loops that are less than the statewide average and, contrarily, higher than the statewide average?

A. The impact that it has on Nextlink is it sends appropriate economic signals, in my opinion, on when to buy an unbundled loop, when to build our own facilities in trying to serve the same loop. There's another issue, as well.

The Commissioners, I gathered from the last set of discussions, is already familiar with the buy versus build issue, so I won't go on with that one.

But the other issue is if you're dealing with perhaps a zone-based or a distance-based loop, what might happen is you might have the opportunity

to go into a central office that you might not have been able to go into before in the less-dense areas. If you've got the ability to go into a less-dense exchange and have some loops where you can actually make some money, it gets you in there. Once you're in there, you've incurred all the costs for collocation, for getting transport to that central office, then you're already there, the economics change for getting additional customers after the fact. So it might actually help provide the most opportunity for a competitive entry throughout more parts of the state.

MR. KOPTA: Thank you. That's all I have.

JUDGE WALLIS: Is there anything further of the witness? It appears that there's not. Mr. Knowles, thank you for appearing. You're excused from the stand.

Mr. Kopta, on behalf of his clients, is at this point calling William Page Montgomery to the stand. Mr. Montgomery, why don't we change our order here. I'll ask you to raise your right hand.

Whereupon,

WILLIAM PAGE MONTGOMERY,

having been first duly sworn, was called as a witness herein and was examined and testified as follows:

JUDGE WALLIS: In conjunction with Mr. Montgomery's appearance, several documents have been pre-filed. I'm marking these for identification as follows:

The reply testimony of William Page Montgomery is marked as Exhibit 301-T for identification. The document designated Rates Table Exchanges Table is 302 for identification. Exhibit 303-T is the rebuttal testimony of William Page Montgomery. 304 is Revised Exhibit Rates and Exchanges Table, and 305 is examples of off the shelf distance calculations. Mr. Kopta.

MR. KOPTA: Thank you, Your Honor.

D I R E C T E X A M I N A T I O N

BY MR. KOPTA:

Q. Mr. Montgomery, would you state your name and business address for the record, please?

A. My name is William Page Montgomery, and my business address is 1564 Skyline Drive, Laguna Beach, California.

Q. Mr. Montgomery, do you have before you the testimony and exhibits that are marked for identification as Exhibit Numbers 301-T through 305?

A. I do.

Q. Were those testimony and exhibits prepared

by you or under your direction and control?
A. Yes.
Q. Other than references to the Hatfield Model 5.0a, are there any changes or corrections that you need to make to the testimony or exhibits?
A. There's one broad type of correction in the reply testimony because of the word processing issues. Wherever I had a dash, it either appears as an asterisk or as a unique character that I've never seen before, which is a Y with two little dots over it. And so without going through and making all those changes, every time you see a Y with two little dots over it, it means a dash.
MS. ANDERL: That takes care of most of my cross.
THE WITNESS: Also, I'd point out that Exhibit 302 is actually superseded by Exhibit 304, and is probably redundant for that reason.
Q. And Mr. Montgomery, are you willing to provide an errata sheet similar to the errata that we had discussed in connection with Mr. Knowles' testimony, making the corrections needed to eliminate references to HAI 5.0a?
A. Yes.
MR. KOPTA: At this time, I would move for

the admission of Exhibits 301-T through 305.
JUDGE WALLIS: Is there objection? Let the record show that there's no objection, and those documents are received in evidence.
MR. KOPTA: Mr. Montgomery is available for cross-examination.
JUDGE WALLIS: Ms. McClellan.
C R O S S - E X A M I N A T I O N
BY MS. McCLELLAN:
Q. Good afternoon. Is it Dr. Montgomery, I'm sorry?
A. Mr. Montgomery.
Q. Mr. Kopta elevated one of our witnesses to doctor; I thought I'd return the favor.
A. Not the first time that's happened. Honorary Ph.D.s.
DR. GABEL: You have to make a donation.
JUDGE WALLIS: Ms. McClellan, could you move that microphone a little bit closer to you -- a lot closer to you, please.
MS. McCLELLAN: Is this better?
JUDGE WALLIS: Yes, it is. Thank you very much.
Q. Mr. Montgomery, you spend a significant amount of your professional experience dealing with

analyzing costs of operating a local telephone network; correct?
A. Yes, I'd say so
Q. And you know the difference between feeder and distribution plant?
A. Yes.
Q. And the distribution plant is the part of the network that is the closest to the customer; is that right?
A. Well, technically the customer's drop is the part that's closest to the customer, but distribution is closer than the feeder component, yes.
Q. Okay. And in general, the feeder plant is the portion of the network that actually enters the central office?
A. Yes.
Q. So the distribution plant is connected to the feeder and the feeder is connected to the switch?
A. Yes.
Q. And the feeder cables would be larger in size, but fewer in number than the distribution cables?
A. Generally speaking, that's true.
Q. Okay. And is it true that distribution and

feeder plant have to be laid out in order to serve all customers in a wire center in an efficient manner?

A. It's true that they are theoretically laid out to serve all the customers in a wire center in an efficient manner, subject to a number of caveats over time. First of all, typical practice in the telephone industry is to relieve feeder, by which I mean it's easier to go out and upgrade the feeder plant, particularly with fiber-optics, so there's more opportunity, more activity to increase the capacity of the feeder plant.

In addition, of course, in any area that's not completely built out already, a totally mature neighborhood served by a wire center, there will be additions of distribution plant.

Q. But in general, you do not design plant to serve only one customer?

A. That's true.

Q. Would it be possible that the distribution plant from a particular customer location might follow a path away from the switch in order to connect with the feeder route?

A. It might well do that. That's part of the problem that has bedeviled, if you will, the

development of these engineering cost models, is that there are a lot of different assumptions that one could make about how that routing takes place.

Q. And wouldn't it necessarily be true that the feeder routes that follow the paths of the shortest -- I'm sorry, let me start over. It would not necessarily be true that the feeder route would follow the path of the shortest driving distance, would it?

A. It doesn't necessarily follow the path, but I think in studies that I've heard about and talked to people about, driving distance is a reasonably good surrogate. And particularly, I'll tell you that I've talked to Dr. Richard Emerson, who's developing your loop cost model for GTE, about the effects of driving distance and whether that's a better or worse way of looking at loop lengths for engineering purposes.

Q. But it might be the case that the feeder route does not correspond to any part of the path over driving distance?

A. That's quite true. I don't think that's -- what you're suggesting here I don't think has any relevance whatsoever to the issues before the Commission.

