DIRECT TESTIMONY

OF

C. WILLIAM STIPE III

ON BEHALF OF

AMERICAN COMMUNICATIONS SERVICES, INC.

961537-TP

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DIRECT TESTIMONY OF

C. WILLIAM STIPE III

I. BACKGROUND AND QUALIFICATIONS

Q. PLEASE STATE YOUR NAME, POSITION, AND BUSINESS ADDRESS.

A. My name is C. William Stipe III and I am Vice President - Switched Engineering and Operations. My business address is 131 National Business Parkway, Suite 100, Annapolis Junction, Maryland 20701.

Q. PLEASE DESCRIBE YOUR BUSINESS EXPERIENCE AND BACKGROUND.

A. I joined ACSI in 1996 and serve as Vice President - Switched Engineering and Operations. Prior to joining ACSI, I had twenty-four years of experience in the telecommunications industry working for Bell Atlantic Corporation. I have held a number of positions with Bell Atlantic, and most recently, since 1994, as Director - Financial Systems. From 1991 to 1994, I served as Director - Product Profitability and Transfer Pricing and operated and enhanced a Product Profitability reporting system. I also developed and implemented a Transfer Pricing process for Line of Business financial reporting. From 1987 to 1991, I was the Director - Customer Business Services, responsible for pricing and costing multi-year service contracts in competitive proposals to Bell

Atlantic's largest commercial and government customers. From 1972 to 1987, I held a variety of engineering and management positions of increasing responsibility. I received my Bachelor of Science in Electrical Engineering from Virginia Tech in 1972, and my M.B.A. from Virginia Commonwealth University in 1984.

Q. HAVE YOU PREVIOUSLY TESTIFIED BEFORE THIS COMMISSION?

A. Yes. I filed testimony on behalf of ACSI in support of its arbitration proceeding with BellSouth, Inc. (Docket No. 960916).

Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY?

A. The purpose of my testimony is to provide technical background to the testimony filed by other ACSI witnesses. First, I will describe: a) from a technical standpoint, what is (and is not) required to unbundle a local loop; and, b) the technical differences between the simple unbundled loop requested by ACSI and the special access type services upon which GTE seems to be basing its proposed unbundled loop pricing. Second, I will supplement testimony offered by Mr. Richard Robertson of ACSI in support of ACSI's request that a "bill and keep" system be employed for reciprocal compensation for the transport and termination of local traffic exchanged between the parties. My testimony describes why the services provided are properly regarded as reciprocal. Third, I will respond to

GTE's position that it will not provide a cross-connection between two collocated carriers. Finally, I will comment on GTE's refusal to allow ACSI to include Remote Switching Modules ("RSMs") in its central office collocation arrangement.

II. PRICING OF THE UNBUNDLED LOOP

Q. HOW DOES AN UNBUNDLED LOOP COMPARE TO THE SPECIAL ACCESS SERVICE UPON WHICH GTE APPEARS TO HAVE BASED ITS UNBUNDLED LOOP PRICING?

A. GTE's special access service is not like an unbundled loop at all. GTE has offered an existing tariff for a special access service instead of unbundling its loop plant as required by the FCC.

Q. WHAT ARE THE PHYSICAL CHARACTERISTICS OF SPECIAL ACCESS SERVICE?

A. It is a digital 64 kilobit channel, capable of transmitting voice or data or a combination of the two with the appropriate customer-provided terminal equipment.

Q. IS THIS THE FACILITY GTE USES TO PROVIDE LOCAL EXCHANGE SERVICE TO ITS CUSTOMERS?

A. Not at all. The vast majority of GTE's network access lines use ordinary two wire cable facilities. Most of those have no active or passive

electrical endorsement at all. Some (probably less than 20%) require passive induction coils, commonly called loop coils, for customers beyond 18 kft from GTE's switching office and an even smaller percentage (probably less than 5%) require electronics to extend the switches signaling capability for loops whose resistance exceed 1300 or 1500 ohms. I can only estimate these percentages at this time because only GTE has the information that would be required to calculate precise percentages.

Q. DOES GTE SERVE ALL OF ITS NETWORK ACCESS LINES VIA THE COPPER LOOP FACILITIES YOU HAVE DESCRIBED?

A. No. Some percentage is served via pair gain devices such as digital subscriber loop carrier ("DLC"). Again, I do not have access to GTE data on the amount of such facilities in its plant, but I would be surprised if it is more than 15 percent of the total.

Q. CAN YOU DESCRIBE THIS DIGITAL LOOP CARRIER?

A. Yes. It is digital multiplexing equipment which creates voice grade equivalent facilities in multiples of 24 channel DS-1 facilities which can ride over either optical or conditioned copper facilities and is returned to an analog state in the GTE loop plant near (typically less than 12KF or 900 ohms) the GTE network access line customer.

