A HISTORY OF EDUCATIONAL TELEVISION IN THE STATE OF KANSAS

by

JAMES LAWRENCE HAMILTON

B. A., Creighton University, 1966

A MASTER'S THESIS

submitted in partial fulfillment of the

requirements for the degree

MASTER OF SCIENCE

Department of Journalism

KANSAS STATE UNIVERSITY
Manhattan, Kansas
1966

Approved by:

[Signature]

Major Professor
FOREWORD

Educational television (ETV) has been in various stages of development in the state of Kansas for many years. The state's two largest schools (Kansas University at Lawrence and Kansas State University at Manhattan) tried unsuccessfully for many years to gain legislative funds to start a state-wide ETV network. This thesis is the story of efforts for a thirty-six year period to establish educational television in a state that is now surrounded by large state-wide ETV systems. The efforts of the state schools failed in the Legislature, and Washburn University (a small municipal university in Topeka, Kansas) eventually became the operator of the only Kansas ETV station broadcasting in June, 1968.

This study is significant because of the existence of elaborate ETV stations and micro-wave systems in bordering states. Has Kansas lagged behind neighboring states in the area of school support of audio-visual devices? Information for this study was obtained from files at: Kansas State University, Washburn University, KTWU TV station, and WIBW-AM-FM and TV stations.
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>CHAPTER I:</th>
<th>THE EARLY YEARS</th>
<th>PAGE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Experimental Television at Kansas State College</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Early Efforts for Channel Allocations</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Kansas University Medical Center Uses Television</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Closed Circuit TV Proposals and Equipment Start ETV</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CHAPTER II:</th>
<th>THE SECOND ERA OF ETV IN KANSAS</th>
<th>11</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Kansas State Used Television Equipment on the Campus</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Five State Schools Band Together for ETV</td>
<td></td>
</tr>
<tr>
<td></td>
<td>The Durwood Case</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Citizens Committee on ETV Formed</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CHAPTER III:</th>
<th>THE THIRD ERA OF ETV IN KANSAS</th>
<th>13</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>The Schwarzwalder Survey, 1960</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Controversy over the Survey Results</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Legislature Fails to Provide Funds</td>
<td></td>
</tr>
<tr>
<td></td>
<td>State-wide ETV Loses by One Vote</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CHAPTER IV:</th>
<th>WASHBURN UNIVERSITY TAKES THE AIRWAYS</th>
<th>23</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Station KTWU Formed</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Used Equipment Combined with Federal Support</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Financial Troubles Threaten ETV</td>
<td></td>
</tr>
<tr>
<td></td>
<td>ETV Progress and the Future</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>APPENDICES</th>
<th></th>
<th>43</th>
</tr>
</thead>
</table>

| BIBLIOGRAPHY | | 153 |
APPENDIX I: Proposal of the five state colleges to the Kansas Legislature.

APPENDIX II: Statement of opposition of Kansas State College of Agriculture and Applied Science to petition for rule-making proceedings by Stanley H. Durwood and order to show cause. Presented before the Federal Communications Commission, Washington, D. C., February 16, 1955. This appendix contains the statement and four selected exhibits presented to the FCC to support the statement.

APPENDIX III: Public Relations release to the media prepared by the Citizens' Committee on Educational Television for Kansas. One example of many such releases prepared by this group in support of ETV.


APPENDIX V: Two maps taken from the Schwarzwalder Survey giving proposed locations of TV transmitters and production centers.

APPENDIX VI: Summary of Differences to the Schwarzwalder Survey.

APPENDIX VII: Engineering Statement by John B. Heffelfinger to the Education Committee of the Legislative Council of the State of Kansas. May 19, 1961. The engineering proposals in this statement were used in Kansas arguments before the FCC on behalf of ETV channel allocations.

APPENDIX IX: Excerpts from a Report of the Committee on Education to the Legislative Council, Kansas Legislature. These excerpts give a complete breakdown of the actions of the Kansas Legislature in regard to ETV matters. The Report was made to give legislators the background of the ETV issue for vote on the ETV Bill in 1963.

APPENDIX X: Telegram and press release from Washburn University concerning the granting of a Broadcast License by the FCC. May, 1965.


APPENDIX XIII: Copies of two memoranda concerning studio space for KTWU at Washburn University. A copy of a letter by Thad Sandstrom of WIBW outlining another studio possibility is also included. July, 1965.

APPENDIX XIV: Copy of letter by Garvey Foundation to Washburn University requesting that part of the funds from the new Fine Arts Building be reserved for ETV building purposes in the future. September 10, 1965.

APPENDIX XV: Letters written by RCA to Washburn University regarding the expense and effort of converting the Channel 13 transmitter to Channel 11. September, 1963.

APPENDIX XVI: Letter written by Ian Wheeler of KTWU to Thad Sandstrom of WIBW concerning expansion of the KTWU signal via cable TV. December 28, 1965.

APPENDIX XVII: Letter written by Ian Wheeler of KTWU to Thad Sandstrom of WIBW concerning an appeal for funds and equipment. Information relating to this letter is also included. November 23, 1965.


APPENDIX XX: Example of letters written by Thad Sandstrom of WIBW to local businessmen seeking support for ETV. May 12, 1966.

APPENDIX XXI: Pictures of the Washburn Campus before and after the tornado of June 8, 1966.

APPENDIX XXII: Letter from Dale Anderson of KTWU to Thad Sandstrom of WIBW concerning recent awards. October 27, 1967.

APPENDIX XXIII: Letter from Thad Sandstrom of WIBW to Dale Anderson of KTWU concerning cable TV expansion. December 9, 1967.
CHAPTER I

THE EARLY YEARS

Television is the newest of the mass media, but it came to Kansas before it came to most other states. Early experiments with television were begun at Kansas State College, Manhattan, Kansas, as early as 1931. "The first experimental work in television in Kansas was begun by the Department of Electrical Engineering as a project in the Engineering Experiment Station." This station was operated by Kansas State College, which was re-named Kansas State University in later years. Since 1924 the school has operated radio station KSAC, the call letters being indicative of the station operator, Kansas State Agricultural College.

An experimental license for operation of TV station W9XAK on 2050 kilocycles was granted to the college in November, 1932. Regular bi-weekly broadcasts using a college-built mechanical scanning system were made in late 1932 and continued for four years. The college used a wood antenna 108 feet high, and was said to broadcast a TV signal to such distant points as Maine and Texas.

In 1935-36, faculty and students constructed an electronic camera, and demonstrated television on a closed circuit system. In 1945, work on a complete television transmitter was initiated.

---

The complete experimental station began operation on Channel 1 as KA2XBD in 1948, and operated experimentally for two years giving broadcasts of basketball and other college events. The discontinuance of Channel 1 for television broadcasting and the freeze on channels caused the station to discontinue broadcasts on March 30, 1950.  

Thus the first attempts at educational television in Kansas came to an end.

Kansas State College would make another bid to enter the television field in the fifties. In late 1949, the University of Kansas made headlines with TV. Using commercially purchased television equipment, the University held closed circuit demonstrations of operations for medical students at the Kansas University Medical Center, Kansas City. The signals were not broadcast, but pictures and sound from the operation room were cabled to large screens, so that a class of medical students would have the opportunity to experience a view of actual surgery. The Kansas City Star hailed the installation as a first in the nation for use of television as an aid to medical education.

Despite the freeze on the processing of educational and commercial television station applications by the Federal Communications Commission, a discussion over channel rights was developing to mark the entry of Kansas into the second decade of

\[\text{Ibid.}\]
\[\text{Ibid.}\]
attempts at ETV broadcasting. As late as 1953, Kansas did not have a single TV station within its boundaries, and only one construction permit to build a station had been granted by the government. This permit was granted on July 23, 1952, to Kansas State College for a non-commercial educational station to operate on Channel 8.\(^5\)

In the densely populated areas of Kansas, channels were in demand. Wichita and Topeka had many applications for construction permits to build TV stations, and hearings to determine which parties would be granted licenses were to ensue. Hutchinson, Kansas, had an application for a TV station, and since the application was uncontested, it was approved first with commercial Channel 12 being assigned.

This authorization resulted in KTVH, Channel 12, which operates in the Hutchinson-Wichita area. The broadcast license of this station is assigned to Hutchinson, and the transmitter is located outside of this city. All major programming, however, comes from a studio in Wichita. Videotape machines, film and slide projectors, and live color cameras are all located in the Wichita studio, with a micro-wave link to the transmitter. The Hutchinson studio has a meager staff and two old image orthicon black and white studio cameras. Most of the station's news and advertising is directed toward the Wichita audience, but to hold the license an early morning fifteen-minute public service program combined with two minutes of local news during the Six

---

\(^5\)Kloeffler and Ford, Loc. cit., p. 3.
O'clock News originate from the studio in Hutchinson.

WDAF-TV, Channel 4, in Kansas City, was on the air, beaming programs into the northeastern edge of Kansas. Kansas City was allotted only one other commercial VHF (very high frequency, channels 2-13) station, and there were many applicants for the frequency.

According to a University of Kansas publication, under proposals of the FCC in effect in 1951, Kansas City was allotted two commercial VHF channels for television, channels 4 and 5. A third VHF Channel 9 was reserved for noncommercial educational use. There were also two UHF (ultra-high frequency, channels 14-83) station allocations to the Kansas City area. WDAF-TV had Channel 4, since they were already on the air. Three Kansas City radio stations submitted plans to the FCC for re-location of channels, and applied for construction permits to get on the television airwaves. The three stations, KMBC, KCMO, and WHB filed a proposal that Kansas City should have four commercial television stations, stressing that this would serve the public needs better than the current FCC allocations.

Channel 5 was available for one station, and the three authored a joint proposal that educational Channel 9 in Kansas City should be made commercial and that educational Channel 11, assigned to Lawrence, Kansas, should be moved to Kansas City and made commercial. The proposal had the support of the President of the University of Kansas City and the local school board; these organizations themselves did not have the funds to
operate an educational station, but they publicly supported the proposal because they felt the public service need of the community demanded more channels. The schools believed they would receive free time for educational TV programs just as they had received free radio time. The proposal asked for the re-allocation of the Lawrence station because the Lawrence public school system budget could not maintain a TV station and the University of Kansas had no funds as yet approved for educational TV by the Kansas State Legislature. The proposal did acknowledge that TV might someday be approved by the Legislature for the University of Kansas and petitioned that UHF channel 64 be reserved at Lawrence for education.6

The proposal for the change of Channel 9 to commercial drew little complaint, but the University of Kansas filed a formal statement with the FCC objecting to moving Channel 11 from Lawrence. The University published a pamphlet setting forth its position and had an authorization from the Kansas State Board of Regents directing the Chancellor of the University to make application for a TV station license.

The results of this FCC hearing are obvious in Kansas City. The University of Kansas position was upheld, and the Lawrence area was to hold Channel 11 for another ten years. KCMO was granted Channel 5, and presently operates TV, AM and FM stations in Kansas City. Channel 9 was converted to commercial television.

---

6 Sworn Statement of the University of Kansas, Lawrence, Kansas, before the FCC, 1951.
purposes and given to KNBC. Metro Media Corporation operated the TV, AM and FM stations until 1966, when the radio stations were sold, and the call letters changed to KMBZ and KMBR-FM. WHB lost the bid for a TV license, and still operates only a radio station in Kansas City.

The development of educational television in Kansas centered once again upon the engineering school at Kansas State College. In 1953, the engineering experiment station issued a bulletin stating how TV could be best employed in Kansas. The booklet was directed toward proposals that would place the greatest numbers of the population of the state within range of educational broadcasts. The existing construction permit for Channel 8 in Manhattan, and the existing allocation of Channel 11 to Lawrence were reasons for considering these two areas the main centers for educational TV. Commercial TV stations at Topeka (WIBW-TV, Channel 13), Wichita (KARD-TV, Channel 3), and Hutchinson (KTVH, Channel 12) were already developing. KTVH ultimately became the first commercial television station on the air in the state, followed by the other two stations. In the bulletin, the experiment station explained the basics of television and outlined several proposals for maximum use of TV, both commercial and educational, in the State of Kansas.

As previously stated, the FCC had approved the request of Channel 8 assigned to Kansas State College in July, 1952. The President of Kansas State, James A. McCain, had filed the application with the FCC on October 4, 1951. The tentative plan in the statement by McCain said the school would apply for a low
power 1-kw TV station construction permit as soon as the FCC invited such applications once again.\textsuperscript{7}

The FCC approved the plan, but two commissioners voted against the action and Commissioner Hyde issued a dissenting statement. His objection was that the financial qualifications of the applicant should be proved before the FCC granted the request. "The State Board of Regents authorized Kansas State College to make application for the station, but have taken no steps toward a budget for construction...indeed, further board action and approval must be gained before the request can be submitted to the State Legislature."\textsuperscript{8} Thus, Kansas State College had the channel, but did not have any funds for operation. The route through the State Legislature to gain funds for operation and implementation of these plans would be a long one.

Plans for television and construction of Channel 8 lay dormant for a few years. President James A. McCain talked with educators at the University of Kansas and at the smaller state colleges at Pittsburg, Hays and Emporia.

The state schools worked on many ideas for educational television. The state was to have an ETV network with only two originating stations, Channel 8 in Manhattan and Channel 11 in Lawrence. Low power repeater transmitters would be located

\textsuperscript{7} Sworn statement of Kansas State College of Agriculture and Applied Science before the FCC, October, 1951.

\textsuperscript{8} Memorandum: Opinion, issued by the FCC, regarding the application of Kansas State College for a construction permit of a new Television Broadcast Station, July 25, 1952.
in the cities of the other state schools. As funds increased, the network would serve the entire population, growing with the addition of new stations and micro-wave relay inter-connections to the far corners of the state.

The Kansas State Legislature was not quick to provide funds to any of the colleges for use in educational television. Kansas State College thought that the benefits of teaching through television should be demonstrated to the Legislature. In 1955, the college designed a proposal for a research project in the use of closed circuit instructional television on the campus to solve a severe teacher shortage problem. This project was simply a proposal to equip a number of classrooms on campus with TV monitors and connect them by cable, not a suggestion for TV broadcasting. College officials felt this system would provide a means for the duplication of a talented teacher to a number of students without resorting to extremely large classes. The college drew a detailed proposal for the closed circuit system and sought grants for the research project. The cost of the demonstration was estimated at $68,561, with Kansas State College putting up $31,000 in the form of the TV equipment already on campus as their share. The college also offered classrooms in Eisenhower Hall and the Air Science Building, with the TV workshop studio in Nichols Gym as the control point. The problem of convincing any State Legislature, and especially the Kansas Legislature, of the acceptability of ETV was the paramount motive of the proposed demonstration.
The project proposal for Kansas State College dwelt at length on this problem of legislative acceptance:

The immediate problem of implementing installation of closed circuit instructional television at Kansas State College, and at other institutions of this and other Great Plains states, is that of demonstrating that such instruction is effective. Legislative bodies throughout the Great Plains have been slow in accepting educational television in any form. For example, although Kansas State College was the first to receive an educational television construction permit from the Federal Communications Commission, lack of legislative action has made its installation impossible to date. Similar lack of legislative support in other Great Plains States has paralleled experience in Kansas. Kansas State College believes that there is an urgent need to successfully demonstrate to legislative bodies in the Great Plains, and particularly in Kansas, that closed circuit television is an effective solution of the problems confronting state educational institutions. In the judgment of the College, there is a very real danger that legislative support for its installation cannot be expected in Kansas until such demonstration has been made.9

Money for such a proposal never arrived but, in spite of this, Kansas State College kept trying for ETV. Plans were incorporated using rooms in Nichols Gym for various phases of TV work. At one point, room 207 of Nichols was advocated for a TV studio, with a transmitter in the southwest corner of the room and a small control room. Rooms in Nichols Gym (108, 109 and 110) were desired for TV use as offices, a film library, and engineering space.10 Proposals centered on using these

9 Proposal of Kansas State College, Manhattan, Kansas, for a research grant for a project in the use of Closed Circuit Instructional Television, 1955, p. 3.

