

COMMONWEALTH OF KENTUCKY
BEFORE THE PUBLIC SERVICE COMMISSION

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In the Matter of:

THE REQUEST OF THE STATE SENATE)
TO INVESTIGATE CALLING WITHIN)
GREENUP COUNTY, KENTUCKY AND)
THE SOUTH SHORE EXCHANGE IN) CASE NO. 9112
GREENUP COUNTY, KENTUCKY, TO)
PORTSMOUTH, OHIO)

O R D E R

On March 28, 1984, the Kentucky Senate passed a resolution (No. 106) which directed the Kentucky Public Service Commission ("Commission") to direct a study of calling patterns within Greenup County, Kentucky, and to determine the number of non-toll calls to Portsmouth, Ohio, in order to implement county-wide Extended Area Service ("EAS").

There are four exchanges which either partially or totally lie in Greenup County, Kentucky. They are the Ashland, Russell, Greenup and South Shore exchanges. General Telephone Company of Kentucky ("General") serves all four of these exchanges. Presently there is EAS between the Ashland, Russell and Greenup exchanges. While South Shore does not have EAS with these three exchanges, it does have EAS calling with Portsmouth, Ohio.

The Senate resolution requests two different calling pattern studies. The first is the toll calling between the South Shore exchange and the Ashland, Russell and Greenup exchanges.

The second request is the calling volume from the South Shore exchange to Portsmouth, Ohio. As to the first request, the Commission FINDS that the granting of EAS between the South Shore exchange and the Ashland, Greenup or Russell exchanges should be subject to the Commission's EAS Guidelines. At this point the request should proceed to step three of the Commission's EAS Guidelines where calling patterns are determined. As to the second request, the Commission FINDS that General should determine the number of calls made from South Shore to Portsmouth, Ohio, during the same period that the EAS studies are done.

IT IS THEREFORE ORDERED that Senate Resolution No. 106 shall be subject to the provisions of the Commission's EAS Guidelines, as adopted in Administrative Case No. 221 by Order dated October 31, 1980, attached as Appendix A.

IT IS FURTHER ORDERED that the process shall proceed to step three of the EAS Guidelines and that General shall perform the required studies as set out in the EAS Guidelines between the South Shore exchange and each of the Ashland, Greenup and Russell exchanges.

IT IS FURTHER ORDERED that General shall determine the calling volume between the South Shore exchange and Portsmouth, Ohio, during the same period that the EAS studies are being performed.

IT IS FURTHER ORDERED that General shall report the results of all such studies within the time frame set out by the Commission's EAS Guidelines.

Done at Frankfort, Kentucky, this 7th day of August, 1984.

PUBLIC SERVICE COMMISSION

Richard D. Hanson Jr.
Chairman

Ronald D. Dyer Jr.
Vice Chairman

Len Shull
Commissioner

ATTEST:

Secretary

APPENDIX A

APPENDIX TO AN ORDER OF THE PUBLIC SERVICE
COMMISSION IN CASE NO. 9112 DATED 8/7/84

PUBLIC SERVICE COMMISSION
GUIDELINES FOR CONSIDERATION OF
REQUESTS FOR ESTABLISHMENT OF
EXTENDED AREA SERVICE

General Provisions

This document provides for the consideration of requests for Extended Area Service (EAS) which have been brought before the Commission by telephone subscribers or others desiring the proposed service. The EAS considered shall be two-way, non-optional service between entire exchanges under jurisdiction of this Commission. Such exchanges must be either contiguous or connected by a series of consecutively contiguous exchanges which have or are proposed to have a local calling area including the proposed EAS plan. If these above provisions are in conflict with either the specific language or general intent of appropriate tariffs of a company, the Commission may, in view of this conflict in regulations, permit deviation from such provisions upon application by the company.

EAS will be provided under these guidelines only when there is a demonstrated community of interest between exchanges, the relevant costs have been determined and appropriate customer surveys have indicated a clear willingness to pay any higher local rates attendant to the establishment of the service.