Q. Well, we can quibble over that, but we won't. It's late.
A. Not that late.
Q. Do you know whether a program such as MapQuest could map every customer location within the state of Washington?
A. I don't know, and given what I've heard the last day and a half about MapQuest, I think it's appropriate to suggest several things. One, if you read my testimony on page 12, I was saying there are ways that this can be done simply to get to where we want to go in terms of distance rates. I said that industries should work together to work this out and the Commission should oversee that.
And MapQuest is but an example. There are a number of different databases that do this and there are a number of ways to do it. What I object to is the idea that somehow I'm recommending MapQuest or one of its variations as the system to implement this distance-based pricing of loops. It's clearly not what I said in my testimony. And like a lot of other things I've heard, this is -- these are just make weight arguments that delay more efficient pricing of local loops on the parts of the incumbents, as far as I'm concerned.

MS. McCLELLAN: With that clarification, I don't have any further questions.

C R O S S - E X A M I N A T I O N

BY MS. ANDERL:

Q. Good afternoon, Mr. Montgomery.

A. Good afternoon. Do you know what that little symbol means?

Q. I think it's part of the name of an ice cream. Is it correct, Mr. Montgomery, that the break point between your Zone A and your Zone B in your rate proposals, the break point is a density zone of greater than or less than 100 lines per square mile?

A. Yes, that's correct.

Q. And you obtained those density -- that density information from Staff's testimony; is that right?

A. Yes, I took Mr. Spinks' original set of work papers and really, what I was trying to do was not do my own analysis at all, but simply roll up the information that he had provided in a format that involved fewer zones than the original Staff proposal, fewer different rate elements, and that's really what I was doing with that. And in doing the roll up and looking at the data, it struck me that 100 access lines per square mile seemed like a

reasonable break point.
Q. Why was that?
A. Excuse me?
Q. Why?
A. Just looking at all the data points and where the exchanges were located. And the fact is, what I was trying to do was, because I wanted to emphasize the distance elements that we've been talking about, I wanted to simplify the rest of the rate structure as much as possible. So I only developed two density -- strictly density zones. So that's why I found that break point.
Q. And you broke them out on an exchange, not a wire center basis?
A. I followed Mr. Spinks' data set, yes.
Q. Okay. Did you hear Mr. Spinks testify earlier this afternoon that the assignment of wire centers and exchanges to density zones for US West was based, in all cases, on data obtained from HAI 5.0a?
A. Yes, I think I heard him say that. In the original testimony, yes, that's true.
Q. All right. And do you have any reason to doubt that that's, in fact, the information that you used in your final recommendation?

A. Now, by my final recommendation, what do you mean?
Q. Exhibit 304.
A. Final recommendation actually went back into Mr. Spinks' work papers that were based on Version 3.1, and I did a little bit more than I had done the first time around in the sense that I re-specified the equation for every wire center group that he had. In other words, I redid the data. So my revised rates in the Exhibit 304 are based on 3.1 data.

But I'd say that, having gone through this exercise, and this is the first time I think many of us have thought about loop deaveraging issues in this intense way, I've sort of come to the point of view during the hearings here and elsewhere that doing it on a wire center basis, as opposed to an exchange basis, has a lot to recommend it. And I really hadn't focused on that issue when I first prepared the testimony.

Q. Okay. I want to go back to the bench request that Staff responded to, and that is Exhibit 401. I can provide you with a copy of it if you need to.

A. I haven't seen Exhibit 401. When you put

it in a while ago, I'd never seen it, so I'll take a look at it.
MS. ANDERL: Sorry, Your Honor. May I approach the witness?
JUDGE WALLIS: Yes.
THE WITNESS: May I have a moment to read this?
JUDGE WALLIS: Yes.
THE WITNESS: Thank you.
Q. I'm sorry, Mr. Montgomery, the question, as well as the answer, might be helpful to you.
A. Okay. I've read through this once.
Q. Okay. In the fourth paragraph, I think it is, in the answer, do you see the description of how the original classification into density zones was done using data from HAI 5.0a?
A. Yes, is this the one that has all the little arrows and exclamation marks next to it? Yes, it says --
Q. That's very illustrative for the record. Thank you, Mr. Montgomery.
A. It simply gives the number of errors in HM 3.1. The wire center area data was obtained from HAI 5.0a.
Q. And after -- upon reading that, do you have

any independent knowledge of whether the density zones that you used were obtained from HM 3.1 or HAI 5.0a?
A. Maybe I need to look at the question again, because I'm confused. I don't know whether the question actually refers to what Mr. Spinks and the Staff did originally or what they did in what was filed in the rebuttal testimony.
Q. Okay. I think the question, Mr. Montgomery, was a request for an explanation of how density was calculated. Then, while Mr. Spinks was on the stand -- and I hope this is an accurate reflection of the record. I think it is. Mr. Spinks indicated that even his most recent recommendation includes the assignment of density zones via information from HAI 5.0a.
A. I must have been out of the room when he said that, because I was unaware of that.
Q. I see. That's kind of what I was asking you about. I was surprised that we were not communicating.
A. Well, I must have been out of the room. That's the first I've heard of it, and that wasn't what I understood before.
Q. Mr. Montgomery, take a look at your Exhibit

303-T, which is your rebuttal, or last round of testimony?
A. Mm-hmm.
Q. On page 10, lines 13 through 15.
A. Mm-hmm.
Q. That's part of a larger sentence, but you state, starting on line 11, Once the cost of a wholesale component, a UNE, that makes up part of a retail service is deaveraged so as to better reflect the cost effects of line density and distance, the same economic cost can be reflected in an ILEC's pricing and service packages that are meant to respond to the competitive pricing of the CLECs.
Is it correct that what you're saying here is that the UNE prices become the price floor for the ILEC's retail services?
A. Essentially, that's what I'm saying. That's how I said it in the original testimony on January 18th. I used the term price floor.
Q. Okay. Looking on footnote five in that same page, you state, Rather than utilize the retail pricing flexibility that could accompany deaveraging of the loop UNE -- and then you go on. Are you saying in that statement that the ILECs should deaverage their retail prices in order to forestall

competitive losses?
A. No, I'm saying just the opposite, I think. What I'm saying is that if the telephone companies were in a completely steady state financial position, in which if their revenues changed at all, they would have to come and raise prices someplace, then you would have an immediate concern with rate rebalancing and the effects of universal service. But that's far from the case.

All of the telephone companies today, the ILECs in the United States are doing very well financially. Their market values and the mergers and things that are going on are set well above their book costs. For those of us who aren't as familiar with the telecommunications industry, US West and the other ILECs, when they were spun off from AT&T --

MS. ANDERL: Your Honor, I'm going to object at this point. The response is far beyond the scope of the question.

THE WITNESS: No, I don't think so. I'm trying to explain --

JUDGE WALLIS: Mr. Montgomery, let's let Mr. Kopta argue this.

MR. KOPTA: Notwithstanding that Mr. Montgomery has some legal training, Ms. Anderl asked

Mr. Montgomery an open-ended question about what he meant in this footnote. I believe that he is responding to that open-ended question.