10 Max W. Milbourn, Assistant to the President, Kansas State College, interview at Kansas State, March, 1968.
areas, but all were rejected for lack of funds to carry out the projects. The Kansas Legislature had to appropriate funds for ETV.
CHAPTER II

THE SECOND ERA OF ETV IN KANSAS

Educational television in Kansas was trapped in a vicious circle; the Legislature would not appropriate any money unless the value of ETV could be proved, and no proving could be attempted without some funds to allow experimentation. The lead in a story of the Kansas State Collegian proclaimed: "Educational television may become a reality in Kansas by the end of the summer if the Kansas Legislature appropriates $1 million for a proposal by the Presidents of the five state schools," President McCain said yesterday. 11

The proposal was submitted to the Kansas Legislature in January, 1955, but did not win approval. The idea was for "the State of Kansas to finance the building and operation of a statewide system of non-commercial educational television stations, for the preparation and distribution of educational, cultural, and informational programs to all the schools and to all the homes of Kansas." 12 The proposal, long and detailed, was written to convince the Legislature to act swiftly on ETV. In


12 Proposal of the Five State Colleges in Kansas To the Kansas Legislature, 1955, p. 1. (For complete text, see Appendix I.)
October, 1956, the colleges were warned by the FCC that some action must be forthcoming to hold the channels open for educational use. The demand for channels (VHF in particular) far exceeded the supply, and the FCC requested immediate action or Kansas would lose ETV channel allocations either out of the state, or to commercial use.\(^\text{13}\)

The proposal was of value, many legislators thought, but it was a good example of poor timing. Kansas had a new Governor, and he advocated analysis and complete revision of the tax structure of the state. The Governor requested all state educational institutions to operate on austerity budgets for 1955, and promised more money and a possible look at ETV in 1956.

Wichita had a UHF television station carrying NBC programs to that area. The station manager, Stanley H. Durwood, tried to convince the FCC to move the educational allocation of Channel 8 in Manhattan to Wichita and make it commercial. He offered Channel 58 in lieu of Channel 8 for the Manhattan educational station. His appeal was based on the fact that the FCC had made several such changes recently in some markets because the educational channels were not being used, and also because the competition between a commercial VHF TV station and a commercial UHF station was usually too great in favor of the lower channel operation.

\(^{13}\)Ibid. p. 12.
page statement to the FCC and twenty-three attached exhibits to support claims to the channel. A history of all the television and radio activities of Kansas State College was for the first time presented to the FCC. All of this history has been related previously in this thesis, except mention of the installation of a closed circuit color television system used by the School of Veterinary Medicine for studying surgical operations in its clinics.

The next phase of the reply to the FCC dealt with reasons why ETV had not been implemented in Kansas and with the future. Kansas State College said, "the Legislature in the 1953 session let the TV bill die by adjournment because of (1) confusion caused by issuance of the controversial New York report, (2) ignorance of television's potential in an area without television, and (3) lack of specific figures (based on experience) on the cost of future operation of educational television stations."14 The appeal contained an exhibit letter to the FCC from Kansas Governor Fred Hall favoring ETV in the future, but stating that costs were prohibitive for 1955.

The final note in the Kansas State reply came in refutation of Mr. Durwood's own argument. The college said that 99 per cent of all families owning television sets within KEDD's (Durwood's Wichita UHF station) service area had UHF on their sets. This

14Opposition of Kansas State College of Agriculture and Applied Science to Petition for Rule-making Proceedings by Stanley H. Durwood and Order to Show Cause, Sworn Statements before FCC, February 16, 1955, p. 10. (For complete text, see Appendix II.)
data was gathered from Durwood's own statements. KEDD also had the NBC network affiliation and received advertising profits from the network.¹⁵

The FCC ruled in favor of Kansas State College, and the plans for a state-wide ETV network were rolling again. The schools banded together to attempt to win public support and convince the 1956 Kansas Legislature to provide funds for the project. The Durwood station eventually ceased operation and KTVH bought the building and tower and moved their studio operation to Wichita. Channel 3 in Wichita (KARD) took over the NBC program rights and network affiliation.

After the Durwood-KEDD case was resolved, the FCC was again forced to ask Kansas what they were going to do about ETV. The state had to ask for more time and employed delay tactics, showing good intentions but no money. The FCC accepted these promises, and allowed school officials to plan proposals.

Public support for ETV began to increase. The state PTA organization, the American Association of University Women, the League of Women Voters, as well as the Kansas State Teachers' Association, all began to push the ETV movement. In late 1956, a Citizens' Committee on Educational Television for Kansas was formed in the capital city of Topeka. Oliver Ebel, the Executive Secretary of the Kansas Medical Society, became chairman of the citizens' committee. A drive through civic and professional

throughout the state was aimed at gaining public and legislative support for ETV. Ebel declared "we expect a proposal to be introduced in the 1957 session of the Kansas Legislature. The proposed eight-station system was adopted by the citizens' group following recommendations based on several years of study by a joint television committee of the five state colleges." The group wrote press releases and sent out mats of maps to be reproduced explaining ETV through all the newspapers of the state. The same proposal made earlier by the five state schools was revamped slightly and presented in an attempt to get money from the Legislature. The Legislature chose not to adopt the proposal. (For complete information in regard to Legislative action see page 1, Appendix IX.)

Kansas State College conducted a survey of schools that had television stations on the air or had construction in progress. This survey was made to determine the kind of budget questions and policy matters facing schools with ETV services. The results of the survey were confidential in nature and were not published, but results were given to the Kansas Board of Regents.

The report proved many of the midwestern states were active in ETV. WOI-TV at Ames, Iowa was on the air as a commercial television station. The license belonged to the University, and much educational programming was carried. The University of Nebraska had educational station KUON-TV on the air, while

16 Press Release by Citizens Committee for Educational Television in Kansas, 314 West Fourth St., Topeka, Kansas, December, 1956. (For complete text, see Appendix III, p.104.)
Oklahoma had stations under construction in Tulsa and Oklahoma City. The results of the survey set the absolute minimum necessary to operate a station for one year at $200,000. A check of directories of stations in the United States reveals that Colorado had station KRMA in Denver on the air at the time the survey was made. This means that as early as 1956 Kansas was surrounded on all sides by educational television, but had taken no direct steps to construct educational television stations.

It must be noted that while results of the Kansas State College survey revealed it would be possible to operate a single low-power television station for $200,000, this sum was not recommended as a real or adequate figure for the programming contemplated. All of the proposals had suggested not just one station, but the gradual establishment of a state-wide educational television network. Only Manhattan and Lawrence were to have full studios and equipment, with other stations rebroadcasting their signals. The proposals included the construction of these two stations and an expansion plan of a station a year for nine years. The other proposed station locations and the order of building were: Hays, Colby, Garden City, Pratt, Wichita, and Chanute.

The Board of Regents now had some facts about the cost of operating even one station in the state. They voted in favor of ETV and again advocated that funds for television be made available.

17 Conclusions of a survey (unpublished) conducted by Kansas State College, Dr. Forest Whan, late 1956, p. 1.
able by the Legislature, but without taking funds for such a project from any of the institutional budgets. The Legislature decided the issue might have some merit. In the 1959 session, they appropriated $25,000 for an exhaustive legislative-sponsored study of educational television. 19

Even before the Legislature decided to take this step, ETV was not dead in the state. Much use was being made of closed circuit equipment. Kansas State University had the largest amount of equipment and a curriculum in radio and television, as did the University of Kansas. In other areas of the state closed-circuit television was being used:

Among the public schools, the Wichita system carried on a program in four elementary schools under a Ford Foundation grant. They next experimented with closed circuit in the same elementary schools, then shifted their CCTV experimentation to one of their high schools for several years. Kansas State College of Pittsburg has experimented with closed circuit in teacher education since 1954. Kansas State Teachers College of Emporia and Parsons State Hospital also have used closed circuit TV. 20

From 1950-1959, ETV was supported in Kansas, but could never get on the air because of financial problems. The second era of Kansas television had come to an end, and the future of educational television was still undecided.

19 Text of a statement made by Max W. Milbourn before the Subcommittee on Communications and Power of the Interstate and Foreign Commerce Committee, Kansas State Legislature, Nov. 3, 1959, pp. 2-3. (For complete text, see Appendix IV, pp. 105-108.)

CHAPTER III

THE THIRD ERA OF EDUCATIONAL TELEVISION IN KANSAS

The third era of ETV history in Kansas began with the longest step yet toward a successful television network. The money granted by the 1959 Kansas Legislature for a study of ETV was used in 1960. The survey took nearly nine months and covered every angle of ETV. The 109-page report was submitted in late September by the director of the survey, John C. Schwarzwalder. The study made many recommendations, some of which differed from the aforementioned proposals of the five state colleges. The Schwarzwalder study mentioned using engineering consultants and recommended that the number of transmitting stations be cut to six. The chief differences in the proposals concerned the two largest state institutions of higher learning: the Schwarzwalder study proposed moving Channel 11 from Lawrence to Topeka and Channel 8 from Manhattan to Hutchinson. (For proposed locations of the other stations, consult the map in the appendix.) For technical reasons, the transmitters were to be placed at the best locations providing maximum available radiation to the population of the state.

Programming, however, was to come from another source: the eight production centers throughout the state. The Topeka station was to be the only place where offices, production equipment,
and transmitter would be in the same building. Major program production centers were to be located at Wichita, Manhattan, and Lawrence. Other production centers were to be at Hays, Pittsburg, Emporia, Topeka, and Kansas City. The report said that the difference between a major and a minor production center was primarily one of the amount of studio floor space. The major centers were to have two film projectors on their film-slide camera chain, as compared to one projector at the minor centers. Each major center was to have two image orthicon studio cameras and one video tape recorder. A massive microwave relay system was designed to interconnect all the stations, as well as to provide a link between production center and transmitter. Each of the microwave relay points required a building. The major production centers were to be located outside of the towns to which they were assigned, not on the college campuses. The study recommended that the entire ETV project should be built as a whole unit and urged that the stations should not be funded on a piece-meal basis. The cost for this ETV system was fantastic: $6,752,877.64 for initial costs, with an additional $710,000 for operational costs during the first two years. 21

Aside from the problems of legislating a budget at this figure, much comment and criticism about other aspects of the report were raised. Dr. Forest Whan of Kansas State University

21 John C. Schwarzwalder, A Survey and Report Concerned with the Feasibility of an Educational Television Network for the State of Kansas, September, 1960, pp. 9-18. (Maps from this study are in Appendix V, pp. 109-110.)
raised some of the most serious objections. He joined with Max W. Milbourn, Assistant to the President of Kansas State University, in expressing criticism of the survey and prepared a Summary of Differences. Dr. Whan had worked on proposals for ETV for more than seven years, and was familiar with the work of the Citizens' Committee in Topeka. They questioned the wisdom of building everything at once, of using a micro-wave system of interconnection rather than mailing films and video tapes, and of placing production centers off-campus, at a distance from the source of manpower, thereby making the network more expensive. They also criticized Schwarzwalder's oversight in omitting to provide for a remote truck.22

The elimination of TV transmitters at Lawrence and Manhattan was accepted, providing programming came from the two cities. There was no objection to the proposal to remove Channel 11 from Lawrence to Topeka, because of an advantage to the proposed ETV system contained in the following circumstances. The transmitter of the commercial station in Topeka (WIBW, Channel 13) was located on the northwestern edge of the city. The signal into Kansas City was poor, and the metropolis was already served by three network commercial stations. The signal from WIBW was too powerful for outdoor antennae in Topeka, and so the station management decided to move the transmitter away from Topeka to the west to

22 Proposal for Kansas Statewide ETV Network, A Summary of Differences to the Schwarzwalder Survey, November, 1960. (See Appendix VI, p. 111.)
get better transmission in Topeka as well as better coverage into the Manhattan-Junction City area. The commercial station offered this transmitter, tower, and building for the start of an ETV network. This circumstance was mentioned in the Schwarzwalder report and the acceptance of the offer was recommended.

Another circumstance advantageous to the establishment of an ETV network was the fact that WIBW radio and Kansas State radio, KSAC, were already cooperating in bringing educational radio programs to the public. KSAC operates from 12:30 to 5:15, Monday through Friday, on the frequency of 580 kc, sharing the time and frequency with WIBW radio in Topeka. WIBW and KSAC have shared time for years, with each having a transmitter and complete facilities to enable them to go on the air anytime— but on the same frequency. Kansas State University is a land-grant school and uses KSAC in its extension information work with the public. WIBW is a commercial fulltime 24-hour-a-day operation, except for the block of weekday afternoon time taken by KSAC.

Despite disagreements over the Schwarzwalder survey, it was the most comprehensive view ever taken of educational television in the Sunflower State. Schwarzwalder had submitted the survey results to the Legislative Council on November 16, 1960, and received permission to submit the report directly to the 1961 Legislature.

The Kansas Senate Committee on Education introduced two

---

23 Robert Kearns, Sales Manager, WIBW-TV, interview held in June, 1968.

24 Ibid.
bills in the 1961 Legislature that would have created the television authority and given it one million dollars with which to operate for one year. The bill was passed by the Senate, and was reported favorably by the House Committee on Education; however, the bill was also referred to the House Ways and Means Committee, where it died in committee.25

The result was that Kansas had a fine ETV plan, but could not provide funds for it. Of the 1959 appropriation of $25,000, a meager amount remained. The Legislative Council and the Senate Committee on Education were in favor of ETV and the remainder of the funds were used to petition the FCC to reserve the channels in Kansas. Since Kansas had made no progress toward putting ETV on the air, commercial interests within the state wanted some of the channels. The State of Nebraska had made plans for their present state-wide educational network, using KUON-TV as the base station, and wanted some of the frequencies assigned to Kansas; Nebraska filed an application for them with the FCC. A commercial broadcaster in Nebraska had asked the FCC for Channel 4 for use as a commercial station in Superior, Nebraska. Kansas had intended to use Channel 4 in the Grainfield area to reach all the residents of northwestern parts of the state. This frequency was a vital link in the proposed ETV system. These requests to

---

25Educational Television, Status and Prospects, Research Department, Kansas Legislative Council, Publication No. 239, Jan., 1963, p. 2. (For ETV Legislative History, see Appendix IX, pp. 117-121.)
the FCC for Kansas channels began in December, 1961, when Bi-States Broadcasting Company of Kearney, Nebraska, asked for Channel 4.  

The 1961 Kansas Legislature had let ETV pass by without voting on the issue. The Education Committee of the Legislative Council knew it was the only remaining source of opposition to the loss of these channels to Kansas:

The committee was faced with a real dilemma. The possibility existed that the potentially valuable VHF channels constituting the proposed Kansas network might be allocated to other applicants, and would not be available at the time the legislature was ready to take action... This necessitated efforts to oppose the plans of other parties interested in the same channels.  

The Committee was able to tie up FCC action on the proposals from January, 1961, to December 17, 1962. During this time, they used funds remaining in the original $25,000 appropriation to hire consulting engineers to bolster the Kansas proposal. Channel 4 was requested by Nebraska for an educational station at Kearney, by Kansas for an educational station near Grainfield, by Bi-States Television for a commercial station at Superior broadcasting programs out of the commercial station in Kearney. In order to secure the necessary channels, the Kansas-employed engineering firm headed by John B. Heffelfinger had no choice but to unveil the Scharzwald survey to the FCC and to

---

26 Ibid., p. 3.
27 Ibid.
28 Ibid., p. 12.
request that the engineering proposals in it should be enacted. The engineering statement is reproduced in full in Appendix VII for detailed study, but the solutions are easily comprehended.

The survey had already moved the Channel 3 allocation in Kansas to the southwestern part of the state, so the engineering firm proposed to give Nebraska a Channel 3 rather than a Channel 4 allocation; the Kansas transmitter would be too far south to interfere with any transmission in Nebraska. Also, with Channel 8 relocated farther south in Kansas at Hutchinson, the Nebraska Channel 8 would be freer to extend their coverage. Nebraska television personnel liked this proposal and agreed to it.29

Engineer Heffelfinger could not resolve the direct conflict between the Kansas ETV Channel 4 at Grainfield and the proposed Nebraska station at Superior. The FCC had always decided in favor of Kansas ETV operations before, but this time they could wait no longer. The application of the commercial station was accepted and Kansas was given a substitute UHF Channel 33 at Oakley, Kansas. "As proposed by the committee, Channel 11 was reassigned from Lawrence to Topeka; Channel 8 was reassigned from Manhattan to Hutchinson; Channel 9 was assigned to Lincoln, and Channel 3 to Lakin (Garden City area)."30 For the sixth TV station proposed in the Schwarzwalder study, Channel 16 was to

29 John B. Heffelfinger, Engineering Statement, May 19, 1961, pp. 1-3. (For complete text, see Appendix VIII, pp. 112-114.)