The "procedure" herein is a step-by-step process, with criteria for each step having to be successfully met to continue

consideration of the EAS request, except as specifically noted. Failure to meet any such step will end consideration of the request at that point unless otherwise specified. However, petitioners may at any time withdraw their request, at which time the Commission may terminate the proceedings.

Glossary of Terms

For the purpose of this procedure, the following definitions apply:

Central Office is a unit of a telephone company including the switching equipment and associated facilities used to establish connections between subscribers' lines connected thereto and to trunk or toll lines (intraexchange or interexchange) to other central offices within the same or other exchanges.

Community of Interest Factor (CIF) is a dual measurement for determining the feasibility of implementing Extended Area Service. A CIF is arrived at by: 1) dividing the total of Long Distance Message Telecommunications Service (toll) and Optional Calling Plan (OCP) messages made from an exchange to another exchange during the study period by the total number of subscribers in the originating exchange; and 2) dividing the total number of subscribers placing the required minimum number of messages stated in the first part by the total number of subscribers in the originating exchange.

Exchange is a geographical area established by a telephone company for the administration of telephone service. It consists of one or more central offices together with associated plant used in furnishing telephone service in that area. Long distance

(toll) charges do not apply for messages between subscribers served by the same exchange. Petitioning Exchange is the exchange in which the original petitioners for EAS are located. Desired Exchange is the exchange to which EAS is desired by the petitioners.

Extended Area Service (EAS) is a type of telephone switching and trunking arrangement which provides for calling among all subscribers of two or more telephone exchanges without the application of Long Distance Message Telecommunications Service (toll) charges.

Local Calling Area (LCA) is that area within which all subscribers served may call all other served subscribers without the application of toll charges to any subscriber for such calls, i.e., the area encompassing a common Extended Area Service plan.

Main Stations are all telephones, including Centrex and ESSX-1 (or similar type systems) and coin telephones, and excluding all extension telephones, which have access to the public network, and including (in lieu of any associated telephones) key system and PBX trunks, special circuits, and equivalent.

Message is a completed telephone call, regardless of duration, distance or origination time.

Optional Calling Plan (OCP) is a calling plan of varying type which may be made available within an exchange to individual subscribers having a need to frequently communicate with a distant exchange to which EAS is not offered.

Rate Additive is the positive per subscriber rate needed to recover the net cost penalty to the company of implementation of an EAS plan. It is in addition to any rate increase needed to reflect the increase in station size of any exchange's local calling area, such as approved tariff regrouping increases. In the absence of such approved tariff regrouping increases, a utility shall, before calculating the rate additive, first propose rate leveling between its exchanges and account for all revenue effects thereof in the derivation of its net cost penalty.

Rate Leveling is the method of achieving the same basic service rate treatment between or among exchanges as do approved tariffs for regrouping, but applying in instances where such regrouping and attendant rate increases are not authorized by approved tariffs. Such leveling should recognize both similarities and differences in the station sizes of all proposed local calling areas of each of a company's exchanges which is involved, in a manner similar to other companies' approved regrouping tariffs.

Study Period is a 30-day period used in determining the community of interest factor, said period falling wholly within the period comprising the previous six months and the future two months from the day the Commission orders the study of such data. The Commission may grant a period of different duration or age upon application by the company and upon acceptable showing of need or desirability for such deviation. Additionally, the Commission may order a study period to be comprised of a specific 30-day period in the future. A study period formed in accordance

with this definition shall be considered to be representative of recent subscriber usage in general, except for unusual circumstances which may be noted by the company.

Subscriber is a customer of the telephone company who is responsible for telephone service, i.e., usually the person in whose name the telephone is listed and to whom the charge for service is billed. The subscriber may be any person, firm, partnership, corporation, cooperative organization or governmental entity or agency, among others, furnished communication service by a telephone company under approved tariffs. The term "subscriber" when referring to usage of the telephone service includes all usage of the service by all parties. "Subscribers" may at various times be equated to main station, billed telephone numbers, or accounts when referring to number of customers, but shall always mean the billing party or authorized representative thereof when referring to customer signatures or survey recipients. Rate - Affected Subscriber is the customer responsible for paying for a service whose billed rate would at some time be affected by the implementation of an EAS plan.