MS. ANDERL: I think I asked him a yes or no question, which is are you saying here that the ILECs should deaverage their retail prices in order to forestall competitive losses. I think he can say either yes or no and give a brief explanation, but I think we were well beyond the latter.

MR. KOPTA: I disagree, and have noticed that US West's witnesses are not as terribly concise when it comes to explaining their answers, and I would ask that Mr. Montgomery be allowed the liberty of explaining his answer, which I believe started off with, I believe my statement was exactly the opposite.

JUDGE WALLIS: Well, I think that's the kind of brief explanation that the question calls for, and I think that the witness did go beyond the penumbra of the scope of what the question called for, and will sustain the objection.

MS. ANDERL: Thank you.

Q. And rushing in where angels fear to tread, I'm going to ask another question about that footnote. What do you mean by retail pricing

flexibility?
A. The ability to use those price floors that we were talking about, as opposed to a broad-based comprehensive full-fledged deaveraging or rebalancing, shall we say, of the existing rates.
Q. Okay. So when you say retail pricing flexibility, are you suggesting there that ILECs ought to be permitted to selectively lower retail prices in order to respond to competition?
A. If the UNE prices have been set correctly and reflect legitimate cost factors. Under the current circumstances, there would be no opportunity for ILEC retail pricing flexibility because of the average prices that are in existence.
Q. In your -- moving on to a different topic, let me just ask you, Mr. Montgomery, do you have a general understanding of the systems -- the term systems when they're used to refer to US West's systems such as the pre-ordering, ordering, provisioning, repair and maintenance and billing systems?
A. Yes, I do. I've actually testified about the OSS cost recovery by US West, so I'm fairly familiar with what US West has.
Q. Do you have any formal education designing

and developing systems, as we've just used that word?
A. No.
Q. Have you ever designed or developed large systems such as those that we've just referenced?
A. No.
Q. Mr. Montgomery, in the hypothetical that you gave, where you selected two addresses and used MapQuest to determine a distance calculation, do you recall that?
A. Yes, I think there were three examples.
Q. Three, sorry. Three addresses, two examples. Well --
A. One address is Mr. Kopta's office, the virtual central office that I made it into.
Q. I think you called it a faux central office?
A. I think I did.
MR. KOPTA: We've been called worse.
Q. Because you did not use the actual address of an actual US West central office, isn't it correct that there would not be any way to determine an actual loop length between these two points?
A. Well, for the purposes of the example, I didn't use a US West central office address. I probably would have gotten an objection if I had.

It's probably proprietary.
Q. You would.
A. But the point is that the telephone industry could take a database like this and adapt it and load it with the addresses that the various participants in the industry wanted it loaded with, and then could query that. I mean, it is a systems question, but it's a system that you can get for free over the Internet today. I can't imagine that it would be that difficult to put it on a PC platform, you know, in US West's headquarters in someplace and run the database. It's a very simple, straightforward thing, and it doesn't have to be done every month, like Mr. Spinks said. He's incorrect about that.
Q. Mr. Montgomery, I think you misunderstand my question, and perhaps it's because you were not in the room a couple of days ago, but there was a question about whether or not US West had undertaken to or been able to verify whether these MapQuest results, how they matched up to an actual loop length. And I'm simply trying to confirm with you whether or not US West has any sort of an actual loop length emanating from 701 Fifth Avenue to any other address, given that 701 Fifth Avenue is Mr. Kopta's

office and not a US West central office?
A. You're reading way too much into this example. I was trying to show -- let's go through the logic of this.
JUDGE WALLIS: Mr. Montgomery, I'm not sure that that's responsive to the question.
MS. ANDERL: Thank you, Your Honor. I was just about to say the same thing.
THE WITNESS: Well, I was not proposing these exhibits as the system to be implemented by US West and the CLECs. I was proposing it to show that there are already off-the-shelf systems that are free that can be used and can be adopted. And the logical inference that I've drawn here -- maybe I didn't say it in the testimony -- is if there's a database that I can use for free, there probably is a database that I can develop for a small cost that will be totally accurate.
JUDGE WALLIS: Mr. Montgomery, I think you're starting to repeat things that you've said before, and again, I don't think that was responsive to the question that was asked of you.
Q. Let me just kind of back up. Is it correct, Mr. Montgomery, that all of US West's loops emanate from a central office?

A. Of course it's correct, yes.
Q. And the 701 Fifth Avenue address that you selected as a faux central office is not an actual address for US West central office, is it?
A. No, but US West central offices do have street addresses.
Q. Correct.
A. Thank you.
MS. ANDERL: And I think that's all I really wanted. Way more than I wanted. I got way more than I wanted. It was at my peril, I guess. That was all I had for this witness.
JUDGE WALLIS: Mr. Kennedy.
MR. KENNEDY: Nothing, thank you.
JUDGE WALLIS: Commission Staff.
MS. RENDAHL: Nothing.
JUDGE WALLIS: Dr. Gabel.

E X A M I N A T I O N

BY DR. GABEL:
Q. I have two areas of questions for you. Mr. Montgomery, first --
A. Hopefully not about MapQuest.
Q. Actually, it's along those lines.
A. Oh, dear.
Q. First, are you aware of situations in which

US West and CLECs agree on approach to estimating line distances?
A. I'm not -- I think your question's too general for me to answer.
Q. Are you aware of a website called DSL Reports? Have you ever --
A. Oh, I see what you're saying. I'm aware of that whole process. And I'm not sure what US West does, but I know what some other phone companies do.
Q. Could you explain that, please?
A. Well, DSL is distance-constrained, to some extent, at least at this point in time. So there are devices in place where one can say, if I'm at XYZ address in this town, could I go to the phone company, or to a DLEC, a data CLEC, and get a DSL service. And what it tells you is basically whether you're within the 12-kilofoot range that it requires or not. And that's a pretty simple thing.
In fact, I was in -- I was in a Comp USA store not long ago, and Pacific Bell in California actually had a thing set up, a terminal set up at Comp USA where you could put in your street address and they would tell you whether you qualified for DSL or not.
Q. Thank you. The other area I'd like to ask

you about is some testimony that GTE witness Dye filed. Did you read his responsive direct testimony?
A. Yes, I did.
Q. All right. This is Exhibit 143. At page 14 and 15, he has a passage -- I'll just ask you perhaps to read into the record the paragraph that begins at the bottom of the page, and then just ask you to comment on his concern?
A. Should I read the whole paragraph or just maybe the first sentence?
Q. The paragraph.
A. Okay. It says, If the density characteristics are relatively homogeneous within a wire center's serving territory, then pricing based on loop length just results in another mechanism to facilitate rate arbitrage. What sense does it make for a CLEC to build its switch on the other side of town, self-provision its short loops, and pay short loop prices to the ILEC for loops that would be long loops to the CLEC. If density characteristics are relatively homogeneous, then what is of real concern is the setting of competitively-efficient and neutral rates -- in the setting of competitively-efficient and neutral rates is the average cost in that homogeneous area. The arbitrary placement of the

wire center should not make one customer more coveted than another identical customer in that homogeneous area.