30 Educational Television, Status and Prospects, Loc. cit., p. 22.
be moved to Chanute; the FCC instead inserted Channel 21 in that city.31

Thus, without legislative approval of funds or consent, Kansas had in fact adopted the Schwarzwalder survey, and would have to use these channels in future ETV plans. "To be in a position to exert any further effort necessary to defend the channel assignments from any possible attempts to deprive Kansas of the channels assigned as of December 17, 1962, the Committee on Education obtained from the Legislative Council authority to be continued throughout the 1963 Legislative session."32

The time had to be now or never for state-wide ETV in Kansas. The majority of people in education were for getting ETV, but the bill for it seemed large to the average taxpayer. Max Falkenstien, General Manager of radio station WREN in Topeka, spoke out against ETV because of its cost:

Educational television to me is similar to reducing taxes—everyone would be for it if we had enough money—but we don't. Of course, it would be nice to present educational programs over the taxpayers' own television network, but to me this is just another expensive step toward big government in business which I don't approve—not when the salaries of our teachers are outrageously low, not when our higher institutions are losing top people to other major schools because salaries are not competitive, and not when we need so many physical improvements in our public schools.33

31 Ibid.
32 Ibid., p. 23.
33 Max Falkenstien, statement over WIBW, October, 1962, in the third show of a six-part series on ETV. Distributed in print by WIBW.
Max Falkenstien's comments were made on a program aired by WIBW in October, 1962. Thad Sandstrom, General Manager of WIBW, was strongly in favor of educational television, and carried a special six-part series of broadcasts on the subject of ETV. In reply to Mr. Falkenstien's argument about high cost, Mr. Sandstrom said "ETV has never claimed to lower costs, although in some areas of the country it has done so. ETV is merely a classroom tool to be used by the teacher, and all tools cost money. There are disadvantages to many new tools until they are used properly....the advantages of educational TV, according to its proponents, far outweigh the disadvantages."34

Since 1953, the schools had pushed for their moment. The Legislature had to act on the issue, or face the loss of channel allocations and the complete elimination of state-wide ETV as proposed by the Schwarzwalder survey. The Legislative Council provided each member of the Kansas House and Senate a booklet explaining the Schwarzwalder study and the actions leading to this point. (A complete explanation of all ETV actions by the Legislature is to be found in Appendix IX of this thesis.)

After a delay of two years, the final action was anticlimactic. The bill for state-wide ETV was introduced in the 1963 Legislature. It passed through the Senate and came through committee to the Kansas House. In the 1963 House, the ETV bill lost by one vote.

Dr. Forrest Whan had the opinion that the Presidents of the

34 Thad Sandstrom, Ibid.
two largest state schools were not in favor of educational television at the time it came to a vote in the Kansas House. He believed "K-State President James McCain asked some House members to kill the bill because the money would result in less funds being available for the operating budgets of educational institutions in Kansas." Dr. McCain asked Dr. Whan not to bring the ETV issue before the Legislature again. This series of events probably ended all hopes for a state-wide state-supported ETV system in Kansas.35

35Dr. Forest Whan, Professor of Radio-TV-Speech (retired), Kansas State University, interview in Manhattan, June, 1968.
CHAPTER IV

WASHBURN UNIVERSITY TAKES THE AIRWAYS

Even though state support for educational television seemed a dead issue, dreams of ETV still lingered in the minds of some people in education in the state. The two largest cities in the state of Kansas are Wichita and Topeka. WIBW had offered their old transmitter and tower for ETV use as soon as a new one was complete near Maple Hill, Kansas. A similar situation existed in Hutchinson. KTVH, Channel 12, was also building a new transmitter and tower. The new location was directly across the highway from the old building, a few miles outside of the city. The possibility of using the old KTVH equipment was explored as early as February, 1963, by Kansas State University. (This was the same school, Kansas State College, that had been active in ETV since 1932; the change of name reflects a change in status.) KTVH proposed to lease the equipment to an ETV system for $30,000 a year, with an option to purchase after six years for the price of $500,000.36

After the nay vote in the Legislature, the issue remained dormant for a few months. The fact remained that two old TV

36Letter from Dale Larsen, Vice President and General Manager, KTVH, to Kenneth Heywood, Director of Kansas State University Endowment Association, February 13, 1963. p. 1.
transmitters could provide ETV for most of the population of the State of Kansas. Washburn University, a small municipal university in Topeka, considered this challenge. The Garvey Foundation of Wichita asked Washburn about the possibility of activating the two TV transmitters. The plan called for a station in Topeka, using the frequency of Channel 11, with facilities necessary to originate local programs as well as the equipment needed to rebroadcast programs on film or video tape. The old KTVH transmitter in Hutchinson would serve as a satellite of the Topeka station and would rebroadcast programs coming from Channel 11. There was to be a micro-wave link between the two stations, but no programs were planned to originate from Wichita.\(^{37}\) Harold Sponborg, the President of Washburn University, proposed that the operation could get on the air for $255,500, and wanted to make the ETV fund a line item in the Washburn Fund for Economic Education.\(^{38}\) Willard Garvey was interested in educational television and offered a grant of $25,000 to cover the expenses of a salary for a director, a secretary, and a budget for general operations to explore the Wichita-Topeka idea.\(^{39}\) This study was to run from September 1, 1963, to September 1, 1964. Willard Garvey was in the television business (KKTV, Colorado Springs)

\(^{37}\)Letter written by Harold E. Sponberg, President of Washburn University, To Clifford Allison, Garvey Foundation, Wichita, Kansas, July 24, 1963.

\(^{38}\)Ibid.

\(^{39}\)Letter written by Harold E. Sponberg to Mrs. Olive W. Garvey, July 29, 1963.
and wanted to speed ETV to an air date of September 1, 1964.  

Washburn was also anxious to get an ETV station on the air, and the University moved quickly to find consultation. The University Public Relations Director was a former Topeka radio man, and he was assigned to work on the ETV project. Thad Sandstrom, General Manager of WIBW-AM-FM and TV, agreed to offer help and advice to Gerald Barker, the new director of the project. David L. Steel and Associates, consulting engineers based in Washington, D. C., were hired by the University for a fee of $600 to do an engineering assessment of both Channel 11 and Channel 8.

Washburn was pressing to get the ETV situation resolved before either KTVH or WIBW sold any of the old equipment. After employing an engineering firm, the university employed a law firm. The choice was Theodore Baron of Scharfeld, Bechhoefer, Baron & Stambler with offices in Washington, D. C. The letter of authorization to proceed with work on the Kansas ETV case said "although it would be desirable to have all application data for Channel 8, Hutchinson, available simultaneously, there are some problems yet unresolved which judiciously preclude formal action on Channel 8 at this time." The first objective of Washburn was to provide broadcasting in its home city, Topeka.

---

40 Letter written by Willard W. Garvey to Dr. Frank Stanton, President of CBS, July 24, 1963.


43 Ibid.
Both of the commercial stations were pressed for time. Both stations had new Radio Corporation of America (RCA) transmitters, and some of the used equipment had been traded to RCA. Because of the unresolved Kansas ETV situation, RCA was unable to get title to the equipment. It appeared on the RCA inventory books, but they were unable to offer it for sale because of the possibility that it might be used for Kansas ETV.44

The race for channel space was again hurting the interests of ETV because of the lack of action in Kansas. KTUL-TV in Tulsa wanted to move their transmitter and tower further north. The distance between the old KTVH and the KTUL TV transmitters was already under the minimum required separation by two miles. If the Tulsa transmitter were moved farther north, the Kansas transmitter would also have to be moved farther north. Kansas would lose the old KTVH tower and a waiver by the FCC would then be required. So Washburn pushed harder.45

The engineering firm determined the fair market value of the equipment at the old WIBW-TV site, and submitted the price to Washburn. RCA estimated that it would cost about $16,000 to change the Channel 13 transmitter and antenna to Channel 11.46 Washburn then proceeded through attorneys to get a grant from the Department of Health, Education, and Welfare in Washington.

---

44 Letter from RCA to Thad Sandstrom, August 27, 1963.
45 Letter from David Steel and Associates to Thad Sandstrom, August 28, 1963.
46 Letter from RCA to Gerald Barker, Washburn University, September 3, 1963.
The application to the FCC for the broadcast license was started.

Cerry Barker of Washburn commented to the attorneys:

We have attempted to list the financial qualifications. We expect no state, county, or municipal appropriations, but we do hope to interest schools, colleges, and universities to provide a minimum of $50,000. Washburn has on hand now $25,000 from the Garvey Foundation with an equal sum anticipated later. We are assuming that there will be little or no civic participation other than that which is listed...as individual donations. Project income is based on services rendered in the preparation of programs, tapes, and course materials/textbooks. Please note that we have anticipated a total income of $115,000, which exceeds our estimated expenditure of $110,000.47

The possibility of operating Channel 8 looked dim at this time. The Cowles Publishing Company, owner of KTVH, did not accept the Washburn proposal, and thought the station would be better off financially to sell out to RCA.48

The next slowdown came from John O. Allen, the owner and manager of an airport for small private aircraft in Topeka. The old WIBW tower is two and one-half miles from the airport and just to the left of the centerline of the runway. WIBW had agreed to dismantle the tower when the new one was completed. The continued existence of a 1,000-foot tower at the end of the runway was enough to make Mr. Allen complain to the FAA.49 WIBW had been given 90 days to dismantle the tower, but continued extensions averted this action.

47 Letter from Gerald Barker, Washburn University, to Ted Baron, September 19, 1963.
48 Ibid.
While Washburn and the FAA had hearings and postponements, RCA was growing tired of waiting for the KTVH equipment. RCA delivered the ultimatum to KTVH that they must turn over the old transmitter equipment by November 15, 1963, or the trade-in agreement would be cancelled and KTVH would be billed for the trade---$65,000.50

The Wichita Eagle editorialized in favor of ETV:

Barker says it will be possible to put the Topeka station into operation with no cash on hand beyond an estimated $150,000 in operating expenses for the first year. The terms of Washburn’s agreement with WIBW call for $245,000 in payment for it---$122,500. That will go to WIBW as down payment.

The balance will be in 10 one-year notes without interest. In any year that Washburn is able to pick up three of these—a sum of slightly more than $37,000—WIBW will forgive the balance of the debt.

In addition to newspaper support, Washburn began to collect support where it counted: from the schools that would pay to subsidize the ETV operation. The University held a luncheon-

---

50 Letter from RCA to Dale Larsen, KTVH General Manager, October 31, 1963.

51 "ETV Will End Here Next July---Unless...,” Editorial, Wichita Eagle, November 7, 1963, p. 4A. (For complete text, see Appendix VIII, pp. 115-116.)
discussion meeting on December 6, 1963, to involve various educational institutions in the Channel 11 viewing region. This was the first formal effort to organize a non-profit council for the purpose of supporting ETV on Channel 11 in Topeka.52

The application to the FCC for a construction permit for Washburn University still had not been filed in Washington. The Garvey Foundation began to wonder about the delay and Washburn revealed that the problem was that attorneys thought that the FCC would not approve the application because of lack of true financial support.53 In order to acquire Federal matching funds from HEW, a new organization that included educational, cultural, and civic groups had to be formed. HEW would not consider Washburn University as a source for the matching funds.54 The Garvey Foundation made a grant to the Washburn Fund for Economic Education in the amount of $150,000, thus allowing Washburn to begin the application to the FCC.55 Costs for education in general were on the rise and Washburn could no longer subsist on municipal taxes. Washburn began to receive money from the State of Kansas.56

52 Letter by Gerald Barker to Thad Sandstrom, November 13, 1963.
54 Letter from Ted Baron to Gerald Barker, March 12, 1964.
55 Letter from Garvey Foundation to Washburn University, April 16, 1964.
56 Letter from Washburn University President Harold Spen-berg to Garvey Foundation, May 22, 1964.
The next delay in the building of ETV in Kansas came from the Department of Health, Education and Welfare in Washington. The President of Washburn University declared in July, 1964, that the only obstacle to ETV operations now was the HEW representatives.57 Finally in April, 1965, HEW approved the Washburn request. The Topeka State Journal said: "About two years of work and worry on the part of groups interested in establishing an educational television station in Topeka began to seem worth the effort this week with the approval of a $229,449 federal grant. Federal Communications Commission approval is expected to be a matter of routine."58

Equipped with something no other ETV interest group in the history of the State of Kansas ever had before—money—Washburn proceeded about the business of getting on the air. The FCC approved the new ETV station as a full-power operation with an assigned frequency of Channel 11.59 The University then hired Ian N. Whooler to be the first full-time director of the new station. The university requested the call letters "KTWU" of the FCC.

While Washburn appeared to be moving along with educational television, the Wichita newspaper carried a story about ETV in May, 1965. The Garvoy Foundation had purchased the old KTVH

57Letter from Harold Sponberg to Thad Sandstrom, July 2, 1964.
59Telegram from FCC Secretary to Washburn University, May 14, 1965. (A copy of the telegram is in Appendix X, pp. 122-123, to show the technical data.)
tower, transmitter, and building at Hutchinson. Money was needed for a micro-wave hook-up to carry the ETV programming of KTWU in Topeka. The Wichita station would be owned and operated on a non-profit basis by a local community group. The paper then editorialized in favor of ETV and attempted to gain public support for educational television in Wichita. Wichita, as of June, 1968, is still lacking an educational television station.

In July, 1965, a controversy arose over the need for ETV facilities in Topeka. The Washburn Board of Regents was presented with two alternatives for the physical plant to house the station: the Regents could approve a fourth-floor addition to the new Fine Arts Center to be built on campus (financed by $500,000 from the Garvey Foundation), or a one-story addition to the existing tower-transmitter building in northwest Topeka. The two proposals are included in Appendix XIII for closer examination; the result, however, was that the Board decided to let the ETV station operate totally from the old transmitter building. This suggestion came from Thad Sandstrom in a letter to a Board member.

60 "ETV Station Plan Revealed for City," Wichita Beacon, May 29, 1965, p. 1. (Complete article in Appendix XI, p. 124.)

61 "Chance for Educational Television Depends on Individual Effort," Editorial, Wichita Sunday Eagle-Beacon, June 6, 1965. (The complete text is in Appendix XII, p. 125.)

62 Memorandums of Philip Lewis and Ian Wheeler regarding the TV station at Washburn University, July, 1965. (The complete text is in Appendix XIII, pp. 126-135.)

63 Letter from Thad Sandstrom to Philip Lewis, July 30, 1965. (In Appendix XIII, Ibid.)
The Garvey Foundation wanted to be certain that ETV would be able to grow and took steps to insure this. The Foundation ordered $150,000 withdrawn from the $500,000 pledge towards the new Fine Arts Building at Washburn; this money was to be used for separate ETV facilities.\(^4\)

The meager equipment needed to rebroadcast programs was obtained on a lowest-bid basis. The University purchased one Sarkes-Tarzian film chain along with two projectors and dual slide drums. Two Ampex 1100 tape machines were added to a Sarkes-Tarzian operational video switcher. The University already had a Gates audio board which was moved to the new TV station. Transmitter and antenna changes from Channel 13 to Channel 11 were done by RCA.\(^5\)

KTWU inaugurated full operation on October 21, 1965. Its service currently extends from 9:00 A.M. to 3:15 P.M., Monday through Friday, for School Services, and from 5:30 P.M. to 9:00 P.M., Monday through Friday, for Community Services. The station will expand both daily programming and initiate weekend schedules at such time as community financial support will permit. Annual operating costs are currently budgeted at $100,000 per year.\(^6\)

The technology of the world is always changing, and television is not exception. Community Antenna Television Companies

\(^4\)Letter from Garvey Foundation to Board of Regents, September 10, 1965. (The complete text of this letter is in Appendix XIV, p. 136.)

\(^5\)Letters from RCA to Washburn regarding changes from Channel 13 to Channel 11, September 3, 1963. (The complete text is in Appendix XV, pp. 137-139.)

\(^6\)Throckmorton, Loc. Cit., p. 2.
(also called CATV and Cable TV) were being formed in Kansas.

CATV is a business that imports TV signals by means of microwave or by taking the signals off-air from a large tall antenna. The signal is then cabled to the subscribers' TV sets for a monthly fee. CATV in Kansas provided KTWU with a potentially bigger audience and thereby made the station more truly statewide than ordinarily could have been possible from the Topeka transmitting location. Channel 11 tries to get cable companies to carry ETV programs since KTWU is the only educational station in the state.67

KTWU had been on the air only a short while when financial troubles began to plague the station. The station had planned to attempt to get more money for future expansion from the federal government, but a ruling of HEW limiting money to existing educational television stations hastened Washburn toward consideration of expanding the facility. The station embarked on a $40,000 capital fund-raising effort and requested old used equipment from midwest broadcasters. Thad Sandstrom was asked to contact the commercial stations in the area.68

In addition to the appeal to commercial TV stations for

67 A copy of one such letter about cable TV activities is in Appendix XVI, p. 140.

68 Letter from Ian Wheeler to Thad Sandstrom, November 23, 1965. (A copy of the letter is in Appendix XVI, pp.141-145.) Also included in the appendix is a list of the stations Mr. Sandstrom contacted, a list of equipment desired, and a copy of the letter sent to each station.
equipment, KTWU also sought support from individual viewers in Topeka. The Topeka Daily Capital carried the story:

Contributions to support the evening program schedule of Washburn University's educational television station, KTWU, Channel 11, are on the upswing, Ian N. Wheeler said Monday. The state's first ETV station began a fund-raising drive Jan. 17. Wheeler, ETV director, said it would continue until late next month. Television and radio stations and newspapers in Northeast Kansas have been asked to promote the ETV station's campaign. Wheeler said mail contributions have increased four-fold since the project got underway.

Next week 25,000 letters will be sent to Topeka householders asking their support of the adult programming during the evening hours.

