Data Request No. 1-4

Provide in electronic format, the number and percentage of residential and business locations that were successfully geocoded to the point level for each Census Bloc Group in Verizon's Washington service area.

RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of Taylor-Nelson-Sofres Telecom (TNS) and are commercially available to Verizon from TNS. In addition, AT&T and MCI object that/providing this information would require a special study and that the request is, therefore, overly burdensome.

SUPPLEMENTAL RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of Taylor-Nelson-Sofres Telecom (TNS) and are commercially available to Verizon from TNS. In addition, AT&T and MCI object that providing this information would require a special study and that the request is, therefore, overly burdensome.

Notwithstanding this objection, please see the Supplemental Response to Data Request 1-2.

Data Request 1-5

List all locations that have been:

- a) Successfully geocoded to one zip code within the wire center boundary
- b) Successfully geocoded to one zip code outside the wire center boundary
- c) Successfully geocoded to multiple zip codes within the wire center boundary
- d) Successfully geocoded to multiple zip codes outside the wire center boundary
- e) Not successfully geocoded.

RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS. In addition, AT&T and MCI object that providing this information would require a special study and that the request is, therefore, overly burdensome.

SUPPLEMENTAL RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS. In addition, AT&T and MCI object that providing this information would require a special study and that the request is, therefore, overly burdensome.

Notwithstanding these objections, as to Data Request 1-5(e), see Supplemental Response to Data Request 1-2.

Data Request 1-9

Provide, in electronic format, the geocoded data set for Verizon's Washington service area used to produce the clusters in HM 5.3.

RESPONSE:

Data Request 1-10

Provide all the software, input files and other documents used to cluster customer locations or related to the clustering of customer locations (including, without limitation, any files that are immediate outputs of, and immediate inputs to, the clustering algorithm). Describe in detail and provide all documents related to the method by which AT&T, MCI and/or HAI Consulting, Inc. verified the accuracy of the results of the clustering process.

RESPONSE:

AT&T and MCI object to this data request to the extent that it requests information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

Extensive efforts were undertaken to validate the accuracy of the clustering process, including review of mapped points by the model developers and engineering personnel supporting model development. To the extent that documents exist, they will be produced. In addition, the accuracy of the clustering process has been reviewed and verified through the course of in litigated proceedings before the FCC and numerous state commissions, including many proceedings in which Verizon has been a participant. AT&T and MCI object to producing documents from these proceedings because it would be unduly burdensome and because such documents are as available to Verizon as to AT&T and MCI.

SUPPLEMENTAL RESPONSE:

AT&T and MCI object to this data request to the extent that it requests information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

Extensive efforts were undertaken to validate the accuracy of the clustering process, including review of mapped points by the model developers and engineering personnel supporting model development. In addition, the accuracy of the clustering process has been reviewed and verified through the course of in litigated proceedings before the FCC and numerous state commissions, including many proceedings in which Verizon has been a participant. AT&T and MCI object to producing documents from these proceedings because it would be unduly burdensome and because such documents are as available to Verizon as to AT&T and MCI. See attachments 1-10A and 1-10B. AT&T and MCI are continuing to search for relevant documents and will produce them as they are discovered.

Data Request 1-12

Please provide, in electronic format, the computer code(s) or algorithm(s) used to convert clusters into rectangular serving areas.

RESPONSE:

Data Request 1-13

Please provide an electronic copy of the program(s) used to convert the clustering output into a format that can be read by the PointCode software, along with all documentation and input files.

RESPONSE:

Data Request 1-15

For each customer location in Verizon's Washington service area, identify the following:

- 1) whether it is a business, residential, public line, DS-1 or DS-3
- 2) the geographic coordinates for that location
- 3) whether it was successfully geocoded or located through a surrogate process
- 4) the cluster the location was assigned to
- 5) the wire center the location was assigned to

In preparing these data, please include all locations that included lines or services that were used to produce the unit costs that appear on page 3 of Dr. Bryant's Direct Testimony.

RESPONSE:

Data Request No. 1-18

For Verizon's Washington service area, provide:

a) the number of addresses obtained through the Metromail, Inc. National Consumer Database; b) the percentage of addresses to total households obtained through Metromail, Inc. National Consumer Database; and, c) the percentage of addresses that are P.O. Boxes and Rural Route Boxes.

RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS. In addition, AT&T and MCI object that providing this information would require a special study and that the request is, therefore, overly burdensome.

Data Request 1-20

Provide all the software, input files, and other documents used to geocode customer locations or related to the geocoding of customer locations (including, without limitation, any files that are immediate outputs of, and immediate inputs to, the geocoding process). Describe in detail and provide all documents related to the method by which AT&T, MCI and/or HAI Consulting, Inc. verified the accuracy of accuracy of the results of the geocoding process.

RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

The Centrus Desktop software is commercially available software, among many others, commonly used by businesses to perform geocoding of address information. The accuracy of the software is ensured by the competitive market in which Centrus operates. Independent validation of the accuracy of the software is neither feasible nor necessary.

SUPPLEMENTAL RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

The Centrus Desktop software is commercially available software, among many others, commonly used by businesses to perform geocoding of address information. The accuracy of the software is ensured by the competitive market in which Centrus operates. Independent validation of the accuracy of the software is neither feasible nor necessary.