Q. I'm interested in hearing your response, Mr. Montgomery, is just what kind of investment incentives are created by having a loop rate that is distance-sensitive? Is this actually going to discourage investment, is it going to encourage perhaps inefficient investments?

A. Well, I'm not sure. First of all, I don't believe that you'd call the placement of wire centers today and telephone networks arbitrary. That's the whole point of having a scorched node network. Presumably, the wire centers have been placed in a rational way, so that they're in a good relationship to the population that they're serving, placed by the ILECs. But the idea that there are incentives or disincentives, depending on how something is priced, is really incorrect. What you're really trying to do is to improve efficient competition. If there's a customer who can be served with less expense because that customer is closer to the wire center and deaveraging incents you or incents the CLEC to try to serve that customer, that's efficient. If there's a customer that's a long way off from the wire center

and deaveraging makes it more expensive for the CLEC to serve that customer and the CLEC decides not to, that's also efficient. And that tells you something -- that tells you more about the cost characteristics of the market than the average numbers do.

So deaveraging may affect incentives, may create these so-called disincentives out here in the distance band, but if it's an efficient response to the pricing, then it should be permitted.

Q. If I understood your response, Mr. Montgomery, you said it's efficient for the CLEC to target the customer who's close to the wire center. Now, would you agree that the customer far away from the wire center's still going to receive service?

A. Yes.

Q. All right. So how is there an improvement in society's efficiency if we still have the same customers being served; it's just now we provided an incentive for the CLEC just to target a limited part of the market, but we still expect the entire market to be served?

A. I think Mr. Knowles' answer to that was actually the best one I've heard ever, and that is it doesn't happen. It's not a cutoff kind of thing. If you give Nextlink or another CLEC the economic

rationale to incur all the fixed costs that they incur, like collocation, by saying you'll save a little money on the unbundled loop element, but it will still be cost-based, then they're in there, they've committed this capacity, they have the sum cost in the form of collocation equipment, and suddenly, the rational economic thing for them to do is to say we'll start serving people further and further out, more expensive, more costly loop UNEs, because we can affect discount with sum costs for the collocation equipment and all the other things we did to get to the central office in the first place.

So all of a sudden, this kind of pricing -- and this is a very interesting observation on Mr. Knowles' part. He's gone. That's good. I don't want it to go to his head -- is you can make it more economically attractive to serve a customer that nominally is less economically attractive to serve by deaveraging their rates by giving you a reason to put the stuff in the central office, giving you a revenue stream to cover the collocation cost, and then giving you the incentive to go out and market to more people further out from the central office. I think that's a very valid observation, and I found it very interesting when I heard it. But I didn't think of

it, unfortunately.
DR. GABEL: Thank you.
JUDGE WALLIS: Other questions from the bench?

E X A M I N A T I O N

BY CHAIRWOMAN SHOWALTER:

Q. You mentioned you have degrees from Butler and Duke. What degrees do you have and when did you get them?

A. Bachelor of economics degree and a law degree from Duke University. I received one in 1974 and one in 1971, in that order. And I've been, basically, since mid 1974 till today, I've been involved in telecommunications policy and regulatory issues. I didn't attach a statement of qualifications to this testimony because, as I said, this is the eighth and ninth testimonies that I've provided in this particular docket, and I just didn't think I needed to.

Q. If you look at Exhibit 304, am I right that your latest or last recommendation is the bottom half of the page?

A. Yes, although as you've heard this week, there are a number of things that would have to be -- these actual numbers are affected by a number of

things that have developed since I filed this testimony on February 7th. So the numbers are no longer, I would say, sufficiently accurate to be used.

Q. But this is zones of exchanges; is that correct?

A. Yes.

Q. And I thought I heard you say that, after listening to the testimony here, that you thought that zones based on wire centers might be preferable?

A. I think I'm persuaded of that, having read the testimony of the other parties, the three rounds, and listened today and yesterday, that the advantages of an exchange-based formulation are not nearly as great as I might have thought at one point.

Q. And so if you imagine a new pair of boxes that looked like this, but were wire centers, rather than exchanges, would your proposed rows be the same? That is, the distance of zero to 3,000, 3,000 to 6,000, et cetera?

A. Yes, I think you've heard this week that 12,000 kilofeet is a significant point from a cost standpoint. What I was trying to do is break down everything below 12,000 feet that is presumably relatively uniform. What would change more -- the

numbers would obviously change.
Q. Right. I'm just talking conceptually, since we don't have it in front of us.
A. Yeah, and what would change, also, is on the second page of the exhibit, the names of -- I guess there would be about 15 -- potentially 15 exchange names for GTE, and seven or eight for US West that would flip back and forth between these columns, and you might have to designate the names differently. It would be --
Q. Well, wouldn't we have a list of wire centers, not exchanges, in this new imaginary model?
A. You'd say Everett East, or Everett Main versus Everett North. I would -- because CLLI codes are hard for people to understand, I'd still probably write the exhibit in plain English.
Q. Well, if you imagined that pair of boxes is based on wire centers and not exchanges, and now compare it to Exhibit 4, page 16, which is Mr. Denney's table. Are you familiar with that table?
A. Yes, I am.
Q. And are you familiar with Column Three of that table?
A. I am.
Q. What do you see as the advantages -- or

would you compare the advantages or disadvantages of Mr. Denney's Column Three to this virtual pair that we're imagining, which is wire centers grouped by distance?

A. Well, I'd have to say that Mr. Denney's Column Three, or a variation thereon with some zone would be easier to implement and administer. I don't think that the implementation and administration costs are as complicated as were depicted by the ILECs, but there is some effect there, there's no question, for the distance component.

Q. So Mr. Denney's would be somewhat easier and, I presume, somewhat easier to administer, maybe more timely or less costly to administer in the short run?

A. In the short run, it would be less costly to administer. Although the question is whether the administration costs outweigh the distance-based formulation, outweigh the benefits of actually reflecting distance in the rate structure.