Since no tax money may be used to support the night programs, the station must rely on contributions from individuals and business firms for its life. If contributions fail to support the schedule, night-time programs will be discontinued, Wheeler said.

Subscriptions range from $5 for individuals to $100 patron contributions.69

Part of the financial problem occurred because the early estimates of school district enrollment and participation were too high, and KTWU depends upon participation of the schools for a large part of its income. The station was in danger of going off the air only three months after the first broadcast.70

Stauffer Publications, the owner of WIBW, rescued KTWU with a financial gift of $25,000. "Without this gift, we would now


70"ETV Finance Trouble Told," Topeka Daily Capital, January 27, 1966. (A copy of the story is in Appendix XVIII, p. 146.)
be black; and you may rest assured that we will make every effort to press this campaign for additional funds," said a member of the Washburn Board of Regents in a letter to Thad Sandstrom.\(^71\) A more complete picture of the total ETV financial situation appeared in a story in the Topeka Daily Capital concerning attempts to get local businessmen to support KTWU. KTWU also used the occasion to announce the gift of a $16,000 used color film chain from Metro Media, owners of KMBC, Channel 9 in Kansas City.\(^72\)

Washburn again asked Thad Sandstrom to help educational TV efforts in May, 1966. Sandstrom contacted a dozen of Topeka's business leaders in an effort to gain financial support from business. The goal was $10,000, with WIBW offering $1,000 if the other businessmen would provide the rest of the money between them.\(^73\) The plea for local business support came at the worst possible time. On the night of June 8, 1966, tragedy struck the city of Topeka and Washburn University in particular. A tornado swept through the city. The Washburn campus was directly in the path of the tornado; eight buildings were destroyed, along with substantial damage done to every structure on the campus. The pictures of before and after the tornado in Appendix XXI lend

\(^71\)Letter from F. G. Weidling to Thad Sandstrom, January 31, 1966.

\(^72\)"Appeal for ETV Finances is Made," Topeka Daily Capital, February 24, 1966. (A copy of this story is contained in Appendix XIX, p. 147.)

\(^73\)Letter sent by Thad Sandstrom to a dozen prominent Topeka business leaders, May 12, 1966. (A copy of one such letter is in the Appendix XX, p. 148.)
Graphic proof to the damage.\textsuperscript{74} KTWU was on the opposite edge of the city and was not damaged, but the source of revenue expected from individuals and businessmen was cut off.

A combination of federal disaster relief, business gifts, individual contributions, and state funds allowed Topeka, Washburn University, and KTWU to survive. Channel 11 continued to operate with a meager staff and to broadcast programming that was prepared elsewhere. In September, 1967, a new director took over KTWU, and the ties between Washburn and WIBW became closer. Washburn thanked Thad Sandstrom for his efforts on behalf of the University with a Distinguished Citizens Award.\textsuperscript{75}

The ETV station in Topeka looks as if it will survive and even expand. A new building is currently in the final planning stages, to be constructed on the campus at Washburn. It will provide studio, control, and office space for the ETV project. Efforts are continuing in Wichita to get Channel 8 on the air to receive rebroadcasts of KTWU programming.\textsuperscript{76}

In the future, KTWU might be the originating station for ETV in Kansas, reaching viewers far beyond the signal range. The explanation of expansion by this means is the existence of cable television in Kansas. Cable TV exists in many Kansas towns, and

\textsuperscript{74}Two aerial photographs of the Washburn Campus are in Appendix XXI, pp. 146-147.)

\textsuperscript{75}Letter from Dr. Dale N. Anderson, Director of KTWU, to Thad Sandstrom, October 27, 1967. (A copy of this letter is in Appendix XXII, p. 151.)

\textsuperscript{76}Interview with Dr. Anderson, June, 1968.
KTWU broadcasting is being added to many systems. Thus, without the cost, staff, or facilities that Kansas educators have proposed for years, the state might some day still have a state-wide ETV system centered at KTWU and radiating to all parts of Kansas by means of expanding technology: the cable television systems.

---

Letter from Thad Sandstrom to Dr. Anderson, December 9, 1967. (A copy of this letter is in Appendix XXIII, p. 152.)
APPENDICES

pp. 44-152


<table>
<thead>
<tr>
<th>APPENDIX</th>
<th>PAGE</th>
</tr>
</thead>
<tbody>
<tr>
<td>I</td>
<td>44</td>
</tr>
<tr>
<td>II</td>
<td>62</td>
</tr>
<tr>
<td>III</td>
<td>104</td>
</tr>
<tr>
<td>IV</td>
<td>105</td>
</tr>
<tr>
<td>V</td>
<td>109</td>
</tr>
<tr>
<td>VI</td>
<td>111</td>
</tr>
<tr>
<td>VII</td>
<td>112</td>
</tr>
<tr>
<td>VIII</td>
<td>115</td>
</tr>
<tr>
<td>IX</td>
<td>117</td>
</tr>
<tr>
<td>X</td>
<td>122</td>
</tr>
<tr>
<td>XI</td>
<td>124</td>
</tr>
<tr>
<td>XII</td>
<td>125</td>
</tr>
<tr>
<td>XIII</td>
<td>126</td>
</tr>
<tr>
<td>XIV</td>
<td>136</td>
</tr>
<tr>
<td>XV</td>
<td>137</td>
</tr>
<tr>
<td>XVI</td>
<td>140</td>
</tr>
<tr>
<td>XVII</td>
<td>141</td>
</tr>
<tr>
<td>XVIII</td>
<td>146</td>
</tr>
<tr>
<td>XIX</td>
<td>147</td>
</tr>
<tr>
<td>XX</td>
<td>148</td>
</tr>
<tr>
<td>XXI</td>
<td>149</td>
</tr>
<tr>
<td>XXII</td>
<td>151</td>
</tr>
<tr>
<td>XXIII</td>
<td>152</td>
</tr>
</tbody>
</table>
PROPOSAL OF
THE CITIZENS COMMITTEE
ON
EDUCATIONAL TELEVISION FOR KANSAS

That the State of Kansas finance the building and operation of a state-wide system of non-commercial educational television broadcasting -- for the preparation and distribution of educational, cultural and informational programs to all the homes and to all the schools of Kansas. Details of the proposal are outlined on the following pages.

Prepared at the request of THE CITIZENS' COMMITTEE by:

The Joint Committee on Television:

University of Kansas, Lawrence
Kansas State College, Manhattan
Kansas State Teachers College, Pittsburg
Kansas State Teachers College, Emporia
Fort Hays Kansas State College, Hays
THE STATE-WIDE TV SYSTEM FOR KANSAS:

1. Eight transmitters, located to serve every county in Kansas.
2. Two major production units at Lawrence and at Manhattan.
3. Three rehearsal production units at Pittsburg, Emporia and at Hays.
4. A remote production unit for recording programs from anywhere in Kansas.
5. A Kansas Educational TV Authority under control of the State Board of Regents.

The entire system should be built over a period of eight years, spreading the cost of construction over that period at an annual cost of the amount it will take to operate the state-wide system when completed. This amount is approximately one million dollars per year. The developmental schedule proposed is as follows:

1st year — Begin construction of transmitters and production units at Lawrence and at Manhattan.
Begin building rehearsal production units at Pittsburg, Emporia and Hays.

2nd year — Finish production-transmitter units at Lawrence and Manhattan and operate for minimum of nine months of the year.
Finish rehearsal production units at Pittsburg, Emporia and Hays. Operate these rehearsal production units for minimum of three months of the year.
Purchase remote unit and operate for minimum of three months of the year.
Start building first satellite unit in Hays area.

3rd year — Finish 1st satellite unit and operate all of above for 12 months of year.
Start 2nd satellite construction in the Colby area.

4th year — Excepting Colby satellite, operate all of above for 12 months.
Finish Colby satellite and operate for minimum of 6 months.
Start construction on 3rd satellite in Garden City area.

5th year — Excepting 3rd satellite, operate all of above for 12 months.
Finish Garden City satellite and operate minimum of 6 months.
Start construction of 4th satellite in Pratt area.

6th year — Excepting 4th satellite, operate all of above for 12 months.
Finish Pratt satellites and operate for minimum of 6 months.
Start construction of 5th satellite in Wichita area.

7th year — Excepting 5th satellite, operate all of above for 12 months.
Continue construction of Wichita satellite.
Start construction of 6th satellite in Chanute area.

8th year — Excepting for 5th and 6th satellites, operate all of above for 12 months.
Finish Wichita satellite and operate for minimum of 6 months.
Finish Chanute satellite and ready it for operation.

9th year — Operate entire state-wide system for 12 months of year.
To keep cost at a minimum, it is recommended that the various transmitters not be connected by micro-wave. Instead, it is recommended that all programs be recorded on film or electronic tape, and programmed by the stations in round-robin fashion. Recordings could be made available to commercial stations within the state for repeat broadcasts in areas served by commercial stations, as well as made available to educational stations in other states in return for programs produced by other educational institutions.
1. Educational television refers to non-commercial TV broadcasting designed to supplement, expand and service the activities of Kansas educational agencies and institutions.

2. It is the use of the television medium for the dissemination of educational and cultural information to all the people of Kansas at the lowest possible cost. For examples of types of programs that will be used, see Pages 16 and 17.

3. Educational television is a great new instrument which a university or college may use in achieving its traditional objectives at low cost.

A. The basic functions of an institution of higher learning are

(1) to acquire new knowledge, (2) to preserve knowledge, and (3) to transmit knowledge.

B. Television is a medium which permits much greater transmission of knowledge at very low cost per person reached.

(1) It is a normal development of the established philosophy of bringing extension services of state institutions to all the people of the state.

(2) TV is to the lecturer or demonstrator what the printing press is to the writer of documents.

(3) TV permits reaching the hundreds of thousands of citizens who cannot be reached by personal contact because of the high cost of personal contact on a state-wide basis.

(4) As taxpayers invest greater sums in their state institutions, the taxpayers expect more in return. Television offers the only possible opportunity of reaching all the people of the state at a reasonable cost.

(5) For example, to send the material to all of the people of the state that is planned for the TV Network, printing and postage costs would be 800 times as much per year as the proposed network will cost.

In summary, then, the broad objectives of educational television are identical with those which traditionally have been assigned by the people to their institutions of higher learning. Television offers a dramatic and low cost method of carrying out these functions. It will multiply the value of adult education activities, will broaden the scope of community improvement, and will increase tremendously the dissemination of information which vitally affects Kansas economy.
II. WHY HAVE EDUCATIONAL TELEVISION?

1. Educational television will permit thousands unable to go to the campus for higher education to take such courses.
   
   A. Shut-ins of all ages can be reached by the schools.
   
   B. Those whose financial responsibilities preclude traveling to a college campus can take some regular college work.
   
   C. Adults, as well as school-aged persons, can take some college work.
   
   D. For example, in the fall of 1956 Chicago University announced a new 2-year college course, all of which is to be broadcast over the Chicago Educational TV Station, WTTW.

2. Educational television will further equalize educational opportunity by providing students (even in the small schools) with intimate contacts with the technical equipment, learning devices and master teaching otherwise not available to them.

3. Educational television will bring to the people of Kansas the best in education, information and cultural entertainment that is produced by the great universities of this country and the world.

4. Educational television will permit the institutions of higher learning to strengthen their contribution to Kansas society and economy through teaching, research and extension.

5. Educational television will provide other educational, informational and cultural agencies and institutions with a highly effective medium for serving the people of the state.
III. WILL PEOPLE WATCH EDUCATIONAL TV PROGRAMS?

1. Recent surveys made for commercial TV stations found Kansas families asking for broadcasts of educational, informational and cultural programs.

A. In central and northeastern Kansas two surveys found as many families asking for educational programs as asked for entertainment or sports broadcasts, although families wanted more frequent broadcasts of the latter type -- as could be expected.

- 89% wanted "programs on health and safety."
- 82% wanted "programs on home and family."
- 81% wanted "agricultural programs."
- 79% wanted "instructional entertainment for children."
- 78% wanted "travel films" and also wanted "homemaking programs."
- 76% wanted "science programs."
- 75% wanted "hobby shows of an educational nature."
- 70% wanted "adult education courses."
- 68% wanted "music appreciation programs."
- 67% wanted "programs for the classroom."

At least one family in every five asked that each of these types be broadcast EVERY day; another 50% of all families wanted each of the types broadcast from one to three times weekly. Only 16% wanted such types broadcast "only now and then."

B. In the Iowa State College educational TV area, where the above types of programs had been broadcast for five years, even higher percentages wanted each of these types broadcast, when an identical survey was made there for a commercial station.

2. Educational programs have large audiences in other areas.

A. Iowa State College found 37,000 children and 55,000 adults tuned to each broadcast of one of its children's program series.

B. Dr. Huston Smith's "The Religious Man" on KETC(TV) at St. Louis draws an audience of 100,000 for each broadcast.

C. In North Dakota, 50,000 farmers attended crop improvement courses on TV -- more than were reached in a year by specialists under prior methods.

D. Like examples from Ohio, Connecticut, Texas, California, Wisconsin, Missouri, and the rest of the 20 states having educational TV, testify to the fact that people will watch educational programs if well produced.

3. Demands made on our extension services suggest that people will watch educational-TV programs if they are made available.

A. Our Extension Divisions report that in 1955-56 school year, 932,369 people left their homes to attend 9,313 meetings for information that could have been adapted to television. How many other thousands were unable to attend, although wanting the information, is unknown.

B. The five state schools report that 30,742 people enrolled in 490 adult education courses adaptable to TV (had it been available) during the 1955-56 school year.

4. Interest in the relatively few informational and cultural programs offered by commercial stations is additional proof that people will watch educational programs if well produced.
IV. BUT ISN'T TELEVISION TOO COSTLY A METHOD OF EDUCATION?

1. This state-wide network will cost around a million dollars a year. It is the lowest cost per capita form of education yet devised, being much cheaper than either personal contact teaching, or sending information by mail.
   A. The total annual cost of operating the entire state-wide network 365 days per year is no more than the operating cost of a SINGLE large city high school in Kansas.
   B. In 1954-55 Kansas invested $103,443,911 in operating expenditures alone (exclusive of bonds and interest payments and special transportation costs) for the education of 430,780 children in Kansas public schools. This amounted to an annual cost per pupil of $236.
   C. Educational TV can provide state-wide education (to say nothing of aiding with the classroom program) for only 50 cents per year per person. Programs will be available a minimum of 6 hours per day, 365 days of the year, as compared to the public school session of 5 days per week for 36 weeks.
   D. For only 50 cents each person in Kansas will have a choice of 2,170 hours of programming — all for half the cost of one picture show.

2. Educational television might save Kansans millions of dollars each year through more wide-spread dissemination of information.
   A. For example, in 1955 a total of 57,596 farmers suffered crop loss because they did not use newly developed methods of seed preservation.
   B. In the Iowa State College TV area, it was found that one series of broadcasts on mice and rat control saved the farmers more in one year than the station will cost in 50 years.
   C. In the University of Illinois TV area it was found that lack of knowledge about carburetor setting on farm machinery wasted more gasoline in a year than the educational TV station will cost in a decade.
      These are only examples. Widespread dissemination of information can save countless millions by decreasing accidents, informing farmers and businessmen about new methods, teaching citizens to keep records, and teaching correct methods of filling out income tax forms.
   D. The Kansas Highway Patrol believes the proposed system for educational television will be the biggest single factor in decreasing highway accidents, and teaching safe driving to high school students.

3. The costs of educational television are relatively fixed.
   A. Other education finds costs increasing as population increases because of need for more buildings and teachers.
   B. But eight transmitters will serve the entire state of Kansas, regardless of future population increases.
   C. And as population increases, the per capita costs for educational TV decreases.
V. DOES EDUCATIONAL TELEVISION REALLY EDUCATE?

1. People learn from sight and sound. Television is a medium combining sight and sound. Experiments at many colleges and universities show that TV is a good educational medium.

A. Western Reserve University found that enrollees in college-credit courses taught by TV made as high grades on final examination as students in the same courses taught in the classroom.

B. The Navy, experimenting with 18,000 recruits, found TV taught more in half the time than traditional methods without TV.

C. The Army, experimenting with 12,000 basic trainees, found that TV training was "at least as effective" as traditional methods, and that material so learned was "remembered as well" as when learned the traditional way. It expects to use TV in the case of need for mass training.

D. In 1955 tests at Penn. State in using TV in teaching certain beginning courses proved so successful that the University is substituting its use for regular classroom courses for 3,000 lower division students in ten subjects that are adaptable to TV.

E. Following the Penn. State study, the Cincinnati Public Schools, the Pittsburgh Public Schools, the St. Louis Public Schools, Michigan State University, University of Houston, University of Iowa, Iowa State College, and all the public schools of Washington County (Md.) began using TV in regular teaching with success in every instance. More than forty schools are now using it.

F. In an experiment to determine whether dress-making could be taught by TV, Iowa State College found more than 3,000 women enrolling in the course and completing a dress.