Toll, unless otherwise specified, refers to Long Distance Message Telecommunications Service as described in company tariffs, specifically and without modification thereto.

Trunk Equipment is cable, carrier, microwave, and other outside plant equipment required for EAS trunking between telephone exchanges (interexchange). This term may also refer to similar facilities between central offices within an exchange (intraexchange).

Other words, terms, and phrases used herein shall be interpreted in the manner as is generally done within the telecommunications industry and as reflected in the various approved company tariffs and in other Commission rules and regulations. Any word or term in the singular shall also mean the plural where appropriate, and vice versa.

Procedure

Step 1) Upon receipt of a petition from subscribers or others in accordance with KRS 278.260, or any other currently applicable statute, the Commission shall refer the request to the company for response. If the company concurs in the request and the Commission agrees to this point, consideration shall directly proceed to Step 3 following. If a company does not concur in the request it shall state its reasons for so doing and shall include in its reply to the Commission any known rate increases (by exchange by class and type of subscriber) attendant to the proposed EAS plan under approved tariffs, plus any estimate of further rate changes the company may then wish to reasonably justify within the time allowed for response, including any proposals for rate leveling of basic exchange rates. The company shall also furnish the exchange sizes by main station subscribers. The Commission shall allow 30 days for this initial review and response by the company.

If the company declines the request for EAS for the reason that this same or substantially same request has been the subject of an investigation dismissed by the Commission within the previous four years, the Commission shall omit Step 3 in the

following procedure and consideration shall progress directly from Step 2 to Step 4. After completion of Step 4 in this instance, the Commission upon consideration may, in lieu of either dismissing the request or ordering EAS cost studies at that time, then order the traffic studies described in Step 3. The community of interest factors obtained therefrom shall then be considered by the Commission in addition to the evidence of record thus far in determining the need for further investigation. Step 4 need not be repeated again in this particular situation, at the Commission's discretion.

Step 2) If the petitioners still wish to pursue their request after receiving all the preliminary rate increase information accepted to this point by the Commission, the Commission shall request the petitioners to seek, as a valid indication of general subscriber interest, the signatures of subscribers in affected exchanges, said signatures to be obtained on standard Commission petition forms which include a statement of rate increases as furnished by the company and accepted by the Commission. The petitioners shall certify that subscribers have been made aware of such information before signing. The minimum number of subscriber signatures, addresses and telephone numbers needed to signify valid interest by the general subscriber body affected shall be according to a formula designed to interpolate that number between given points of 20% of the total subscribers in exchanges of 1,000 or less main stations and 2% of the total subscribers in exchanges

of 100,000 or more main stations for petitioning exchanges. The number of signatures needed in the desired exchanges shall be one-half of the number calculated as if the exchange were a Petitioning exchange. The formula used is as follows for exchanges of from 1,001 through 99,999 main stations:

$$\frac{(\text{Exchange Size in M.S.} - 1,000 \text{ M.S.} \times 1800) + 200}{99,000 \text{ M.S.}} = \text{No. signatures of petitioning exchange (round to nearer whole number)}$$

All petitioning exchanges of 1,000 or less or 100,000 or more shall use the stated percentage for the respective given point described above as a constant regardless of size below 1,000 or above 100,000 main stations, and desired exchanges shall use one-half thereof.

The Commission shall allow up to 60 days for the gathering and presentation of signatures. The Commission shall oversee certification of these signatures by a random selection verification process, then proceed to Step 3, except as earlier indicated in cases of prior Commission consideration. If Step 2 is not satisfactorily completed, the consideration process shall move directly to Step 4. After completion of Step 4, the Commission upon consideration may either dismiss the request at that time or, if evidence of record supports doing so, allow only one additional period not to exceed 60 days to complete the signature collection process. If this effort fails, the EAS request shall be dismissed. If this process is successfully completed in the allotted time, the Commission shall,

after verification, then order the traffic studies described in Step 3. The community of interest factors obtained therefrom shall then be considered by the Commission in addition to the evidence of record thus far in determining the need for further investigation. Step 4 need not be repeated again in this particular situation, at the Commission's discretion.