Q. Okay. That's where I was going next. Let's suppose we've gotten over the administrative costs or they're minimal and implemented. Now would you compare our imaginary wire center pair based on the zone, distance zones, versus Mr. Denney's Column

Three? What are the advantages that you find?
A. I guess the principal advantage of this arrangement, this type of arrangement --
Q. This meaning your --
A. The two, the columns you're talking about on Exhibit 304.
Q. Well, as modified by wire center, instead of exchange?
A. Exactly. Or Mr. Spinks' exhibit -- revised exhibit whatever, I forget the number. Also maybe changed for wire centers. I believe I did hear Tom say it would be fairly easy to make that conversion, as it would be for any of these.
The only thing -- the thing you'd lose most by going to Spinks, by wire center, or this by wire center, or going with Mr. Denney's proposal, is the fact that distance does have a significant effect on cost. All the loop models show that, all the discussion about loop models over the last three or four years has really been premised on distance, as I said, and it just seems like distance should become one of those things that is reflected in the pricing, because, bottom line, I don't believe there's any disagreement that distance is an extremely important factor.

You know, Mr. Tucek actually developed his rates by going into the model and pulling out the distance-based cost and matching it to the distances in the wire centers in Washington. So to get to Mr. Tucek's final set of numbers, he had to use distance-based cost to get there. So bottom line is distance is an important cost factor, and that's what you lose if you don't reflect distance in the rate structure.

Q. Okay. Then could you look at Exhibit 305. These are your examples of the MapQuest searches. Let's see. I think it's on the third page in. It's got an ad, Bigger than Godzilla.

A. One of those things about reprinting web pages.

Q. At the top, then, and at the bottom. Could you look at the bottom of that page, and do you see where it says, Copyright 1997, 2000 Snap?

A. Mm-hmm.

Q. It says, Terms of use and copyright info -- copyright, Infospace.com, use subject to license?

A. Yes.

Q. Did you by any chance happen to go to Infospace.com to look at the terms of the license?

A. It's a standard license that would not

permit them to be used. I did just glance at it. It wouldn't permit it to be used without a license to the Washington CLEC community. But, again, we are reading too much into this example, I'm afraid, but that is absolutely correct. It would have to be licensed by whomever provided the database.

CHAIRWOMAN SHOWALTER: I don't have any further questions.

COMMISSIONER HEMSTAD: I don't have any questions.

E X A M I N A T I O N

BY COMMISSIONER GILLIS:

Q. One issue, a question that I had in my mind since we've been talking about MapQuest and these different databases, the way it defined distances, it hasn't been clear to me. It seems like any database, whether it be MapQuest or whatever, would need to have a geocode address basis, wouldn't it?

A. Probably does. That's probably how MapQuest works, I would guess.

Q. Well, I mean, I can't think of how we could define a distance between two points unless you had two geocodes.

A. Yes.

Q. At the same time, we just came off public

debates on cost models and the discussions of the arguments over who's got the best brand of alternatives to geocodes and talking about how geocodes don't really exist in any comprehensive fashion, particularly when you get outside the major urban areas, but, yet, in this discussion we're talking about existence of databases that can define distances. How do you reconcile that?

A. Well, I think there are two things to say about that. One is I'm not sure that all the discussion about weaknesses in states with geocoding really is that meaningful in therms of the cost models.

Q. But lack of existence of a database with geocodes is what has driven people to talk about these alternatives.

A. I understand, but I'm not sure that the geocoding limitations are anywhere but really hinterland areas. What we're talking about here is in terms of pricing types of things. So if I went to look up two geocoded addresses through this system or some other one, where it came back we don't know where these are, that would not be fatal to this proposal, because you would just have to default to the average price somehow. I'm not sure how often

that condition arises, and I think the application is a little bit different between trying to locate things in a model so that you can build out loop plant to it and simply locating the distances between two addresses.

The geocoding application we're talking about here is much less detailed. It's much less significant than it would be in the cost model prices.

Q. But I assume you'd want your proposal to operate uniformly throughout all of US West and GTE's area, including the hinterlands, I'd assume?

A. It should be eventually able to operate uniformly. And again, what I really tried to tee up here was the notion that this idea shouldn't just be dismissed because someone would say, well, it's too difficult to do today. That's why I said there should be a process in the industry, Mr. Spinks said a workshop, to get to that point, rather than just use the argument that it's just too difficult to deal with.

And the reason you don't want to just rest on that argument, it seems to me, is because distance is an important cost factor in loops, and loops are the most important cost factor in competition, so --

by far, the most important cost factor. So I'm not saying this is the way to implement it with MapQuest or whatever, but it's the kind of thing that I think should be addressed with the view toward eventually having that type of pricing for UNEs.

Q. I was also interested in your conversation with Dr. Gabel on efficient competition, and I have to say, whenever anybody rests their argument on efficient competition, the first question I have is, well, what happens to those that used to benefit from inefficient competition, and are there enough gains in the system to justify it.

And I ask this question just purely as a pragmatic question. You and Staff have both argued for distance-based rates, and kind of a broad question that I think we have to think about is is it worth it today versus maybe down the road or whatever, and a part of the -- I guess a part of the analysis, I would think, is given distance-based rates potentially translate into distance-based retail rates, which may or may not be true, and there's that potential, then there are a small group of customers that are on the end of the long loops that do, in fact, end up paying substantially more than a system where it might be more average for

them.
A. That's right.
Q. And you would hope out of that there would be a substantial drive to provide more competitive options. And I understand Mr. Knowles, and you repeated that argument, but I want to ask you, I guess, a very basic question of, sitting here right now, do you think the distance-based rates really would make that much difference in driving additional competition over what we would have with an averaged-based rate system?
A. I'm not sure, in the short run, how to answer that question. I think, in the long run -- and this is also probably an issue with respect to how you look at universal service. The more you can have a number that reflects cost, whether that's a price that someone's paying in the hinterland for their telephone service or not, that's one possible way that number could be used, but that's probably not the politically feasible one or desirable one socially. That same number could be used to indicate a draw from the universal service fund, obviously, and without changing retail prices necessarily.
Then you get a situation, and I said this in my testimony, as I think you'll see coming up

pretty soon, where wireless, fixed wireless providers and other providers of service over the -- that don't have to go out and build loops through all that rocky terrain for miles and miles, they're going to start to find it attractive to serve customers.

The FCC's going to auction channels 60 to 66 of the UHF TV channels next year, and that is just beautiful for using, among other big other applications, to provide fixed wireless loop service to large parts of the country. So what you've done by deaveraging is to say -- and in fact, a company now, Western Wireless in -- I think it's North Dakota, has actually applied to become a universal service provider.