G. Subjects now being taught by TV successfully range all the way from Chemistry, English, Speech, Economics and Psychology to Typing, Engineering, Dentistry and Surgery.

H. Every experiment yet made proves that television is an excellent educational medium.

2. The rapid advancement in the use of visual aids in schools, advertising, in sales meetings (and the like) prove the recognized advantages in combining sight and sound.

3. Psychologists agree that in the process of learning we acquire several times as much from sight as from sound alone.
VI. WHAT ARE OTHER STATES DOING?

1. The map on Page 9 shows in pictorial form what other states have done so far. 60,000,000 U.S. citizens live in areas served by educational television stations:

A. One or more stations are ON THE AIR in 22 different states.

B. One or more stations are UNDER CONSTRUCTION in 3 additional states.

C. Specific plans are underway in 19 additional states.

D. Only 3 states have as yet no specific plans, all mountain states.

E. In 21 of the 44 states mentioned above, state-wide networks are planned. In two the complete network is on the air, and in three others it is under construction. The other states are (like Kansas) larger states, needing several years to develop the full networks.

F. Actually, Kansas is AT PRESENT surrounded by states with one or more educational TV stations ON THE AIR. See map for Colorado, Nebraska, Missouri and Oklahoma.

G. In more than half of the 44 states educational-TV stations are either on the air or under construction. And 24 other construction permits have been granted by the FCC.

H. Already, more than $50,000,000 have been invested in educational television in states having stations on the air or under construction.

I. Although 3 years ago in New York, an Educational Television Commission reported adversely on educational TV, a new commission has endorsed it. Seven station construction permits have been obtained by the Board of Regents of the State of New York, and the Commission, appointed by the Legislature, has recommended to the legislature that it immediately start construction of the state educational TV network.

J. Even Alabama and North Carolina, historically low-income states, have state-wide educational TV networks ALREADY ON THE AIR.

2. It would appear that Kansas would be among the few states in the nation deciding that posterity should be denied television for educational purposes — should the proposal be turned down at this session.

(((See map, Page 9)))
60 MILLION PEOPLE IN 22 STATES ALREADY ARE SERVED BY EDUCATIONAL TV
WHAT ABOUT KANSAS? IT'S UP TO YOU!

HATCHED COLORS—STATE-WIDE NETWORKS
RULED COLORS—INDIVIDUAL STATIONS

- RED—ON THE AIR with one or more stations.
- PURPLE—UNDER CONSTRUCTION.
- GREEN—PLANNED.
- WHITE—NO DEFINITE PLANS COMPLETED.

(As of November 1, 1956)
(Changes bring map up to date as of October 15, 1957)
VII. WHY CAN EDUCATIONAL TV STATIONS BE OPERATED FOR LESS MONEY THAN COMMERCIAL STATIONS?

1. Educational stations escape some costs that commercial stations must bear.
   A. Rent and similar costs.
   B. Sales department costs.
   C. Advertising costs.
   D. Taxes.

2. Some other costs are lower for educational stations.
   A. Films from educational depositories, such as the National Educational TV Center, which today can provide 5 hours of excellent programs per week.
   B. Salaries and salary scales.
   C. Student cooperation.
   D. Reduced rates for equipment — the educational discount.
   E. Technical and audience research costs
   F. Talent

3. Other items already exist on the campus and cost nothing additional.
   A. Film libraries.
   B. Some visual aids.
   C. Program materials.
VIII. WHY NOT WAIT A FEW YEARS?

In the light of known facts, it seems obvious that the opportunity won't exist at some future date.

A. Channels for educational television were guaranteed by the Federal Communications Commission for a period of one year. The Kansas channel reservations were extended beyond that period at the request of the schools and the Governor to give the legislature a chance to vote on the proposal at its first opportunity.

B. The FCC repeatedly urged the schools to make immediate use of the channels before the government is forced to open them to commercial use.

C. Once assigned to commercial use, the channels will forever be lost to educational institutions.

D. Commercial demand -- particularly for the VHF channels -- is greater than the supply.

E. Already a Kansas City, Missouri, firm attempted to get the Lawrence channel moved to that city. And both Kansas City and Wichita commercial interests attempted to move the Manhattan channel to Hutchinson for commercial purposes. Although the requests were temporarily denied, it has been made clear that this action was taken to give the legislature a chance to vote on the proposal.

F. In October, 1956, the colleges of Kansas were again warned by Washington, D.C., that commercial interests in other areas wanted the VHF educational channels moved OUT OF KANSAS to other states, and that the government would so move them if the people of Kansas have no intention of using them for educational purposes.

G. The FCC announced in September, 1956, that further reservations of educational channels would be decided upon the merits of each reservation, rather than on the blanket reservation for education.

H. Under that ruling, Texas A & M became the first college to lose its channel to commercial interests, Channel 3 being moved to commercial use because educational interest at College Station, Texas, had not made use of the channel.

It seems obvious that channels for educational purposes in Kansas cannot be reserved indefinitely, and that we cannot expect them to be available at a later date if affirmative action is not taken immediately.
IX. WHY NOT GIVE UP THE EDUCATIONAL CHANNELS AND SHARE TIME WITH COMMERCIAL TV STATIONS?

1. Such a plan is impractical for commercial stations.
   A. They could not give up Class A (evening hours) time because of commercial network commitments.
   B. If they cancelled network commitments to give up such time, commercial stations would go bankrupt.
   C. Commercial stations cannot guarantee broadcast time for educational programs because of need for revenue.

2. Such a plan is impractical for educational interests.
   A. If the share-time principle were adopted, and if no Class A time were made available, educational interests could not accomplish their goals.
   B. If they shared time as KSAC (Kansas State College, Manhattan) does with WIBW (Topeka), there would be no savings -- regardless of hours permitted to go on the air -- because KSAC owns and operates its own transmitter and other equipment, just as it would if it had full time license.
   C. If educational interests merely produced programs and used commercial transmitters, those programs would reach only the more heavily populated areas of the state where commercial TV exists. About a third of Kansas would be denied educational TV, even though all anticipated commercial stations were on the air.

   The operation of a transmitter is a small part of the cost of educational television service.

   D. Any such an arrangement would make rigid the otherwise flexible policy of offering educational programs to special groups (such as students in classrooms, medical doctors, veterinarians, farmers, etc.) -- instead of programs to fit their special needs at times these groups could watch.

   The cost of producing the programs would be the same whether transmitted by educational stations or by commercial stations. The opportunity for reaching the people when the people are available to watch the programs would be drastically decreased if services were limited to use of commercial transmitters.
1. All educational, cultural or non-commercial informational services within the state will have access to air time on this network.

A. It will be open for use to all educational institutions in Kansas, such as:
   1. High schools and grade schools throughout the state.
   2. Municipal schools.
   3. Private institutions for higher learning.
   5. The five state institutions of higher learning.

B. It also may be made available to the various agencies of state government, such as:
   1. Department of Social Welfare (example — mental health programs).
   2. State Board of Agriculture (example — control of crop and animal diseases).
   3. Highway Patrol (example — high school driver safety education program).
   4. Department of Public Instruction (example — homebound children program).
   5. Kansas State Board of Health (example — health information).
   6. Kansas Bureau of Investigation (example — tracing criminals and missing persons).
   7. State Office of Civil Defense (example — training schools for firemen, police, and disaster personnel).

C. Cultural, patriotic, informational and civic groups, such as:
   1. Libraries.
   3. Symphonies.
   4. Art Associations.
   5. Religious Groups.
XI. WHAT TYPES OF PROGRAMS WILL THE NETWORK CARRY?

1. Pages 16 and 17 list examples of approximately 200 program series already planned for production on the Kansas Educational Television Network.

2. Besides these programs and others to be produced locally, the National Educational Television film network, backed by the Ford Foundation, has been collecting on film the best educational programs available from the great universities of the world. Already it is able to provide 6 hours of programming per week, and expects to have 10 hours of programming per week available by 1959.

3. Exchange agreements will be made with all the great universities of the United States, bringing the best that these schools produce to the people of Kansas.

4. Programs from various state agencies, libraries, museums, municipal symphonies, service clubs, and other organizations interested in education or culture will be aired.

5. Public service network programs which commercial stations are unable to carry because of conflicts can be brought to the people of Kansas — or to single areas of Kansas where they cannot be presented by commercial stations.
   
   A. For example, the McCarthy Hearings were carried in Houston by the educational station, when commercial stations found it impossible to carry the program there.

6. State agencies listed on Page 14 will provide other programs.

7. Credit courses from the five state colleges will be offered, and the best teachers in the state will broadcast directly to the high schools and elementary schools in all counties.

8. The following 200 series titles are merely suggestive. Anything that the people of Kansas want that is of an informational, cultural or educational nature can be aired by the network.
FOLLOWING ARE SOME EXAMPLES OF THE TYPES OF PROGRAMS WHICH CAN BE PRODUCED BY THE KANSAS EDUCATIONAL TELEVISION NETWORK FROM MATERIALS NOW AVAILABLE.

The Farm Hour
So You Want to be a Doctor
Science and Superstition
Highway Safety
Your Mental Health

The Shut-in's Hour
What Health Means to You
The University Players
High Schools on Parade
Your Community and State

Your Legislature Reports
Campus on Parade
The Community Roundtable
Visit Your Hospital
What's New in Medicine Today

Science in the News
Weather
Home Appliance Repair
Introduction to Chemistry
Scientific Professions

March of Time
Research and You
Know Your Orchestra
The Stars Above
How We Hear

What Is a Good School?
Sports Parade
Home Economics
Tailoring Tips
The Collegiate 4-H Front

American Wit and Humor
Dairying is Profitable
Grain to Flour
Wanted: 10,000 teachers
Planning Your Farm

Great Men and the Plains
Meet Your Representative
Capital Comments
Goodby, Mr. Germ
Decorating Your Home

Grading Market Poultry
Simplifying Farm Work
Preparing Your Income Tax
Grain Drying and Profits
Adjusting the Combine

Soil Conservation Is for You
The Market Basket
The Weed Patrol
Planning Your New Home
Remodeling Your Home

The Veteran Speaks
Your KBI
What is College?
Our Living Language
Art for the Pre-School Child

The Children's Hour
The Little American Royal
Football Highlights
Basketball Highlights
Your County Agent

Balanced Farming Is For You
What Better Seeds Can Do for You
Irrigation in Kansas
Let's Garden Awhile
This is Your World

Kansas History on the March
Experiment Station Report
Stage Fright
Democracy in Action
Bugs are Pests

High Points of History
Farm and Home Safety
Your School Reports
Hunter's & Fisher's Guide
Your Hobby Workshop

Your Child and You
Sewing Time
Kitchen Time
The Market Guide
Assembly Hour

The Wheat Story
The People Shall Judge
Major Occupations
Animal Health
Great Debates

How Children Learn to Read
The Family Budget
How Public Polls Work
A City is Fed
The Art of Retirement

- 16 -
Planning Your Water System
The World Around Us
Let's Travel
Landmarks in Kansas History
American Adventure

Crusade in the Pacific
Adjusting to Leisure
How to Study
Judging Facts
The National Scene

How to Write a Letter
Your Thrift Habits
Our Shrinking World
Made in USA
Our Neighbors Down the Road

Body Care and Grooming
Improving Your Posture
Insect Control
Our Constitution
The Industrial Revolution

Industry Comes to Kansas
Developing Leadership
Everyday Chemistry
Saving Steps
The Symphony Hour

Home Nursing
Water Safety May Save Your Life
It's the Law
Finding the Right Job
The Cattleman

You and Your Heart
The American Way
Mechanics and You
Uses for Surplus Food
It's Fun to Model with Clay

Guideposts
Let's Explore Science
Adventures in Art
Looking Ahead
Finger Painting

Puppets are Fun
Cattle Trails
The Sun and Planets
Beat Me at Spelling
What Makes the Weather?

People, Resources and Culture
Introduction to Music
Tomorrow's Home
Religions of Man
Music as a Language

The Art of Retirement
Your Personal Budget
March of Man
Mathematics of Life
Learning to Read Better

What is an Adult?
How to Keep Books
Behind the Screen in TV
Geography of Kansas
It's a Fact

How to Make a Dress
Dressing Up Your Home
Child Behavior; Your Job
Table Manners
Feeding the Deep Freeze

How to Butcher Meat
The Story of Drugs
Youth in Crisis
Preparation for Parenthood
The Growing Plant

How to Buy
Care of Fabrics and Furs
Care for Your Floors
Music for Children
Slip Covering

Judging Livestock
History of the Movies
Electricity in the Home
Great Books for Everyday
Paintings Will Influence You

Looking at Modern Art
Writers of Today
Music for Young People
At Home with Your Child
The Teenager

Home Workshop
Spotlight on Opera
Americans Meet the Prairies
The Clock & Calendar in the Sky
How Do You Pronounce It?
1. Twenty-nine stations on the air: (Channels in Parenthesis)

<table>
<thead>
<tr>
<th>Station</th>
<th>City, State</th>
<th>Channel</th>
</tr>
</thead>
<tbody>
<tr>
<td>WOI-TV</td>
<td>Ames, Iowa</td>
<td>(5)</td>
</tr>
<tr>
<td>KUHT</td>
<td>Houston, Texas</td>
<td>(8)</td>
</tr>
<tr>
<td>KOMU-TV</td>
<td>Columbia, Mo.</td>
<td>(8)</td>
</tr>
<tr>
<td>WKAR-TV</td>
<td>E. Lansing, Mich.</td>
<td>(60)</td>
</tr>
<tr>
<td>WQED</td>
<td>Pittsburgh, Pa.</td>
<td>(13)</td>
</tr>
<tr>
<td>WHA-TV</td>
<td>Madison, Wisc.</td>
<td>(21)</td>
</tr>
<tr>
<td>KQED</td>
<td>San Francisco, Cal.</td>
<td>(9)</td>
</tr>
<tr>
<td>WCET</td>
<td>Cincinnati, Ohio</td>
<td>(48)</td>
</tr>
<tr>
<td>KETC</td>
<td>St. Louis, Mo.</td>
<td>(9)</td>
</tr>
<tr>
<td>KUCI-TV</td>
<td>Lincoln, Neb.</td>
<td>(12)</td>
</tr>
<tr>
<td>KREMA</td>
<td>Denver, Colo.</td>
<td>(6)</td>
</tr>
<tr>
<td>KETA-TV</td>
<td>Oklahoma City</td>
<td>(13)</td>
</tr>
<tr>
<td>KLSE</td>
<td>Monroe, La.</td>
<td>(13)</td>
</tr>
<tr>
<td>WYES</td>
<td>New Orleans, La.</td>
<td>(8)</td>
</tr>
<tr>
<td>KCTE-TV</td>
<td>Minneapolis-St. Paul</td>
<td>(2)</td>
</tr>
<tr>
<td>WQED</td>
<td>Pittsburgh, Pa.</td>
<td>(13)</td>
</tr>
<tr>
<td>WHA-TV</td>
<td>Madison, Wisc.</td>
<td>(21)</td>
</tr>
<tr>
<td>WJCT</td>
<td>Jacksonville, Fla.</td>
<td>(7)</td>
</tr>
</tbody>
</table>

2. Ten stations under construction will be on the air within a few months:

<table>
<thead>
<tr>
<th>Station</th>
<th>City, State</th>
<th>Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>WETV</td>
<td>Atlanta, Ga.</td>
<td>Oct.*</td>
</tr>
<tr>
<td>W Moody</td>
<td>Oxford, Ohio</td>
<td>(14)</td>
</tr>
<tr>
<td>WGTW</td>
<td>Athens, Ga.</td>
<td>(8)</td>
</tr>
<tr>
<td>KOAC-TV</td>
<td>Cornvalles, Ore.</td>
<td>(7) Oct.*</td>
</tr>
<tr>
<td>WJCT</td>
<td>Jacksonville, Fla.</td>
<td>(7) Dec.*</td>
</tr>
</tbody>
</table>

3. A total of 65 educational construction permits have been requested by educational institutions since 1952. Of this number 47 have been granted and the remainder are pending. The following construction permits are among those having been granted:

<table>
<thead>
<tr>
<th>Station</th>
<th>City, State</th>
<th>Channel</th>
</tr>
</thead>
<tbody>
<tr>
<td>KQED</td>
<td>Berkley, Calif.</td>
<td>(9)</td>
</tr>
<tr>
<td>KBAY-TV</td>
<td>Sacramento, Calif.</td>
<td>(46)</td>
</tr>
<tr>
<td>WCTB</td>
<td>Bridgeport, Conn.</td>
<td>(71)</td>
</tr>
<tr>
<td>WCHR</td>
<td>Hartford, Conn.</td>
<td>(24)</td>
</tr>
<tr>
<td>WQER</td>
<td>Norwich, Conn.</td>
<td>(63)</td>
</tr>
<tr>
<td>KSAC-TV</td>
<td>Manhattan, Kan.</td>
<td>(8)</td>
</tr>
<tr>
<td>WTIV</td>
<td>New Brunswick, N. J.</td>
<td>(19)</td>
</tr>
<tr>
<td>WQTV</td>
<td>Binghamton, N. Y.</td>
<td>(46)</td>
</tr>
<tr>
<td>WQUS</td>
<td>Columbus, Ohio</td>
<td>(34)</td>
</tr>
<tr>
<td>WIFI</td>
<td>Milwaukee, Wisc.</td>
<td>(10)</td>
</tr>
<tr>
<td>WPHY</td>
<td>Ithaca, N. Y.</td>
<td>(14)</td>
</tr>
<tr>
<td>WREG</td>
<td>New York City</td>
<td>(25)</td>
</tr>
<tr>
<td>WROC</td>
<td>Rochester, N. Y.</td>
<td>(21)</td>
</tr>
<tr>
<td>WTV</td>
<td>Syracuse, N. Y.</td>
<td>(43)</td>
</tr>
<tr>
<td>WUMK</td>
<td>Ann Arbor, Mich.</td>
<td>(26)</td>
</tr>
<tr>
<td>WTUZ</td>
<td>Albany, N. Y.</td>
<td>(17)</td>
</tr>
<tr>
<td>Univ. of N. M.</td>
<td>Lubbock, Texas</td>
<td>(8)</td>
</tr>
</tbody>
</table>

Among permits pending:

University of Kansas, Lawrence (11)

* Target Dates

Note: VHF Channels are from 2 to 13.
UHF Channels are those over 13.
Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington 25, D.C.