Step 3) The company shall be directed to conduct studies of its originating traffic for the defined study period and be prepared to present the results within 30 days after the end of the allowed or ordered period for gathering data, said results being presented by correspondence with the Commission and interested parties. The Commission shall, in instances where step 4 has either not yet been completed or will be repeated, at the same time as the studies are ordered, set the date of any such public hearing at which their results will be discussed, said date to be at least 15 days beyond the date the study results are filed. The studies shall include as a minimum the data allowing the following described community of interest factors to be calculated, and in addition may include other recommended data as cited hereinafter. The Commission shall consider these factors as minimum criteria for proceeding beyond Step 4, with "subscriber" meaning combined business and residence subscribers considered together:

a) In any petitioning exchange, there must be an average of at least four messages (toll plus any OCP) per subscriber to a

desired exchange and at least 50% of the total subscribers in the exchange must have completed at least four calls to the desired exchange; and

b) In the desired exchange, there must be present at least half that community of interest needed in a), as expressed by an average of at least two messages (toll plus any OCP) per subscriber to a petitioning exchange and at least 50% of the total subscribers in the desired exchange having completed at least two calls to the petitioning exchange.

c) However, any excess messages and subscribers above those required as dividend in the division processes which would be needed to meet the minimum criteria in a) may be added to like dividends in the division processes in b) to help meet those minimum standards. In no case shall any excess data in b) be used to meet the criteria required in a), however.

Both a) and b) above must be attained as minimum justification for proceeding beyond Step 4. All petitioning exchanges must satisfy criteria in a), and all desired exchanges must likewise satisfy requirements in b). If all involved exchanges are petitioning exchanges, b) and c) are not considered. Each individual EAS route (individual exchange to individual exchange) must be measured in each direction and minimum criteria met for each path in both directions. These community of interest

factors as obtained from the traffic studies must meet the stated criteria in all instances, regardless of procedural changes or any other variables in this process, for the consideration of an EAS to continue beyond this point. If the petitioners' request contains a combination of EAS routes, some of which meet these criteria and some of which do not, the petitioners' request shall continue to be considered only to the extent of considering those individual routes meeting these criteria in both directions. In this case, all "general provisions" cited earlier must still be met for the consideration process to continue. The petitioners shall, however, retain their right to withdraw their entire request in this event, at which time the Commission may terminate the proceedings.

In addition to the data necessary to furnish the above information, it is recommended that the traffic studies should include, but not be limited to, this further information for possible use in Step 4:

- i) Data to allow the above detailed community of interest factors to be computed on separate business and residence bases, if readily attainable; and
- ii) Individual account usage information allowing high volume users to be located as possible candidates for OCP's and other study considerations. Such information should include

- the number of messages and tolls by type of call over each proposed EAS route direction; and
- iii) A summary message breakdown showing the number of messages and the number of residence, business (if separation of data available) and combined subscribers making those numbers of calls over each proposed EAS route direction; and
- iv) A summary revenue breakdown showing the total of toll charges by number of residence, business (if separation of data available) and combined subscribers for messages over each proposed EAS route direction, broken down by the following minimum monetary brackets and breaking points:
- (1) Every \$0.25 from \$0 - \$4.99
 - (2) Every \$1.00 from \$5.00 - \$14.99
 - (3) Every \$5.00 from \$15.00 - \$24.99
 - (4) Every \$25.00 from \$25.00 - \$99.99
 - (5) All over \$99.99
- v) A summary breakdown showing number of messages and "hours of use" for residence, business (if separation of data available) and combined subscribers, broken down by days of the week and by hours of the day for each proposed EAS route direction.

Any and all data on individual subscriber accounts shall be treated as confidential by the Commission and the company, and data shall be revealed to other parties only in the public record on a group or aggregate basis.