If you say, You have -- we will give you half the difference between the retail price and what it actually cost, retail price is $20. It actually costs 100 from these models. We'll give you $40 extra in addition to the $20 in revenue that you can get a wireless company to serve a hinterland area in eastern Washington. At $60, which is the example I just came up with, I think a lot of those fixed wireless services are going to prove in economically within the next very few years, particularly if the FCC allows that most desirable spectrum to be used

that way.
So I've given long answers, and I apologize. But the short answer is I think you need to have some deaveraging there to eventually get competition into those places that aren't going to have it otherwise.
Q. But what I'm -- and that's helpful, but what I'm trying to get at, in answer from you, is probably more of a timing issue as much as anything. What you appear to propose is the desired end gain from your perspective, but at the same time we're dealing with a reality now of the amount of investment dollars that are out there, where it's going to go, and last week I was listening to a bunch of people, companies making presentation to Wall Street people about their big plans for the future, but I don't know, they haven't done it yet. And whether or not they do it, it remains to be seen.
And should we be -- is it inappropriate for us to be more incremental in our approaches now and look at maybe a more modest reform, particularly given we don't have a state universal service fund, with thoughts of refining and reforming as competition actually takes hold, or is the proposal that you make with regard to the wholesale pricing

structure that important of an economic incentive to get right that it's actually going to make the future competitive options in rural areas a reality faster?

A. I think it's important to -- that it will do that, what you said at the end about competitive options. My question to you would be what time horizon. We're sitting here, it's four years after the Telecommunications Act of '96 was passed, and we're probably still a good couple of years away from the point where CLECs, even in metropolitan areas, can just go across the street and get some customer and sign them up. I mean, it's still a case-by-case kind of a basis thing, where they have to do the economics very carefully.

That's four years out, maybe six years before you see ready competition of the type where you can just pick up the phone in downtown Seattle and say, I want to switch my phone companies, like you switch long distance companies. And that's in downtown Seattle. So the time horizons for these things are a lot longer than people think.

The Telecommunications Act told the FCC they had to develop all the implementation rules in six months. And if you recall the press and all the publicity at the time the act was passed, it was

competition was going to be here, like, next year for everybody, and that was silly at the time, people were saying that, and it was silly to give the FCC only six months to react to this. But in fact, this is going to take six, seven years just for many areas, metropolitan areas.

Your time horizon further outside the metropolitan areas is probably 10 -- you know, to get the stuff under the current system, the current regulatory system, you could take another five or six years to do all the things you're talking about. In the meantime, the economics are going to change much faster than that if wireless service comes in.

So there's going to be a gap, if you don't consider the time horizon where you're still implementing the universal service fund -- and I agree that the fact you don't have the authority right now is a big impediment -- but there will be a gap where you're still working on the regulatory issues five or six years out and the economics will have kicked in, but there won't be -- that system won't be in place to do that.

So you're actually, if you don't put at least the process in place to begin distance deaveraging now, you're really delaying it for four

or five years. And in that time, the economics, I think, are going to change enough that you'll be missing an opportunity. I'm not saying you have to go all the way with it today, particularly given the legislative situation, which is something you think about, that the time horizon is actually, for regulation, is much longer than the market horizon.

Q. And that's helpful, too. Would you agree that there's maybe kind of a corollary to kind of a --

THE REPORTER: I'm sorry, I couldn't hear you.

COMMISSIONER GILLIS: Forget it.

Q. Do you think that there's some value in thinking about the most simple policy possible to achieve the objective, and I say that, again, as a pragmatist, as the more complications we put into any set of policies, the more there are for both lawyers and economists to argue about and the more chance for delay. And is it a reasonable principle to think about what is the minimum we need to do to move down the road, as opposed to about the most complex proposal that offers the best theoretical framework?

A. Well, yeah, I wouldn't say that I'm advocating this proposal as the best theoretical

framework, but the fact is you're already, in my opinion, intractably in the web of the lawyers and consultants and economists, and I don't see you getting out of that any time soon. So the regulatory time horizon's not going to shorten in the next.

If anything, I'm being as critical of myself or the other people on this side of bench as anything, because it has gotten to be an extremely complicated process since just before the act was passed. With competition, it's gotten extremely complicated, and you may have to be ready to take on a little bit more complicated policy solution just so that by the time you figure out how to do that, it's ready to match the market.

COMMISSIONER GILLIS: Thank you.

E X A M I N A T I O N

BY CHAIRWOMAN SHOWALTER:

Q. Well, I'm going to lay out three options, and then I want to ask you about two of them. So option one, we order distance-based zones now, but because we haven't got the mechanism in place to do it precisely, we couldn't implement it right now, so we would have to delay implementation. I think somebody suggested next January, but that sounds kind of soon. That's option one.

Option two is we order interim or short-term zones that are wire center-based, but we initiate a process to get to distance-based zones, so that would take some time. I don't know how long before that would be in place.

Option three is we simply order distance -- excuse me, order wire center zones for now, and at some later time, when it looks like maybe we need it or maybe there's more competition or we've got the time to look into it, we get around to the distance-based model, should it seem compelling.

I'd like to ask you about -- to compare the second option with the third, which I think might have been Commissioner Gillis' question, as well. But what would we lose in your view, or not lose, by going to option three versus option two, in some real world sense? I'm assuming -- all these options would assume, as a given, for the sake of this question, that distance-based zones are desirable, so that, at some point, we want to get there.

A. Mm-hmm.

Q. But what would you say about the advantages or disadvantages of option two versus option three?

A. The advantages, the advantage of option two doesn't have to do with telecommunications networks

or -- but it is clearly the more advantageous approach, because it has to do with how regulators or government regulate. What we've seen is that if you say we'll just put this off for some time, then it's in everyone's interest to sort of ignore it, because everybody's busy for the time being. But it's also in the specific interest of those who like the status quo to make sure that it's put off longer and longer and longer.

Q. You're talking about option three right now?

A. Yeah, that would be option three. From a regulatory standpoint, it's better to set forth criteria, even if they can't be implemented today, say this is our policy today, we plan to implement this within the next period of time, and you might do that in terms of when the universal service fund is done or something, one year after that, and then tell people, when we get ready to implement this, you had better have worked out, through workshops and things, and we'll tell the Staff to do this, work these issues out ahead of time so that when we get around to considering it, we won't have all this buzz about whether there are implementation problems or not.

In fact, one of the things you could say to

the incumbent is you're always going in and changing your databases to do all sorts of things, new things. Keep this in mind that this is going to be something that's going to be a requirement, and when you can cost-justify it, you should be thinking about doing that. And the advantage of that is you get people off the dime, so to speak.

The example that I would -- in current regulatory experience, and I haven't had anything to do with these cases, so I could just use this as a high-level example. Ameritech came in in Michigan for long distance authority two years ago, and they had really worked on it and they really thought they had done everything that they needed to do to get long distance authority under 271.

And the FCC said, We're going to be so specific about things in the order -- and in the subsequent orders with respect to Louisiana, they're extremely detailed. Some of it wasn't even probably a good idea, but what that did was motivate everybody to go out and solve the problems they had seen. The New York Commission said, Well, we're not going to -- we don't understand these OSS issues as well as we should. We're going to go out and get Deloitte and Touche, or KMPG, I guess, to do an extensive series

of tests on the OSS systems. Now all the states are doing that.