In the matter of
Amendment of Section 3.606(b), Rules Governing Television Broadcast Stations.

Docket No. _______________________

OPPOSITION OF KANSAS STATE COLLEGE OF AGRICULTURE AND APPLIED SCIENCE TO PETITION FOR RULE-MAKING PROCEEDINGS BY STANLEY H. DURWOOD AND ORDER TO SHOW CAUSE

CONTENTS:

Preliminary Statement ........................................ 1
Past Record of College Shows Future Intent .................... 3
Reasonable Assurance Exists that Funds for the Use of Channel 6 Will be Appropriated by Legislature .................. 6
Evidence Offered by Stanley H. Durwood in his Petition Refutes Basic Arguments of Petition .......................... 12

EXHIBITS:
1 - Letter from Governor of Kansas supporting this Opposition to Hearings.
2 - Governor's statements to the Kansas press on Educational Television.
3 - Action by Board of Regents on 1955 plan for Educational Television.
4 - Educational Council, State Chamber of Commerce, and Educational TV.
5 - Chamber of Commerce clinics vote for Educational Television.
6 - Proposal for State-wide System of Educational Television in Kansas.
7 - Stanley H. Durwood's statement on UHF conversion in Wichita.
8 - Television in the Manhattan, Kansas, area, February 1, 1955.
9 - The 1953 proposal for Educational Television for Kansas.
10 - The 1953 Senate Bill on Educational Television.
11 - Newspaper support of Kansas plan for Educational Television.
12 - House of Representatives' resolution in 1953 on Educational TV.
13 - Reasons for failure to get funds from Legislature in 1953.
14 - Representative organizations endorsing Educational TV for Kansas.
15 - Kansas State College research on TV receiving antennas.
16 - Reply to the majority report of New York Television Commission.
18 - History of television research at Kansas State College.
19 - KGDB-FM the most successful FM station in Kansas in 1953.
20 - History of Radio Station KSAC.
21 - Student training stations at Kansas State College.
22 - Listening Habits, Station KSAC Audience, 1949.
Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington 25, D. C.

In the Matter of
Amendment of Section 3.606(b),
Rules Governing Television Broadcast Stations.

Docket No. ____________

OPPOSITION OF KANSAS STATE COLLEGE OF AGRICULTURE AND
APPLIED SCIENCE TO PETITION FOR RULE-MAKING PROCEEDINGS
BY STANLEY H. DURWOOD AND ORDER TO SHOW CAUSE

Kansas State College of Agriculture and Applied Science
hereby respectfully requests the Commission to deny the Petition for Rule Making Proceedings of Stanley H. Durwood for "amendment of Section 3.606(b) of its Rules and Regulations looking toward the assignment of VHF Channel 8 to Hutchinson, Kansas, for commercial use, and concurrently herewith to issue an order to Kansas State College of Agriculture and Applied Science to show cause why its construction permit for non-commercial educational television Station KSAC-TV, Manhattan, Kansas, should not be modified to specify operation on UHF Channel *58 in lieu of *3."

Preliminary Statement:

Kansas State College of Agriculture and Applied Science is a "land grant" school which has a long record of interest in and research in the use of radio and television media as an aid in accomplishing the three fundamental purposes for which the College was established: (1) resident instruction, (2) research, and (3) dissemination of knowledge to the people of Kansas.
This long record refutes one of the two basic assertions of Stanley H. Durwood's Petition, to wit: that the College is not showing due diligence in prosecuting its construction permit for Station KSAC-TV on reserved Channel * 8. Both the past and the present actions of the College attest that the College has promoted, and continues to promote diligently, the use of Channel * 8 for non-commercial educational purposes, and is doing all within its power to get the station on the air at the earliest possible moment.

The facts show further that the College has reason to believe that its efforts will be successful, and that VHF Channel * 8 will be the very heart of a state-wide system of educational non-commercial television operated in cooperation with the other four state institutions of higher learning, with program support from other educational and cultural forces within the state.

The facts show further that the College's plans are strongly supported by the people of the state, by many state legislators, by the major newspapers of the state (Exhibit 11), by the Educational Council of the State Chamber of Commerce (Exhibit 14), by the Governor of the State of Kansas (Exhibit 1), by agencies of state government, and by numerous organizations interested in the cultural and intellectual development of the people of Kansas.

Further, the following facts and exhibits show that the two basic arguments of the Petitioner, Stanley H. Durwood, are unfounded, and that the requested change of frequencies would work a hardship on the people of the Manhattan area; and upon the people of other areas of the state by seriously endangering the entire state-wide system of non-commercial educational television, now planned.
The chief beneficiary of the move of channels would be Stanley H. Durwood, rather than the people of Kansas.

Finally, the following facts and exhibits show that according to Stanley H. Durwood's own arguments and evidence, there is no need for the proposed change in channel assignments, so far as the great majority of the people of KEDD's service area is concerned.

The Long Record of Kansas State College
in Radio and Television

The long record of Kansas State College of Agriculture and Applied Science attests its interest in and its determination to use media for mass communications in the interest of the people of Kansas. The following summary outlines the steps taken by the College in the fields of radio and of television, and is based on the exhibits named.

Radio

1. The College went on the air with AM radio station KSAC in 1924, and has continuously programmed that station in the interest of the people for a minimum of 3½ hours per day, six days per week, over the thirty-one-year period. (Exhibit 20)

2. Kansas State College was the first state school in the United States to establish courses in radio programming. Since 1931 the College has improved on its offerings until today it offers both the BS and the MS degrees with majors in radio (Exhibit 22).

3. Kansas State College was one of the first schools in the area to establish a closed circuit radio laboratory for exclusive use in student training. The workshop operated on closed circuit from 1946 to 1950. (Exhibit 21)
4. In 1951 the College exchanged the closed circuit laboratory for a 10 watt FM station. This station has operated since date of installation approximately six hours per day, six days per week, during weeks school is in session, including summer session. At present more than 200 students are enrolled in radio classes, 84 of whom are majoring in radio-television. (Exhibit 21)

5. On September 18, 1952, the College was granted a CP for a new remote pickup broadcast station, KB-9850

6. Through-out the history of radio at the College, it has made use of commercial outlets to help it reach the people. For example, its script service regularly reaches 70 commercial stations in Kansas and adjoining states, and its taped program service is used by 25 radio stations.

7. Both the AM and FM stations are programmed in the interest of the public. Continuous radio programming in the public interest on KSAC over the past 31 years has drawn widespread public support (Exhibit 22). The policy of the student training station, KSDB-FM, of offering at each quarter-hour a program type not otherwise available in its service area at that quarter-hour, has made it the most successful FM station in Kansas. (Exhibit 19).

8. The faculty of Kansas State College has been long interested in radio audience analysis, and has done more of this type of research than has the faculty of any other educational institution of the world. The research program started in 1937 has surveyed every county of Kansas every year since that date, and represents the longest continuing series of audience studies in existence. In the interest of better radio and television, the studies have been extended to other areas of the United States. In all, more than 800 public educational institutions have joined in this audience research under the direction of faculty members at Kansas State College. A total of more than $335,000 has gone into this research, which has reached by personal interview more than 440,000 homes in 22 states. The Australian government and the FCC have used a member of the College faculty as consultant in audience research. And the Canadian and Japanese governments sent representatives to the College to study methods that might be applied to audience analysis in those countries. (For example of this research, typical findings, methods and range of problems investigated, see Exhibit 23)
Television (Exhibit no. 18)

1. In 1931 the College became the first to use state tax money for experimentation with television. It obtained an experimental license for a TV station in 1932, using mechanical scanning.

2. The College became one of the first in 1937 to operate a closed circuit television laboratory, using iconoscope camera chain.

3. In 1941 the College designed and started building a low-powered TV station, authorized to operate on Channel 1. Although the war delayed completion, construction was finished in 1945.

4. From 1941 to 1949 the College supplemented closed circuit TV experimentation with experimental aerial broadcasts over KA2XBD.

5. Between 1950 and 1952 the College designed and constructed studio, transmitter and 3-bay antenna equipment for operation on Channel 8. Replacement cost at commercial prices was estimated at the time at $103,000. Equipment included a 500 w video transmitter, a 250 w audio transmitter, projection equipment, image orthicon camera chain, test equipment and furniture.

6. In 1950 the College was granted a new experimental TV license for the following purposes:

   (1) To find a means of providing TV services to small communities in areas of low population density;
   (2) Research in the use of TV in college education.

7. During 1951-52 the College designed and built a UHF television station, making field strength measurements confirming the validity of FCC methods for calculating UHF coverage.

8. During 1951-52 the College designed and built a closed circuit color television system for use by the School of Veterinary Medicine in studying surgical operations in its clinics.

9. During 1952 the College made a study (and published findings) on the potentials of television in Kansas. (Exhibit 17)

10. During 1954 the College made studies of television receiving antennas and published its findings. (Exhibit 15)

11. During 1953-54 the College built a studio, complete with lighting facilities, control room and projection room. It equipped this student training workshop with
2 Dage Camera chains, one Image Orthicon camera chain, General Electric film projector, complete audio equipment, monitoring equipment, and the miscellaneous equipment needed for closed circuit television operation on Channel 3. This action represented an additional investment of $20,000 in television. It is used for student training, and for rehearsal of programs prepared for live presentation over commercial television stations.

12. During 1954-55, the College provided for later installation of facilities for color TV in the new Veterinary Medicine Hospital, including ducts and observation space for viewing color TV closed circuit broadcasts of surgical operations.

13. During the 1954-55 school years, the College broadcast several series of programs over commercial TV stations:

(1) On WISW-TV -- three series of live programs and one series of film programs: 13 week series from departments of English, Art, Music, Speech and Psychology; 8 week series on enjoying football; similar series on enjoyment of basketball; and film series of delayed broadcast of football games.

(2) On KTVH -- daily series (five days per week) since March, 1954, on farm information and techniques.

(3) On KOAM-TV and on KAKE-TV -- weekly broadcasts since fall of 1954 on farm facts and techniques.

Kansas State College of Agriculture and Applied Science submits that this long record of interest in the broadcast media, and the long history of the use of the media in the interest of the people of Kansas, are proof in themselves of intent to use Channel # 8 at the earliest possible moment. The College was the first in the country to use tax money in experimental television work, one of the first in the country to go on the air with an AM station, one of the first to work with closed circuit television, the first in the United States to offer courses in radio, one of the first to experiment with methods of using television to serve less populous areas, and the very first to apply for and receive a construction permit for a non-commercial educational TV station. This series of firsts establishes interest and intent.
Of even more importance, however, is the attitude of the Board of Regents and the Kansas Legislature during these years. Throughout this long history the Board of Regents and the Kansas Legislature consistently backed the efforts of the College by providing funds with which to carry out these radio and television projects.

When fire destroyed all radio transmitting facilities and equipment of the College in 1950, a special interim legislative committee appropriated funds for new equipment and facilities within days of the disaster. When the new Veterinary Medicine Hospital was planned, the Board of Regents supported, and the Kansas Legislature financed, proposals to prepare the new building for the installation of closed circuit color television, for more effective training of students in animal surgery. When 10 watt non-commercial FM stations were made possible by the FCC, Kansas State College was among the first to apply, to receive Board of Regents support, and to get Legislative appropriations to make use of FM in student training.

In the long history of the development of radio and television at the College, neither the Board of Regents nor the Kansas Legislature has refused to support requests of the College for needed equipment or finances for operation of proposed radio or television facilities.

If the past actions of any Board of Regents or of any state legislature can be taken as indicative of probable future action, then the past action of this Board of Regents and the Kansas Legislature are enough in themselves to give assurance that future legislatures of the state of Kansas will provide the funds needed
for the proper use of non-commercial educational Station KSAC-TV on Channel * 8.

However, other evidence is available to support such an assumption. Specific evidence that follows gives reasonable assurance that funds for the use of Channel * 8 will be appropriated in the near future.

Reasonable Assurance Exists that Funds for the Use of Channel * 8 Will Be Appropriated by the Legislature

The following summary outlines the action of Kansas State College of Agriculture and Applied Sciences in its efforts to get KSAC-TV on the air, and some of the support it has received. The summary is given in outline form and is based on the exhibits named:

1. On April 21, 1952, the state Board of Regents of Kansas authorized the College to apply for use of Channel * 8 in Manhattan, as a non-commercial educational service to the people of the area. Future Board of Regent and legislative action would be required for funds to build and operate the station. (Application on file, FCC)

2. On June 16, 1952, the College filed its application with the FCC. On July 23, 1952, the Commission granted to Kansas State College of Agriculture and Applied Sciences a permit for non-commercial educational television station KSAC-TV to operate on VHF Channel * 8 (BPET-1). In making the grant the Commission took notice of the fact that future legislative action would be necessary.

3. In February, 1953, at the very first meeting of the Kansas Legislature following grant of CP, Kansas State College joined the University of Kansas in asking the Legislature for funds to build and operate a station at Manhattan and another at Lawrence. (Exhibits 9 & 10)
4. At the time the Bill (Exhibit 10) was submitted in the Senate, the College was asked by 15 senators to be allowed to sponsor the bill. Eight sponsors were named on the bill in the interest of expediency, two of whom were members of the Ways and Means Committee of the Senate.

5. The State Chamber of Commerce recognized that the matter of educational television was a major issue before the legislature. Therefore, it held an "Eggs and Issues" breakfast for members of the Kansas Legislature for the sole purpose of letting the College explain the merits of the television bill.

6. However, before the Bill was acted upon in Committee, the now famous Majority Report of the New York Television Commission was made. Opponents of the educational TV Bill in Kansas distributed copies of the New York report to all legislators. In 1953 there were no television stations in Kansas. Few legislators had seen television, and fewer still had any idea of its potentialities or costs. The Senate Ways and Means Committee voted unfavorably on the TV Bill. Therefore, the Bill was never debated or acted upon by the Senate as a whole, even though the House of Representatives unanimously passed an enabling act (Exhibit 12) recognizing the value of educational TV and authorizing the building of stations if funds could be obtained from gifts.

It was generally agreed that the Ways and Means Committee of the Senate permitted the Legislature to adjourn without voting on the television bill for three reasons: (1) confusion caused by issuance of the New York report, (2) ignorance of television's potential in an area without television, and (3) lack of specific figures (based on experience) on the cost of future operation of educational television stations.

However, individual legislators urged the College to continue its investigation and to present a specific plan for state-wide educational television at the next legislative session. (Exhibit 10)

7. As shown above, the reply of the College to the Majority Report of the New York Commission was unsuccessful in 1953. (Exhibit 16)

8. Because of the questions raised in 1953, Kansas State College joined forces with all state educational institutions in developing a plan for a system of state-wide non-commercial educational television, to be built over a specific period for a specified sum of money. (Exhibit 6) The proposal made Channel * 8 at Manhattan one of the two major production centers for the entire network, and is built around the use of Channel * 8 at Manhattan and Channel * 11 (already applied for) at Lawrence.
9. This plan has been presented to the people of Kansas via the press and via a series of "clinics" called by the State Chamber of Commerce. Educational television was only one of 51 topics scheduled for discussion at each three hour clinic. Clinics were open to the public. In all areas of the State in which the proponents of the plan were given sixty seconds or more for explanation, the plan was supported by popular vote of those present, with votes ranging from 2 to 1 in favor to 16 to 1 in favor of the proposed state-wide system of educational television. (Exhibit 5)

10. The potentials of educational television for Kansas were presented to the Educational Council of the State Chamber of Commerce at its request in July, 1954 (Exhibit 4). At that time the Council recognized that the proposal was not complete and said it would welcome more information as the new plan was developed. The detailed plan was presented to the Educational Council on December 10, 1954.