Q. HOW IS THE GTE NETWORK ACCESS LINE SERVICE CONNECTED TO ITS CUSTOMER FROM THE REMOTE DLC TERMINAL EQUIPMENT?

A. It is connected to a copper facility just like the one I described earlier. I should explain that the use of DLC is not driven by the need to provide a digital capability to the customer, but by the economic trade- offs of expanding copper loop facilities and its supporting conduit and pole line structures versus the cost of the DLC. The customer receives the same 3KHz voice compatible service either way.

Q. YOU MEAN THAT GTE HAS PRICED THE UNBUNDLED LOOP AS A DIGITAL SERVICE THAT PROVIDES 64 KBITS OF CAPACITY WHILE IT USES ANALOG COPPER VOICE GRADE PAIRS TO PROVIDE ITS OWN LOOP SERVICES?

A. Exactly.

Q. WHAT SORT OF PROBLEMS DOES THIS CREATE FOR ACSI IN ATTEMPTING TO COMPETE WITH GTE FOR CUSTOMERS?

A. It causes ACSI multiple problems. The most obvious problem is cost, which Mr. Richard Robertson has addressed in his Testimony.

Both the recurring and non-recurring charges are set to recover costs which ACSI will not cause GTE to incur. This in turn, will artificially

increase ACSI's rates for both installation and service, making it exceedingly difficult to compete effectively.

Q. DO GTE'S NON-RECURRING CHARGES FOR THE UNBUNDLED LOOP SEEM REASONABLE FOR THE WORK REQUIRED?

A. They may be reasonable if the expectation is that a new facility must be designed and built for each request for service of that type of facility. They are very unreasonable when all ACSI desires is that the customer's existing service just be unbundled and the existing copper loop be connected to ACSI.

Q. WHAT IS THE PHYSICAL WORK REQUIRED TO ACHIEVE THE UNBUNDLING YOU DESIRE?

A. The physical work required to achieve the unbundling of the local loop should be clearly understood and should not be exaggerated. It is merely removing the wire cross-connect in the GTE office which connects the loop facility to the central office and replacing it with one to ACSI's collocated equipment interface. In other words, unbundling the local loop does not require the installation of an entirely new loop.

Q. DOES ACSI HAVE ANY NEED FOR THE TYPE OF FACILITY GTE OFFERED AS AN "UNBUNDLED LOOP"?

A. Yes, but only in instances where it desires to provide data and other specifically designed services to its customers. It does not need this sophisticated facility to provide most basic local exchange services, which it expects to be the majority of its service over GTE's bottleneck facilities.

III. MUTUAL TRAFFIC EXCHANGE

Q. IN A MUTUAL TRAFFIC EXCHANGE SITUATION, DOES ACSI'S NETWORK PERFORM EQUIVALENT FUNCTIONS AS GTE'S TANDEM SWITCH?

A. Yes. From a functional perspective, ACSI's network will provide the same service as is provided by GTE's tandem switched network. Although ACSI's network design relies upon a different engineering strategy, functionally the service it provides is the same as ACSI receives through access to GTE's tandem. That is, both GTE and ACSI offer to the other calling area-wide access through a single facility. ACSI finds it most efficient to provision a single switch and then connect to its subscribers through a wide-area distribution system, while GTE relies upon a multiple switch, tiered network connected to smaller area distribution systems. The difference in design is dictated by economic considerations, but does not result in a different functionality for the two services.

Q. DOES ACSI'S SWITCH ALSO SERVE THE SAME GEOGRAPHIC AREAS AS GTE's TANDEM SWITCHES?

A. Yes. ACSI's network will cover the same geographic scope as is reached by GTE's tandem switches. ACSI will compete for customers located throughout the areas served by GTE's tandem switches. Moreover, it is ACSI's intention, at least initially, to define local calling areas that coincide with GTE's. Accordingly, ACSI will engineer its network to be able to reach the same geographic area as reached by GTE's tandem switching.

Q. DO YOU HAVE ANY REASON TO BELIEVE THAT THE AMOUNT OF TRAFFIC EXCHANGED BETWEEN ACSI AND GTE WILL BE SUBSTANTIALLY OUT OF BALANCE ONE WAY OR ANOTHER?

A. No.

IV. CO-CARRIER CROSS-CONNECT

Q. FROM A TECHNICAL PERSPECTIVE, IS THERE ANY REASON CO-CARRIER CROSS-CONNECTIONS NEED TO BE ROUTED THROUGH GTE'S NETWORK?

A. No. In fact, it will be least costly -- and therefore most beneficial to consumers -- for two CLECs collocated at the same GTE premises for purposes of interconnection with GTE's network also to connect directly with each other, without using GTE's network at all. Such a connection

would be established for the purpose completing a call originating on one CLEC's network and terminating on a line served by another CLEC. GTE has no interest in this call, and no need to participate in its routing. Its involvement would only increase ACSI's costs and add a new point of potential failure to the network.