In other words, the regulator goes out and says, We're going to do this and get the ball rolling, and you're either on the train -- I'm mixing metaphors here. You're either on the train or off the train, but I think that's a much more proactive way of getting things done, even if, in the case of the FCC, they may have specified some requirements originally that were too difficult to deal with or, in the case of the New York Public Service Commission, they couldn't really audit themselves, every last OSS transaction between Bell Atlantic and the CLECs, nevertheless, they said we're going to push it forward. That's sort of the same kind of thing I'm talking about here.

CHAIRWOMAN SHOWALTER: Thanks.

THE WITNESS: Thank you.

JUDGE WALLIS: Anything further?

MS. McCLELLAN: I do have some follow-up cross.

JUDGE WALLIS: Ms. McClellan.

C R O S S - E X A M I N A T I O N

BY MS. McCLELLAN:

Q. In response to a question from Ms. Anderl,

you stated that you made some modifications to Mr. Spinks' data in preparing your final recommendation; is that correct?
A. Yes.
Q. Okay. Did you change the values for the following wire centers: Fairfield, Loomis, Malden and Thorton?
A. That was not one of the modifications I made.
Q. Did you make any modifications to Stevens Pass?
A. No.
MS. McCLELLAN: Okay. I have no further questions.
MS. ANDERL: No, Your Honor.
JUDGE WALLIS: Mr. Kopta.
MR. KOPTA: Thank you, Your Honor. I guess I've gone from being the Godfather to Spiderman, but I will ask a few questions to follow up.

R E D I R E C T E X A M I N A T I O N

BY MR. KOPTA:
Q. In your initial discussion with Ms. McClellan, she was discussing whether feeder may or may not follow driving distance, and her response was that that was irrelevant. Would you explain why that

is not relevant?
A. Well, let me think about that. I guess I was thinking in the broad sense that, given that all the cost numbers that we're talking about here are estimates from various models that have been blended together, to parse it out and say, well, this particular data point, unless it's really off the wall, like the one that Mr. Spinks talked about, to parse it out the way it's been done here the last couple of days is, to me, just not productive, because the underlying numbers are just -- there's a range of uncertainty around those, and the fact that a feeder, a particular feeder line does or does not follow a road just isn't relevant.

There's so much material that has been put in here, and it's been true in all the other cases about loop cost, is just buzz to confuse -- in my opinion, to confuse the issue. I mean, the numbers do count, the models do count, but at some point you just have to stop parsing out every possible thing that could be changed in this model or that model and move on.

Q. You also had a discussion with Ms. Anderl about Exhibit 401, which was the Staff response to a bench request, in which there was a discussion about

wire center designation based on information that was contained in HAI 5.0a. Do you recall that discussion?

A. Yes.

Q. As you also discussed in response to Commission questions changing the recommendation that you have in your testimony to focus on wire centers, as opposed to exchanges. If those adjustments were made in your proposal, would that eliminate any reliance on information allegedly derived from HAI 5.0a?

A. I'm not sure I could give you a complete answer to that, because what the fourth paragraph of this data request says is that the wire center area data for US West was obtained from the HAI 5.0a version of the model. Again, I don't see how that has any real substantive effect. Either the wire center area data that are being used by Staff are accurate or they're not. If they're obtained from 5.0, instead of 3.1, but the 5.0, on that particular data element, is more accurate, I don't see what the issue is, because it's just one set of numbers, the area, square miles of the wire centers that US West has. And that should be an objective fact.

And if, in fact, there was an error in a

previous version and it's been corrected, I think it should be -- accuracy should be encouraged, so I don't see how this would affect what I was trying to do at all.

Q. And you could use your methodology if, for example, you used the values that Mr. Denney put together in his list of wire centers to develop the same kind of proposal using your methodology, could you not?

A. Well, it's really Mr. Spinks' methodology. I can't take credit for it. But I believe it could be developed, the distance factors can be developed from Mr. Denney's data set, if you wanted to do that, in addition to having a number of wire center zones.

Q. You've also had a discussion with Ms. Anderl about UNE prices being the price for US West's retail rates. Do you recall that discussion?

A. I do.

Q. Does that necessarily mean that retail prices would need to reflect the geographic deaveraging and wholesale rates that the Commission might order in this particular proceeding?

A. Well, what I contemplate is on the downside, they would. What I'm saying is that the incumbents would have the ability to lower rates to

meet competition, to the extent the rates have been deaveraged and the deaveraged rates are lower. And I suspect that they'll want, for various reasons, to deaverage on a more customer-specific basis simply because there's much -- there's less of a revenue penalty to the incumbent to doing it that way, as opposed to doing it across the board.

Q. And is that pricing flexibility you're discussing an aspect of an effectively-competitive market, or is it something that US West or GTE should be allowed to do while they still have monopoly power in a particular location?

A. Well, it's part of an effectively competitive market, but clearly you're getting to a point where, when you deaverage the wholesale rates, that's going to have to be reflected in the retail side in some form. My point is that the ILECs can do that and choose to lower their revenues in specific cases as long as there's a price floor, so that it's not anti-competitive. And that is something that they should expect to be doing in a competitive market. When people face increased competition, one of the things they have to do is lower prices.

Q. And there are also non-economic factors, such as service quality on the wholesale side, that

should factor in to whether or not the incumbent should be allowed pricing flexibility?
MS. ANDERL: Your Honor, I object. This is beyond the scope.
MR. KOPTA: I don't believe so.
MS. ANDERL: I know I --
MR. KOPTA: Ms. Anderl was discussing pricing flexibility, and I'm clarifying Mr. Montgomery's responses to when pricing flexibility would be appropriate.
JUDGE WALLIS: The witness may respond.
THE WITNESS: To tell you the truth, Mr. Kopta, I don't think I've thought through all the factors, but there might be other factors to consider besides the fact that the wholesale rates have been deaveraged. But the fact that the wholesale rates have been deaveraged is going to be an important factor.
Q. And you were also discussing with Dr. Gabel economic efficiencies and that it was more efficient, at least from an economic perspective, not to target customers a farther distance from the wire center. Do you recall that discussion?
A. Yes, I think I was trying to get into -- that was a prelude to the discussion of -- that's a

static representation. What Mr. Knowles told us today was a dynamic view that says, on day one, there's a certain condition, and you know, six months from now it's different, because I can suddenly afford to go out and compete. When I said that it was a prelude to that discussion.

Q. So as a prelude, and taking into consideration Mr. Knowles' testimony and your expansion of that, would it be more efficient, from an economic standpoint, if loops reflect their underlying cost in terms of longer loops, as well as shorter loops in geographic areas?

A. On the wholesale side, yes.

Q. And in fact, if a loop, for example, were $50, that is a long distance from the central office, and a CLEC could use some of the fixed wireless technology that you have discussed at $35 and the averaged rate was $28, would the CLEC receive the proper signals if the loop price for that area were $28 or $50?