11. The plan was presented to the Board of Regents, and received formal endorsement and recommendation to the Kansas Legislature, to be adopted "When the Legislature determines that funds are available." This action is the strongest legal action the Board of Regents can take, since the legislature alone can appropriate funds. (Exhibit 3)

12. Until 1955 the Constitution of the State of Kansas provided for biennial meetings of the State Legislature. At a popular referendum in the fall of 1954, the people of the state adopted an amendment to the Constitution of Kansas, calling for annual meetings of the legislature, starting with the 1956 session.

13. At this same election, a new Governor, who advocated analysis and revision of the complete tax structure of the state, was elected. He has requested the five state educational institutions to run on "austerity budgets" for the coming year, while the tax structure is being reviewed.

However, he stated his faith and belief in non-commercial educational television as an instrument of mass education for the people of Kansas. He assured the Board of Regents and the five school presidents that failure to provide for educational television in 1955 should in no way be interpreted as meaning that the Legislature or the Administration were opposed to the plan the colleges have presented. He went further to say that he, personally, advocated the plan, would do all he could to promote its passage in 1956, and personally believed that the 1956 Legislature would pass the bill and supply the million dollars called for during the first year of the proposed educational TV network. (Exhibit 2) He publically announced that he believed
educational television to be an important development in mass education. Further, he has addressed a letter to the Federal Communications Commission (Exhibit 1), requesting that educational channels be held in Kansas, and that the next Legislature be given an opportunity to finance the proposed non-commercial educational TV system for Kansas.

Kansas State College of Agriculture and Applied Science submits that the acts outlined above adequately show that the College has been diligent in promoting the funds necessary to make use of Channel *8 at Manhattan. The facts show that the College has acted at every opportunity available to it to develop educational television within the state. The College submits that its acts fall well within the expectations of the FCC, its Rules and Regulations, and its charge to educators to get educational stations on the air at the earliest possible moment.

And of equal importance, the above outlined facts and exhibits adequately show that the status of KSAC-TV is far from "indefinite" as charged by Stanley H. Durwood. The letter from the Governor of Kansas to the FCC reads in part:

"... I urge your Commission to hold all of these reservations until the Legislature of this state can find the funds necessary to build and operate the education television system as proposed to me by the five presidents of our state colleges.

"... Unfortunately, the state is in the process of reevaluating and reorganizing its tax structure....

"However, I personally, and I believe a great majority of the legislators and the people of this state, approve of the proposal as outlined by our institutions of higher learning. I feel certain that if given another year, the Legislature of the state of Kansas will provide the funds for the building and operation of a television system that will cover the entire state.

"... The people of this state are mindful of the tremendous value of these reservations, and I am confident they, through their elected representatives, will provide the necessary funds at the next annual legislative session."

The Governor's letter refutes Stanley H. Durwood's unsupported assertion that "Based upon information and belief of the petitioner..."
Future actions of the State Legislature are believed to be negative with respect to the appropriations of television funds for the construction and operation of KSAC-TV."

Although neither Mr. Durwood nor Kansas State College can speak for the 1956 Legislature, known attitude of individual members of the present legislature, the statement of the Governor of Kansas, and the formal support given by organizations sponsoring education and culture in Kansas, give reasonable assurance that the 1956 Legislature will provide funds for the operation of KSAC-TV.

The College submits that the attached exhibits, and particularly Governor Hall's letter, give the Commission much more evidence of favorable action on the part of the Legislature than the Commission had in 1952 when the construction permit for KSAC-TV was granted.

The College argues that it would be folly to substitute Channel * 58 for Channel * 8 in Manhattan at a time when such action would endanger the future of the entire state network of non-commercial educational television in Kansas.

And in the light of these facts the College submits that Stanley H. Durwood's Petition for a Hearing should be denied.

The Evidence Offered by Stanley H. Durwood in His Petition Refutes the Basic Argument of the Petition

Besides the assertion that he, Stanley H. Durwood, personally believes that future legislative appropriation for the operation of KSAC-TV will not be made, the Petition for Hearings contains only one basic argument -- to wit, that well-known problems present
in localities where UHF and VHF assignments are intermixed support his plea for a Hearing.

In making this argument, the Petitioner, Stanley H. Durwood, claims that his suggested change in frequency assignments:

"... is the type of case encompassed within the proposals made at the so-called Potter Committee Hearings of the Senate Subcommittee on the Interstate and Foreign Commerce Committee." (Petition, pp. 4-5)

and in proof thereof Stanley H. Durwood quoted a number of commercial television operators and two Federal Communications Commissioners. He quoted Dr. Frank Stanton, CBS, Dr. Allen D. DuMont and Dr. Thomas T. Goldsmith, DuMont Laboratories, Inc., Melvin A. Goldberg, Ultra High Frequency Industry Coordinating Committee, Commissioner Frieda B. Hennock, and Chairman Rosel H. Hyde. The substance of all these quotations was the same, and was summed up by Chairman Hyde:

"... the incentive to convert or to buy UHF equipment, which is higher priced, is substantially weakened (when several VHF signals are available). And where UHF-set circulation is low, obviously advertisers and networks are reluctant to place their programs on the UHF station ..."

However, the evidence Stanley H. Durwood presents in his Petition proves that "incentive to convert or to buy UHF equipment" has NOT been weak in the Wichita area, and his evidence shows that networks HAVE NOT been reluctant to air programs over KEEDD.

Mr. Durwood states in his Petition that there are "124,311 television receivers in use within its (KEEDD's) service area, which are capable of UHF reception." (Petition, p. 3) This number is 99 per cent of all television-owning families within KEEDD's service area, according to Stanley H. Durwood. (Exhibit 7)
Therefore, Stanley H. Durwood's evidence proves that the Wichita situation is not typical of the cases Commissioner Hennock and Commissioner Hyde had in mind when making the statements quoted. The people of the Wichita area have not been slow to convert to UHF.

Second, Stanley H. Durwood reports that his station, KEDD, is "affiliated with NBC and provides this network program service to Wichita and to the station's service area." (Petition, p. 2) Therefore, the KEDD service area is NOT one which Commissioner Hyde had in mind when he reasoned that networks would be reluctant to place their programs on UHF stations.

On the other hand, the very arguments that Stanley H. Durwood makes on the evils of intermixing UHF and VHF stations WOULD most certainly operate to the disadvantage of Station KSAC-TV, and to the people of its service area, were it assigned Channel * 58 instead of Channel * 8.

On February 1, 1955, approximately 41.0 per cent of the families of the home county and the seven adjacent counties of KSAC-TV owned television receivers. Only 1.2 per cent of the families in this area owned sets with UHF converters. (Exhibit 8) The Manhattan area, or part of this area, is served by 10 VHF stations, with less than two per cent of the area able to receive any UHF signal. The majority of families living in seven of the eight counties regularly watch TWO OR MORE VHF STATIONS. (Exhibit 8)

IF the arguments presented by Stanley H. Durwood in his Petition on the evils of intermixing are valid in any area, then it is obvious that the proposed change of frequencies would work a great hardship on the people of the Manhattan area, and would greatly limit the effectiveness of the non-commercial educational
efforts of the College.

With no UHF signals reaching most of the area, with fewer than two per cent of the families owning UHF converters, with most families already watching two or more VHF stations, with 41.0 per cent of the families owning VHF receivers, and with Chairman Hyde's testimony that in such cases there is little incentive for the people to go to the extra expense of adding or purchasing converters, the very evidence produced by Stanley H. Durwood in his Petition proves that the proposed change of frequencies would not be in the interest, necessity and convenience of the people of the Manhattan area.

In short, Kansas State College of Agriculture and Applied Science points out that the entire argument of Stanley H. Durwood's Petition on the point of "intermixed markets" is proof that the proposed change would be much more disastrous to the people of the Manhattan area than is such intermixing to the people of the Wichita area, and that the change would strike a fatal blow to the educational efforts of the College and defeat the purpose of the FCC in reserving channels for non-commercial educational use in Kansas.

For the above reasons Kansas State College of Agriculture and Applied Science opposes and respectfully requests the Commission to deny Stanley H. Durwood's Petition for a Hearing.

Respectfully submitted,

James A. McCain
President
Kansas State College

Mr. George C. McConnaughay
Chairman, Federal Communications Commission
New Post Office Building
Washington, D. C.

Dear Mr. McConnaughay:

As Governor of the State of Kansas I am writing your Commission in behalf of the continued reservation of three television channels currently allocated for non-commercial educational use in Kansas: Channel 11 in Lawrence, Channel 22 in Wichita, and Channel 8 in Manhattan (assigned to Kansas State College). I urge your Commission to hold all of these reservations until the Legislature of this state can find the funds necessary to build and operate the education television system as proposed to me by the five presidents of our state colleges.

For the past two years committees representing the five state institutions of higher learning, by direction of the Kansas Board of Regents, have been formulating a plan for the development of a state-wide system of non-commercial educational television to be supported by state funds. Unfortunately, the state is in the process of revaluing and reorganizing its tax structure. The TV proposal thus comes at a time when it is impossible for the State to implement it.

However, I personally, and I believe a great majority of the legislators and the people of this state, approve of the proposal as outlined by our institutions for higher learning. I feel certain that if given another year, the Legislature of the state of Kansas will provide the funds for the building and operation of a television system that will cover the entire state.
It seems to me that it is tragic if Kansas were to lose the channels of this great mass medium for education which your Commission so thoughtfully and courageously set aside, merely because of a 12-month delay in finding the necessary financial support.

On behalf of the people of this state let me express our gratitude for the patience your Commission has already shown in extending the reservations past the original year for which they were made. The people of this state are mindful of the tremendous value of these reservations, and I am confident they, through their elected representatives, will provide the necessary funds at the next annual legislative session.

Sincerely yours,

Fred Hall
Governor of Kansas
EDITORIAL COMMENTS

on

Educational Television

from

KANSAS NEWSPAPERS
A Good Move

Two long arms of friendship are reaching up and down the Klaw in a gesture of cooperation between the state's two great educational institutions. The clasp of cooperation heralds a new, healthy and unprecedented relationship between Kansas State college and the University of Kansas.

This, we believe, is all for the best.

As an example of the new order of friendship, the cooperation exhibited in the matter of educational television for the two schools is a prime case in point.

K-State and K. U. are going at this television business, you remember, with joined hands. This is wise and significant from several view points.

First, it sets a precedent for concerted action on many problems.

Secondly, it gives the ultimate request for funds from the legislature a better chance, for the sound reason that individual pleas would mean one or the other school suffering—and possibly both.

And third (probably a corollary to the first), it will save the taxpayers money, if followed through in other instances where joint action is expedient.

Rivalry on the athletic field and in certain other clearly competitive fields is certainly to be encouraged and cheered. But on too many occasions petty rivalries for state funds have been costly both to the schools and to the taxpayers, for obvious reasons.

Where the credit should go for this new era of inter-school cooperation we do not positively know—although we are inclined to credit the two “young” heads of the schools, Dr. James A. McClain and Dr. Franklin P. Murphy, whose energies and ideas know no bounds.

But to whomever the pat on the back should be given it is hereby heartily tendered with the hope that others, and many of them, are immediately forthcoming.

MANHATTAN MERCURY-CHRONICLE
November 1952

Proof Will Come

The tidings that Kansas State-college (and the University of Kansas) has received a grant of $100,000 for television, contingent upon receipt of matching funds, has been received in a few quarters of the state with a somewhat tongue in cheek attitude.

Those few quarters—and they are few indeed—admit to a measure of glee over the honor done Kansas by the grant. But, they hasten to add, the institutions should prove their television abilities before any appreciable stacks of state money should be put into the proposition.

A Healthy Start

The granting of $100,000 for television at Kansas State college from the Ford foundation is indeed something to shout about.

It is also something to worry about. Such is the case because the foundation stipulates—among other things—that matching funds must be raised in order to qualify for the Ford grant.

Securing these matching 100,000 dollars is easier said than done.

There are, of course, other private foundations to which K-State can apply. This it probably will do—or possibly has done.

It would appear, however, that a large share of the matching must be done by the Legislature—and without delay since one of the other strings on the $100,000 is that a like amount must be raised by January 31.

It would be a shame, indeed, if the Legislature did not see fit to provide the necessary money to secure the Ford grant.

Aside from the tremendous educational possibilities of television, there is a vast amount of prestige at stake in the Kansas State TV situation. The college was first in the nation to make application for an educational TV permit and likewise was first to receive FCC approval. Because of years of pioneer work done here, K-State stands well to become first among the nation’s colleges and universities to go on the air.

A lagging or reluctant Legislature could spoil that enviable record, the prestige of which, being based on a succession of firsts, could easily bring other funds grants.

It is to be hoped that whatever small consideration is asked by K-State for its television setup will be speedily handled and granted by the lawmakers at Topeka.

MANHATTAN MERCURY-CHRONICLE
Dec. 5, 1952

We can hardly agree with this attitude. Educational TV has proved ability to attract more than limited audiences and with: K-State’s close link to the farm groups of the state, there can be little doubt of the value of a television station at the college. The same can be said to a lesser degree of the cultural sides of the K-State picture as well as the university’s.

There is small burden of proof on Kansas State college. The burden is on the Legislature to provide reasonable and comparatively small backing for an advance in education which is certain to mean much to a large segment of the state’s population.

MANHATTAN MERCURY-CHRONICLE
Dec. 21, 1952
Rival TV

Robert T. Bartley, a member of the federal communications commission, has urged Texas to take the lead in use of educational television. A Texan himself, Bartley modestly like, to educators Texas "has the financial resources to construct the best technical plants at can be provided."

He dared them to blaze the trail for genuine locational programs, not merely imitating programs of commercial stations. Schools could plan and produce after-school audio-visual educational programs, the educators are told in Austin.

Others are thinking along the same line. A KA has been made for children's hour television programs from commercial stations, of commercials and of contemporary material objectionable to many parents. Who would sponsor such a program is not clear, perhaps this is the school's big opportunity. Perhaps television could step in, too, to meditate the shortage of school facilities. The vantage of teachers and classrooms is serous many communities, particularly in urban school districts. These are best treated to be served by television. Until such buildings can be constructed pupils will be reached via TV, this would be a temporary expedient.

Kansas State College and the University of Kansas are on that well known threshold of television programs. They have good equipment and ambitious blueprints. Recently the $100,000 Dr. to each hool for TV educational programs if they raise double the amount by January 1. The legislature meeting until after that deadline leaves a question whether the required any financing can be arranged. To start definite TV will cost sums that may pull legislators, particularly those beyond range. But all these are signs of the growth of the w medium.

A footnote to this discussion: A Kansas daily newspaper located beyond the range of several TV facilities shows no fear that TV will day will supplant newspapers in their additional field. The editor thinks TV offers itself in the way of news coverage and doubts whether it ever will become a real competitor newspapers. He notes that video is being pt alive by a few wealthy corporations, inks listeners are "captives" and sometimes willing audience of TV commercials, and at TV may have already hit its peak as mass entertainment.

No doubt the editor's views would be different were he located in a territory served by television. But there is some evidence that even without TV some of age and it does big a considerable time for locational programs. A means of communication as vital and powerful as video should be unurged by money-making concerns.

THE KANSAS CITY KANSAN
Dec. 11, 1953

NOW IS THE TIME

It is unfortunate that not more time is available for the two by Kansas—K. U. and K State—to take advantage of offer of financial aid from outside and of choice channels for television. If it were, the Kansas legislature in a couple of years might be in better position to look it over and decide as to whether to supply the state's portion of the cash.

However, two years is a long time in this fast-moving age and it is therefore fortunate the opportunity broke in time for consideration in this legislative session—such as it may reach the legislators to give it full study.

The educational opportunities in a joint television activity by K. U. and K State are inestimable. But one of the better features is that the advantages would not go alone to youngsters but to older persons as well. The things that can be taught by this modern means of visual education is almost unlimited.

The need for quick action is twofold—taking advantage of a large grant offered by the Ford Foundation and obtaining a choice channel. The future of educational television in Kansas hinges in large measure upon the latter if not the former.

It is to be hoped the Kansas legislature can see its way clear to take advantage of the opportunity for it is a long time, in this speedy age, before it meets again and by then the bird that could have been in hand may well be in the bush.

LYONS DAILY NEWS
Feb. 10, 1953

LYONS DAILY NEWS
Feb. 2, 1953
How Do You Like TV?

Educational TV, it is reported, takes it that when it comes to a large share of the 212 allocated channels possibly going for commercial purposes they are not claimed by June 1. The observation that many of them may revert to commercial use is made on a national basis because a number of state legislatures fail to see tremendous future of TV in extending educational facilities to citizens of their respective states. Too many are of the opinion that "educational TV" is only another system of transmitting instruction to the classroom.