Q. IF COLLOCATED CARRIERS DO NOT USE GTE'S NETWORK, HOW WOULD A CROSS-CONNECTION BE ESTABLISHED?

A. Assuming that the carriers are collocated in nearby spaces on the GTE premises, they could establish a cross-connection by pulling cables between the two collocation cages. Each end of the cable would be connected to one collocated carriers' interconnection equipment, and traffic exchanged between the carriers would pass through this connection. In this scenario, no GTE involvement is necessary at all.

Q. ARE THERE ANY SCENARIOS WHERE THE PARTICIPATION OF GTE WOULD BE NEEDED TO ESTABLISH A CROSS-CONNECTION?

A. Only one. If the collocation spaces of the two carriers wishing to establish a cross connection were located in non-adjacent spaces (e.g. on different floors of a building, or on different sides of GTE exclusive areas), then it might be necessary to seek the assistance of GTE personnel. This assistance, however, would be necessary only for purposes of

installing connecting cables between the collocation spaces of the two carriers. GTE's network still need not be transited. Of course, GTE should be compensated on a time and materials basis for this installation assistance. However, once the installation is completed, no other GTE assistance would be necessary.

V. COLLOCATION OF REMOTE SWITCHING MODULES

Q. WHAT IS THE NATURE OF THE DISPUTE CONCERNING REMOTE SWITCHING MODULES?

A. ASCI requested during negotiations that it be permitted to install Remote Switching Modules ("RSMs") in its collocation spaces at GTE central offices. GTE refused this request.

Q. WHAT IS A REMOTE SWITCHING MODULE?

A. A RSM is a device used to connect a larger, "host" switch with local exchange loops running to end user locations. An RSM aggregates a number of loops and connects them with a high-capacity DS-1 or similar feeder channel. It thus can be used to perform loop concentration and multiplexing functions, and also performs circuit termination functions. In addition, an RSM performs limited switching functions at the direction of the host switch. For example, if one subscriber connected to an RSM dialed the number of another subscriber also connected to the equipment, the RSM could, upon instruction from the host switch, establish a

communications path directly between those two subscriber loops. This is more efficient than other interconnection arrangements because it saves ACSI the need to transport the call to the host switch and then back along the same trunk for termination.

Q. IS IT TECHNICALLY FEASIBLE TO CONNECT RSMS TO UNBUNDLED LOOPS OBTAINED FROM AN ILEC?

A. Yes. An RSM may be connected directly to unbundled loops ACSI may purchase from an ILEC.

Q. IS AN RSM THE SAME THING AS A SWITCH?

A. No. An RSM cannot perform all the functions of a full-service end office switch. It is a much more limited piece of equipment that must take its directions from the actual switch, and therefore is smaller and has fewer capabilities than a large switch. Although I have been informed that the Florida Commission does not require the collocation of "switches", I believe that an RSM is different from a switch. As I explained previously, an RSM is a multi-purpose piece of equipment used for interconnection, concentration/multiplexing and termination functions in addition to the limited switching functions described above.

Q. WHY DOES ACSI WANT TO COLLOCATE ITS RSMS AT ILEC FACILITIES?

A. Collocation of RSMs is the most efficient way for ACSI to use its network architecture in higher volume end offices. Essentially, an RSM replaces other types of concentration equipment, such as a Digital Loop Carrier, that ACSI would otherwise have to install at the ILEC's facilities to aggregate unbundled loops. In addition, however, an RSM is capable of performing limited switching functions at the direction of the host switch. Thus, ACSI gains the functionality of a Digital Loop Carrier ("DLC") and saves on unnecessary backhauling to the host switch.

Q. DOES COLLOCATION OF AN RSM, AS OPPOSED TO OTHER TYPES OF COLLOCATION EQUIPMENT, CREATE ADDITIONAL SPACE, TECHNICAL OR RELIABILITY CONCERNS?

A. No. An RSM replaces other types of aggregating equipment, so it will not require ACSI to request more collocation space than it would need to install other equipment. Although RSM is slightly larger than a DLC, the RSM serves many more lines (4,000 vs. 760). Therefore, it actually is more space-efficient to install one RSM when serving a high volume of loops than to install several DLCs. Further, the technical and network reliability concerns with collocation of RSMs are identical to those that would exist if ACSI chose to collocate other equipment instead.

Q. HAVE OTHER ILECS AGREED TO ALLOW ACSI TO INSTALL RSMS IN THEIR CENTRAL OFFICES?

A. Yes. BellSouth, Southwestern Bell and US West all have agreed to permit ACSI to install RSMs in its collocated space in their central offices. In ACSI's negotiation experiences, no other ILEC has refused to allow ACSI to install such RSMs.

Q. DOES THIS CONCLUDE YOUR TESTIMONY?

A. Yes.