A. Well, that hypothetical requires the existence of a universal service mechanism, as I said before. You'd have to have some draw to make up the difference between 28 and 35. It would probably be something on the order of a difference between $28,

and you would get a number that comes out odd, but that would be -- it would be at $11. So it would be the difference between 28 and $39. So I'm saying you split the difference between the actual cost and the current retail rate. You'd be saying to the provider who could do it for $35, We'll give you $39. We'll cap your revenues at $39. You get 28 from your customer, the customer's no worse off than they were, and we give you 11 out of the fund. And theoretically, at least, the wireless provider says, Okay, I'll go do it for that. I could make money at that level. And that's how that's supposed to work.

Q. And I guess I was discussing about the wholesale rates. The difference between a wholesale rate at $28 and $50 for an unbundled loop in a particular geographic area and the CLEC's ability to self-provision the loop using an alternative technology for $35. Which price, in your view, sends the appropriate economic signals to the CLEC in making that build or buy decision?

A. The number that sends the correct economic signal is actually $50, technically speaking. And you say to the provider that can do it for 35, we'll be willing to pay you an extra 15, you know, technically, because you're a more efficient provider

if you do it at 35. In practice, I don't think that capping it at a hundred percent of the difference is likely to be the way it works.

MR. KOPTA: Thank you. That's all I have.

JUDGE WALLIS: Anything further? It appears that there's not. Mr. Montgomery, thank you for appearing. You're excused from the stand.

THE WITNESS: Thank you.

JUDGE WALLIS: Is there any more evidence to come before the Commission in this matter? It appears that there is not.

A couple of administrative matters. The parties have submitted a proposed outline. Just at first glance, I believe the Commission would like a little bit more specificity in the outline, and I'm going to suggest that we take a look at it and provide it to the parties before the conference on Friday for further comments.

The technical conference that we've discussed will take place Friday, following the prehearing conference. I think we've touched on all of the pending rulings. Is there anything else of an administrative nature that we need to address?

MS. ANDERL: Your Honor, I would just like to confirm, so that the record is clear, that I did

not offer and did not intend to offer the cross exhibits that I had marked for Mr. Spinks.

JUDGE WALLIS: Thank you.

MS. RENDAHL: Your Honor, I had a question. Since I was not here the first two days of hearing and I understand that GTE has made plans to make a formal motion to strike, if there's any -- just for scheduling purposes, how the bench plans to address that, or if you will know by Friday, so that we can --

JUDGE WALLIS: I think it's premature for us to do anything in advance of receiving something from GTE and seeing what they want and then assessing what the Commission would need in terms of responses. So I'm not, by any means, encouraging GTE to submit such a motion. The Commission has clearly ruled upon the US West/GTE motion to strike by saying that the Commission will not consider the HAI Model for comparative for pricing purposes. And beyond that, if more is necessary, then GTE may, if it wishes, submit a proposal, and then we will take a look at it and we will see.

I would say that in order to meet our schedule, we would need to have that motion in very short order, or that proposal in very short order so

that we can allow parties the opportunity to comment and to make a ruling upon it.

The briefing schedule we had talked about and I believe, subject to confirmation again on Friday, that briefs on March 27th would be acceptable.

MS. ANDERL: Thank you.

JUDGE WALLIS: So is there anything further before we conclude today?

MR. EDWARDS: May I revisit the -- I apologize. I had something else I needed to take care of. On the matrix that we distributed on the portions of the testimony that ought to be struck, what I had intended to do is, given the fact that the order's already been entered striking the portions of the testimony and saying if the parties couldn't reach agreement, the Commission is perfectly capable of taking care of it themselves, and disregarding those portions of the testimony that are tainted, and one of the things, obviously, we tried to do is to point out to the Commissioners what we think is tainted. I had intended to merely attach that matrix to the brief.

MS. RENDAHL: So your intent is just to address it on brief, primarily?

MR. EDWARDS: Yeah, I don't know that I -- well, we will probably address portions of it in the brief and try to clarify what we think is out, yeah.
MS. RENDAHL: That's acceptable to Staff, I mean, to address the matter in brief.
MR. EDWARDS: I think the records, at least with the parts that are important, the record is pretty clear where it is and where it isn't.
MS. RENDAHL: I think the record is clear what US West and GTE think is inappropriate, so --
JUDGE WALLIS: All right. I do think -- it's difficult in this situation, because it's been apparent through the examination of the witnesses that the reference to the HAI 5 Model does almost permeate the presentations.
However, I think it's also clear from the record that the Commission's intention was clear that the relationship between other testimony and the HAI 5 Model are clear and that the Commission will be able to disregard the references in that sense, and I think I heard Staff to say that there was no objection to GTE presenting a list of the references that you believe to be affected; is that correct?
MS. RENDAHL: Right, I have no objection to GTE presenting a list of what it finds objective and

addressing that in brief. Now that I'm forewarned, I can respond accordingly.
MR. EDWARDS: I'm okay doing it that way, if everybody's in agreement with doing it that way. Alternatively, we'll file a motion.
MS. RENDAHL: That's just more work.
MR. EDWARDS: It is.
MS. RENDAHL: Who needs more work right now?
MR. EDWARDS: Exactly, I agree. I'm going on vacation.
JUDGE WALLIS: That's true all the way around.
MR. EDWARDS: Handle it that way. But it is not an unavoided issue, and that is why I spent as much time on it as I have.
JUDGE WALLIS: Yes, we appreciate that. And it has been the Commission's intention from the very beginning of this phase to impose that limitation. And the Commission, therefore, shares your concern and has set this process up with the idea that there would be no impermissible reference. You know, as a practical matter, as we said, it kind of permeates the presentations, and by just striking everything that's --

MR. EDWARDS: I agree.
JUDGE WALLIS: -- related, it may leave some holes where what's left just doesn't make any sense.
MR. EDWARDS: I understand, I understand.
JUDGE WALLIS: So in the sense, and I feel I'm perseverating, in the sense that the Commission has always intended to and has re-affirmed its intention not to rely on the results of the HAI Model, I think that's clear. I think it's clear from the record which elements relate to the results of that model, and I don't think we're going to have a problem.
MR. EDWARDS: All right. Fair enough. I just have one last thing, though. Sort of along the lines of Mr. Montgomery, when he talks about we're four years away from the Telecom Act, one of the good things about the Telecom Act, it's given me the opportunity to appear in front of lot of commissions around this country. This is my first opportunity to appear here, and I thank you for your hospitality.
JUDGE WALLIS: Thank you. It's been very pleasant to have you and your colleague with us, and we'll see more of you.
MS. RENDAHL: Thank you.

JUDGE WALLIS: With that, we're adjourned.
(Proceedings adjourned at 4:33 p.m.)