Step 4) The Commission shall set the matter for public hearing at which time all interested parties shall be allowed to present testimony on relevant subjects, including community of interest and other pertinent data. At this time the petitioners shall submit their reasons for desiring the requested EAS and testimony as to why it otherwise should be enacted. Community of interest testimony shall include the results of the petitioners' signature-gathering requirement, if any. At this same hearing the company shall, as appropriate, discuss the findings of any traffic studies done in this case or from previous cases investigating the same or substantially the same request and, as appropriate, other relevant information gathered from the traffic studies' additional data described in Step 3. This information may include data as to the type and pattern of calls made and the percentage and number of subscribers whose toll charges from the study fall above and below any known and estimated rate increases accepted to this point, or filed or available OCP rates. For example, if a significant number of subscribers are paying more in toll charges than they would be paying for any known EAS rate increases, there could be interpreted to be a reasonable degree of interest in paying additional charges for EAS. Conversely, if a significant number were paying less for toll than the known and projected

increases, the opposite conclusion would be indicated. All available information may be presented on such known and estimated rate increases, appropriate OCP's and any other appropriate service plans or proposals. Additionally, any other readily available data on subscribers to, and usage levels of, OCP, WATS, Foreign Exchange, and other EAS alternative services should be presented.

The Commission shall consider the evidence of record to this point, including all minimum requirements for community of interest indication and decide if further study is merited under these guidelines.

Step 5) The Commission shall direct a detailed cost study to be performed by the company. The cost study shall include, but not be limited to, estimates of central office and trunk equipment needed for a ten-year period after the EAS is implemented. In most cases, a minimum of two years will be required between study and implementation of the EAS plan. Each study shall indicate a proposed implementation date based upon the particulars of the EAS proposal studied.

Projected rates should reflect recovery of the cost of all such equipment and all other associated expenses and revenue losses, including projected toll loss. Also included shall be all company costs allocable to the consideration of the request itself, i.e., the cost of traffic studies, public hearings, engineering cost studies and estimated costs of subsequent customer surveys.

The relevant costs are the incremental costs required to provide EAS rather than toll. Therefore, also included should be cost savings and added revenues, such as from rate regroupings attributable to the proposed EAS, again for the same ten-year period. All allocable expenses and savings and revenue losses and gains should be considered. Standard time value of money techniques and reasonable inflation data should be used. If more than one company is involved in this study, each shall determine its net cost penalty and the rates necessary to recover such amounts determined by its studies. Said rates shall include those rate additives appropriate over and above standard authorized tariff rates for local service and other services and equipment, and rates needed for rate leveling. Rate additives for the same class and grade of one company's subscribers shall be the same within the same proposed local calling area. For example, a one-party residence subscriber in the petitioning and desired exchanges of the same company would have the same rate additive, in addition to possibly varying regrouping or rate leveling increases as appropriate.

Additionally, if community of interest factors determined in Step 3 show that interest from the petitioning exchange to the desired exchange is at least four times the interest in the reverse direction, as measured by the comparison of the respective messages per subscriber figures obtained in that step's items a) and b), before any adjustment called-for by item (c) of that step,

then rates should also be calculated which reflect the recovery of the net cost penalty of the proposed EAS from just petitioning exchange subscribers, net cost taking into account revenue effects from all tariff-imposed regrouping increases, or proposed rate leveling increases, necessary in all exchanges individually. A minimum of three months shall be allowed for the compilation of these cost studies and attendant rate additives. If more than two exchanges or companies are involved, more time may be required for completion. Each company should make its most diligent effort to formulate definitive studies in this time. In the event EAS is eventually ordered, the Commission shall be the final judge of rate additives implemented and may consider a range change in the rate additives derived from the cost studies discussed herein upon application of and proof by the company. Such proof could cover, among other items, serious errors in calculation or the advent of unforeseen circumstances such as subsequent rate changes affecting study revenues, such as changes in local rates or the toll schedule.