In evaluating the geocoding process in a particular case, AT&T and MCI take some or all of the following steps:

- 1) Verify that all expected wire centers are accounted for;
- 2) Review the line counts, by category, in each wire center and compare them to target line counts provided by the ILEC;
- 3) Determine if there are any clusters that have exclusively high capacity circuits;
- 4) Ensure that high capacity circuits are greater than or equal to the number of DS3 circuits;
- 5) Determine whether there are any cases where single line business lines are greater than business lines;

- 6) Ensure that there is at least a residential line for each household and a business line for every firm;
- 7) Check for other data anomalies, such as missing data, errors, or misplaced data;
- 8) Compare the strand measurement with prior datasets, if they exist;
- 9) Run the data through the HAI Model and review the loop cost results.

Data Request 1-21

Provide all the software, input files, and other documents used to locate customers who could not be geocoded or related to the process of locating customers that could not be geocoded (including, without limitation, any files that are immediate outputs of, and immediate inputs to, this process). Describe in detail and provide all documents related to the method by which AT&T, MCI and/or HAI Consulting, Inc. verified the accuracy of the results of this process.

RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

Extensive efforts were undertaken to validate the accuracy of the process of assigning customer locations to the road network, including review of mapped points by the model developers and engineering personnel supporting model development. To the extent that documents exist, they will be produced. In addition, the accuracy of the process has been reviewed and verified through the course of in litigated proceedings before the FCC and numerous state commissions, including many proceedings in which Verizon has been a participant. AT&T and MCI object to producing documents from these proceedings because it would be unduly burdensome and because such documents are as available to Verizon as to AT&T and MCI.

SUPPLEMENTAL RESPONSE:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

Extensive efforts were undertaken to validate the accuracy of the process of assigning customer locations to the road network, including review of mapped points by the model developers and engineering personnel supporting model development. In addition, the accuracy of the process has been reviewed and verified through the course of in litigated proceedings before the FCC and numerous state commissions, including many proceedings in which Verizon has been a participant. AT&T and MCI object to producing documents from these proceedings because it would be unduly burdensome and because such documents are as available to Verizon as to AT&T and MCI. See Supplemental Response to Data Request 1-10. AT&T and MCI are continuing to search for relevant documents and will produce them as they are discovered.

Data Request No. 3-2

Provide electronic copies of all programming codes, algorithms, and any other rules and procedures that were used to manipulate the Dun & Bradstreet and Metromail databases.

- a) Describe how the data were manipulated and provide all intermediate files, documentation and/or notes describing this process.
- b) Provide an electronic copy of the immediate output file of the process described above. This file(s) might be the input file to the geocoding process. If this file is different than the input file to the geocoding process, then provide all files up to the file that was geocoded (including the input file to the geocoding process) and provide an explanation as to how these files differ.

Response

Data Request No. 3-6

To the extent that wire center boundaries are not contained in the customer location data used in the inputs database to HM 5.3 (see Verizon NW, Set 1, data request 1-5), identify for each customer location in Verizon NW's serving area whether the location has been:

- a) Successfully geocoded to one zip code,
- b) Successfully geocoded to multiple zip codes,
- c) Not successfully geocoded.

Response:

Please response to Verizon 1-5. AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/\$\psi\$r inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.

Supplemental Response:

AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS. Without waiving this objection, please see the response and supplemental response to Verizon 1-5.

Data Request No. 3-11

If not otherwise provided in response to Verizon NW's Set 1, data request number 1-10, provide, in electronic format, the clustering algorithm(s) described in Section 5.4 of "HAI Model, Release 5.3, Model Description," along with all documents concerning, referring or relating to the clustering algorithm, including all input values and input files.

Response:

Data Request No. 3-13

Provide, in electronic format, a copy of the complete clustering source code in its original programming environment. (For instance, if the code was written in C++, please provide the uncompiled C++ programming code.) Should the clustering code be part of another program, provide this program along with the clustering code.

Response:

Data Request No. 3-21

Provide, in electronic format, a copy of the complete surrogating source code in its original programming environment. (For instance, if the code was written in C++, please provide the uncompiled C++ programming code). Should the surrogating code be part of another program, please provide this program along with the surrogating code.

Response:

Data Request No. 3-24

Referring to Section 6.1 of HAI 5.3's Model Description:

- a) Provide the "database developed by TNS" that is referenced in the first line
- b) Identify and describe the "demographic parameters" obtained from the database, including the vintage of the data and the process TNS used to develop these parameters.
- c) If not addressed in the response to item b), identify the "number of households and number and type of housing units," including the vintage of the data and the process used to develop these parameters.
- d) If not addressed in the response to item b), identify the "number of pusiness firms and employees," including the vintage of the data and the process used to develop these parameters.

Response:

- a) Please see response to Verizon DR no. 1-20. AT&T and MCI object to this data request on the ground that such information is not in their possession, custody or control. Any software and/or inputs used to derive customer locations are the intellectual property of TNS and are commercially available to Verizon from TNS.
- b) The demographic parameters are defined in Section 6.1 of the HAI Model Description.
- c) Please see response to DR no. 3-23(c). The number of business firms and employees is derived from Census Bureau 1990 data.

Corrected Response:

- a) The referenced database is the customer cluster database produced as part of the HAI Model as filed in this proceeding.
- b) The demographic parameters are defined in Section 6.1 of the HAI Model Description.
- c) Please see response to DR no. 3-23(c).
- d) The number of business firms and employees is derived from Census Bureau 1990 data.