After receiving the cost studies and rates information, the Commission shall conduct whatever investigation it deems necessary, including corrective action, to approve the study results.

Step 6) After the cost study and rate additive calculation results have been presented, the Commission shall invite from any interested party proposed mail surveys as complete in content and form as possible at that point. The Commission may distribute

these proposed forms-of-survey to other parties of record as it deems appropriate. The Commission shall however, finally approve a survey form and content, timetable and method of canvass, holding whatever informal staff meetings it finds necessary with various parties to the case to allow such approval to be given.

Surveys shall be accomplished by mail, with scientific sampling methods allowable in exchanges of over 1,000 main station subscribers. If such methods are used, the Commission must approve of the particulars of the proposed method in advance of any mailing. The company shall be allowed at least 30 days from final Commission approval of all survey aspects (forms, content, method, etc.) to mail the survey. Adequate proof of the mailing of such survey and of the scientific nature of any sampling method it had approved earlier may be required by the Commission subsequent to mailing, for its use only. The Commission shall take whatever steps it deems necessary, if any, to assure that all parties involved respect the neutrality of the survey and that no effort is made by any party to influence the responses of those surveyed. Replies shall be by prepaid return postcard mailed directly to the Commission which will be responsible for tabulation of results.

The survey form itself shall clearly indicate that the increased net cost penalty to the company for the proposed EAS will be borne by all subscribers having access to the service. Only rate-affected subscribers shall be surveyed. If, as described in Step 5, rate additives have been calculated for

petitioning exchanges only then petitioning exchange subscribers may additionally be asked their opinion on bearing the entire EAS net cost penalty over and above any required tariff regrouping increases, or proposed rate-leveling increases for all exchanges, should desired exchange subscribers vote disapproval of bearing their share of increased rates. In no case shall any petitioning exchange be relieved of bearing its full portion of the net cost recovery, nor shall it be surveyed thereon.

Opinions may also be solicited on any appropriate Optional Calling Plan or other EAS alternatives proposed.

Survey forms shall also state the date through which replies shall be accepted and counted (normally 30 days from mailing) and that final approval of all plans and associated rates shall rest with the Commission.

Step 7) For the Commission to order the proposed EAS to be established in accordance with these guidelines, over 50% of the total subscribers surveyed on the same proposal must consent, such subscribers being considered in sum total, with any respondent representing a scientific sample having his response weighted as if all subscribers represented thereby had been surveyed and had responded the same way as that subscriber. If 50% or less of the subscribers respond to any same question, by their own act or through any scientifically sampled representation, the Commission shall determine if follow-up surveys further soliciting a response from the previous nonrespondents would be of value in determining

whether survey results criteria are met, i.e., if the "over 50%" of total subscribers needed could reasonably be expected to be attained thereby. If the Commission feels that follow-up mail surveys are needed, the company shall be allowed like time intervals for conducting this survey as for the initial survey. The Commission shall again approve the same various survey aspects.

The results of any survey of this type shall then be included with results of the initial survey, in the same manner, and a final determination made as to whether the survey results criteria are met. Reply cards will be available for inspection by interested parties to the extent that they could be made a matter of public record and the confidentiality of individual replies and privacy rights of individual respondents shall be protected by the Commission. After adjudication of the EAS request under these guidelines, in the event EAS is not approved by the Commission, survey response cards may be used to determine candidates for any OCP's or other services alternative to EAS which are approved by the Commission.

Step 8) Within a reasonable time after the proposed EAS is ordered, the company shall supply the Commission with a work schedule to accomplish the EAS implementation and additionally shall supply the Commission with at least quarterly progress reports of EAS construction.

If subscribers of any one company agree under Step 7) to pay rates for recovering costs of a different company and that is the

condition under which EAS is implemented, then the latter company shall be reimbursed by the former company through intercompany settlement procedures for all of its net cost penalty not recovered from its own subscribers. Such reimbursement is to continue for the period of time any, all, or any part of the rate additives are collected. The Commission shall be the final judge as to the length in time of all such collections.