Nothing, as it has so ably been pointed out by Kansas State College and the University of Kansas, is so far from the whole truth. Educational TV, as has been stated, is an expansion—and a wide one—of existing student bodies, particularly at the adult level where there is a crying demand for more learning.

Fortunately many Kansas Legislators now in session in Topeka see the whole educational TV picture as it is—not the limited one of "fancying" up classroom instruction.

MANHATTAN MERCURY-CHRONICLE
Feb. 18, 1953

TELEVISION AND ABILENE

Fifty years ago this western country had only a few telephones. Now it has a telephone in every home and you can reach not only any person in the state but any person in the United States by your telephone at your side. The electric light has spread until it covers an increasing large number of farms and soon will reach practically every farm in the country. The radio which came only a few years ago has taken the place of the man with the strong voice and meetings of all sorts can be brought to your bedside as they are delivered in the hall. All these things are part of the civilization that the world has seen in the past 50 years.

Now comes a new invention-television. At present it exists satisfactorily only in the large cities where there may be channels as they are called, which is the same meaning as wavelengths or bands in the radio field. These channels give a picture of life in the cities and in many places outside. Last June when the Eisenhower reception was held here a cable brought television from Kansas City to Abilene at a cost of tens of thousands of dollars but it was only a part of the political campaign.

Abilene did not seem bit but people all over the United States saw the speech of the day over the screen and enjoyed it.

A federal bureau called the communications commission decides what towns will have television. Already over a hundred towns are asking that privilege and Kansas University and the Kansas State college have been awarded a place in the forthcoming building. They can have a television at each school with a cooperative activity if they can equip their location and for such an action it requires considerable money to do that and the legislature will give Kansas a remarkable encouragement as it appropriated some funds in order to help those schools equip their institutions for regular operation.

Already Abilene has the beginning of TV reception. A number of sets are in place and if conditions were just right they give a clear picture.

When Manhattan, Hutchinson and other cities nearer by have service Abilene will take it on with great favor. It will not be long now.
**The Net Return**

Thanks to the work of an entering committee from both Kansas State college and the University of Kansas, it has been fairly-well established among thinking persons that educational television is a must for the schools and the knowledge-hungry citizens of the state.

Not only have the respective school officials capably pointed this out; responsible heads of state departments have attested to the invaluable help education TV would be to them in bringing more service to the entire state.

It has been proved beyond doubt that K-State and KU TV units would not be expensive educational devices. On the contrary, the per-person cost is amazingly low even compared to the most efficient instruction methods now employed.

These facts having been established—educational television via TV is coming.

**The COPPEYZVILLE JOURNAL**

Feb. 27, 1953

**Education Via TV**

Higher education via TV is coming.

Within the next four to six years, 95 per cent of the people in Kansas will have available to them higher education by means of television. That is the prediction of Chancellor Franklin D. Murphy of the University of Kansas and President James McCain of Kansas State College.

Educational television programs within the immediate area of the Lawrence and Manhattan transmitters will be available to more than 200,000 Kansans.

An additional 600,000 Kansans will be reached through cooperating commercial stations. Plans are well under way to bring the best in cultural, educational and informational programs to another 500,000 in north, northwest, west and southwest Kansas in the next four to six years.

The proposed educational TV stations at Lawrence and Manhattan are but the first step in a state-wide educational television network for all the people, taking the full resources of the University of Kansas, Kansas State College and other state-supported institutions and agencies to the people who support them.

The swift advance of television facilities in the past two years would lend credence to the belief that the college heads were a bit modest in their prediction. Indications are that many more TV stations will be licensed soon, and the result may be a larger audience for the educational programs than now expected.

**EDUCATIONAL TELEVISION**

The matter of appropriating some $400,000 to put the University of Kansas and Kansas State College in the non-commercial educational television broadcasting business is before the state legislature and likely will be approved.

The issue has raised a number of precedent setting questions which the public deserves to know more about.

The plan is unique in many ways; one of the important results being that it would bring the state's two major educational institutions into a closer "working together" atmosphere which is bound to be good for everyone.

Transmitters and studios located at Lawrence and Manhattan would be linked by micro-wave and would broadcast simultaneously the same programs—to an estimated 95% of the population of the state.

The schools have presented evidence to the legislature that it would be cheaper to operate these two smaller stations than one big one powerful enough to reach the same area. After the initial cost period is past the schools claim that their educational TV work "will more than foot its own bill" through increases in sales tax revenue to come by sale of TV sets and equipment.

The stations would broadcast all types of educational, cultural and entertainment programs from four to six hours a day, 365 days a year.

**And a source close to the head office of one of the schools said it would be a safe guess that this network would carry at least many of the major football and basketball games. There would be no commercials.**

**Kansans must decide now whether it is to take advantage of what has been termed the greatest advancement in education since the invention of the printing press. This has to be the time of decision because the educational channels are reserved by the Federal Communications Commission only until June 1, and the Ford Foundation offer to finance half the cost, or $200,000, is good only until April 1.**

If the educational TV network will pay its way, as the schools say it will after the installation cost, it would seem like a mistake for the legislators to say no.
TV for Higher Education

Many organizations of Kansas are making a pitch to the legislature in these fading moments to appropriate funds for a television station building for K. U. and K-State, as well as money to operate the station. We say fading moments because the offers which make this station possible are soon to be withdrawn.

The state's two big schools now own television equipment valued at $450,000 and the Ford Foundation fund for adult education has offered $200,000 toward construction of a station. Now each school needs an appropriation of $125,000 for the station and $50,000 a year operating expenses.

Total cost to the state for building the station is $250,000 and that represents 38 cents for each family in Kansas, and about 17 cents a year for operation expenses. There is an additional gift in this proposition. The two channels assigned free of charge to the schools are worth about two million dollars.

While the majority of Kansas can see the value of going ahead with this project, they are still dubious. "How can I benefit from a television station in Eastern Kansas?" they ask. That would seem to be the stumbling block. Why pay for something you can't enjoy? Dr. James A. McCain, president of Kansas State college, answers the query by pointing out that the installation includes kinescope equipment, enabling reproduction of programs on films. These films are made available to commercial stations in all parts of the state. Too, technological advancements in the near future will increase the range of transmitters.

Some persons may wonder why there is such a hurry to get the word to legislators and ask that they vote "yes" on the appropriation. It's no secret that the Ford Foundation offer expires April 1. If state funds are not approved by then the outside offer is worthless. Too, on June 3 the non-commercial TV channels for K. U. and K-State expire.

Proponents, and to date most of them are interested in the educational angle of television, have a month to sell the project to the legislators. That means both houses must approve and the governor sign the appropriation bill. But there are other things before the legislature and some are hot issues. It will be interesting to see if the supporters of educational TV can break through the lobby guard at Topeka and sell their project before the gift offer floats down the Kaw.

ARKANSAS CITY DAILY TRAVELER
Feb. 26, 1953

Statewide Campus

The illustrious but often expensive wish of residens over Kansas that they could live closer to the state universities could become a reality with installation of educational television.

This longing for sharing in cultural benefits of educational centers was noted by Chancellor Franklin D. Murphy of the University of Kansas who said he heard it expressed frequently in his visits to more remote areas of Kansas. Dr. James McCain, Kansas State college president, who has joined Murphy in urging the Legislature to appropriate $450,000 for the start of an educational network, pointed out a university campus was an ideal studio for TV purposes, taking the camera into classrooms, laboratories, museums, libraries, concert halls and stadiums.

From its inception, radio was considered an educational medium by the British, whose industry is carried on by the government both in this field and in television, Dr. Murphy said. In this country, radio followed tradition in becoming an activity of private enterprise and primarily for entertainment, he pointed out. He found no fault with the American conception but declared educational television, for which 30 channels will be allocated this year, must realize on its immediate opportunity.

Within four or five years, it is estimated, coverage of the entire state will be possible, with stations at Lawrence and Manhattan as the centers. Education by television is in step with an expanding demand for adult and extension courses which could make a classroom of every living room.

Hundreds of subjects which could be explored have been listed as examples, ranging from a farm hour, mental health, what's new in medicine, science in the news, the stars above and soil conservation practices to remodeling a home, gardening, Kansas history, a hobby workshop and preparing an income tax return. Possibilities of its use, for which six hours of daily telecasting beginning in 1954 are tentatively scheduled, are endless.

As the young heads of the state's two largest schools see it, after months of study of potencies and procedures for attaining them, education stands at a new threshold in use of television. An immediate beginning toward fulfilling this opportunity is one which the Legislature can now achieve in approving a two-year appropriation, placing Kansas with a dozen other states moving into the same limit-
Now—or Later?

The question of educational television is hanging fire in the Kansas Legislature. So far the reception has been a pretty cool one, both with legislators and citizens over the state. As with any new gadget, there is a general tendency to hold back until more evidence is available on its value.

The danger is that Kansas will delay too long. As of the moment, the Federal Communications Commission allocation of educational channels for television expires on June 2. The FCC may or may not extend the period of grace. That decision probably will not be made until after the legislature adjourns.

In order to evaluate the possibilities of educational television, it is necessary to look at the whole picture. Kansas is not the only state where the subject is under discussion. Educational via the television screen is a new but promising field. The potentialities, both for young and adults, appear to have few limits. The FCC has reserved 242 channels throughout the country for educational use. Fourteen permits have been granted to date, other applications are pending.

A joint undertaking, to be financed by an appropriation of about half a million dollars, is planned in Kansas with the state college and state university to share facilities and operating functions in order to hold expenses to a minimum. The chief criticism, beyond the cost is that reception would be limited to relatively small areas of the state. That is true—for the present. But new developments that could carry the television signal to all parts of the state are not out of the realm of possibility.

The question is whether Kansas will have that opportunity where at a later date if it passes by the present FCC deadline without action. Commercial interests are exerting great pressure for many of the channels reserved for educational use.

The cost of entering the television business is not small, as emphasized by the half million dollar request for the state schools. Even that will not be enough for the original investment. The Ford Foundation has promised to help out with a grant of $100,000. There is natural doubt as to the advisability of spending the money now, but in view of the imposing possibilities of educational television, it’s altogether proper to turn the question around and ask if the state can afford not to take advantage of favorable circumstances that would permit entry into the new field at this time.

THE PARSONS SUN

Feb. 20, 1953

Op-Ed Educational Television

The Russell News opposes expenditures of tax funds for television for the University of Kansas and Kansas State college on the ground that all of the people would be taxed for the benefit of only a part of them, those within ranges of TV stations.

This is an old argument, applicable to any many types of public service. Many persons could argue that because they have no children they should not be taxed for support of schools.

The universities and hospitals are supported by all the taxpayers thru property or income taxes and many do not benefit directly or at all. A majority of the citizens of Kansas reside in cities yet they concede the value of the soil testing laboratory at the colleges. Many citizens can argue that they have little use for lawyers. But they will admit that training must be provided for those who do choose the law as a profession. The list of services providing for a limited number of citizens at the expense of all the taxpayers is long. But the thought behind it is that these are essential to general welfare.

Television from the two leading educational institutions would serve a large proportion of the state's population and the initial appropriations sought is not unreasonable.

THE KANSAS CITY KANSAN

Feb. 22, 1953

EDUCATIONAL BARGAIN

Television offers some wonderful opportunities in education, and it is not surprising to see Kansas up on its toes and trying to keep its place as a leader in this, as in so many other things in the past.

The state's legislature has not yet said whether it will provide the approximately $400,000 by which its two big schools — K.U. and K-State—can acquire half that much from private funds and get into the swim infinitely and effectively. But it is pondering the question, which in itself is a good sign.

There is nothing quite like visual education for doing the job. Television contains all of the elements of the old rule that has pictures being worth thousands of words. More and more schools have found that when they can obtain good educational films, they can get ideas into pupils' heads much faster and surer and without the usual resistance to "dull old books." Adults are not much different, because the kid's reaction is really just human, not exclusively juvenile.

Our colleges have been able, by use of radio, to impart considerable knowledge to adults throughout the state, usually without their feeling they were studying. What radio has been able to do in that respect is but a drop in the bucket compared to what television could do. By use of moving images, the fascination is half guaranteed. It takes only a little judicious selection and preparation to provide the other half.

If a single community the size of Lyons can do such things as build a new hotel costing a third of a million dollars, and a new sewer disposal plant costing a quarter of a million, then certainly a great state like Kansas can have little difficulty in scraping up a similar amount for bringing our big universities and a spectacular and promising new facility together.

It's less than the cost of a field house or a stadium for each and, who knows, such practical education might be worth as much. It's an educational bargain if we are honestly in the mood for one.

In future years, the Kansas TV scene is bound to be suffused by soap operas and people-growing programs and corny performers, if all the good channels are left to commercial outlets. It is up to us to decide right now whether there is to be a wide streak of worthwhile material running right along with it and competing against it for the time and the minds of our people. Our big colleges want to do the job and have given their premise that they will do it, if only they have the chance.
TV For Free

The University of Kansas and Kansas State have produced some impressive arguments in favor of their joint educational venture for which they are seeking legislative approval. The most telling one is that after the two interconnected stations are put on the air, the state will enjoy the services practically for free.

Thanks to student labor, existing facilities, and the freedom from the sales, promotion, and overhead expenses, commercial TV operations must meet, the schools believe they can operate their stations for no more than $200,000 a year.

These non-commercial stations will serve close to 100,000 Kansas homes which probably never will be within range of commercial TV stations. To get the service these householders will pay an estimated annual sales tax of $130,000 on their sets and tubes and an additional property tax of $90,000 on their receivers.

So if the legislature is willing to ante up no more than $300,000 to get the two university stations on the air, for less than no cost at all to Kansas government, this state can have an unmatched new medium for public education.

HUTCHINSON NEWS-HERALD
March 12, 1953

Television can be made the states’ most inexpensive form of education in the comparatively near future if the State University at Lawrence and Kansas State College at Manhattan are permitted to install the necessary equipment. President James A. McCain of Kansas State and Chancellor Francis D. Murphy of Kansas University have joined in the appeal for the necessary appropriation. As it seems certain television soon will be available throughout the state, the plan seems sensible and should have the public support.

J. R.

BURLINGTON REPUBLICAN
March 19, 1953

Educational TV Report

Television stations for educational purposes will be erected on the campuses of the two larger state schools if a proposal now before the State Legislature is approved. If funds are made available, telecasting will provide tremendous possibilities in the field of mass education as well as in the public classroom.

The proposal would call for a station to be built at Lawrence and another at Manhattan, to be linked by microwave. At first, transmitters and studios at the two colleges would broadcast the same program simultaneously to the two areas. More than 210,000 Kansans live in these areas.

By timing all programs and distributing to Kansas commercial TV stations another 600,000 citizens of Kansas could be reached.

In the near future it is planned to erect two booster stations to serve areas not reached by the two stations. In this manner another 540,000 Kansans could be served. To these people of southeastern, northern and western Kansas, this will probably be the only chance of TV reception they will have.

This entire network would give excellent reception to 95% of all Kansas families, while the remaining 5% could expect good reception most of the time.

Much of the money and materials for the booster stations and the TV stations will be gifts. These gifts will come from television manufacturers interested in developing new TV territory.

If Kansas is to make this service available to its citizens, she will have to decide now. The Ford Foundation has offered $800,000 to colleges erecting TV stations, but this offer must be accepted by April 1, 1953. Also the Federal Communications Commission has reserved these channels for educational purposes, but only until June 2, 1956.

Surveys show that people of Kansas want educational, cultural and informational programs. In other areas where such programs have been made available, records show that these educational programs command large audiences.

Those who have studied the matter declare that this is the cheapest per capita form of education yet devised, and has proven very effective. TV will replace several services now being rendered by the colleges, and as services expanded, costs will go even lower.
Sunday Stuff

One of the istic things pieces of news during last week was that the Senate Ways and Means committee in Topeka had killed a bill which would have provided funds for educational TV at Kansas State and Kansas university.

Of course, there is an avenue or two yet open by which the funds can be appropriated. But the discouraging thing about the Senate committee’s action is that it was taken without even hearing a hearing to proponents of educational TV from either of the schools.

Now, if the proposition were merely a scheme to get state funds for some fancy frills or playthings, it would seem only natural the bill would be summarily killed. However, as has been pointed out time again in many of the most responsible newspapers in the state, educational TV is not a plaything or a frill, but actually is the most economical method of teaching yet devised.

And above all this, it has been irrefutably pointed out that the state would realize revenue enough from the taxes on television sets sold if educational TV is established to more than make up for the appropriation asked.

On top of the fact that no hearing was granted TV proponents is the almost-unbelievable development that the committee’s killing opinion was based on a New York report unfavorable to educational television that has been roundly criticized as a document conceived with a political ax to grind.

In the New York Times, the report unfavorable to educational TV was termed “so ingeniously misleading and superficial as to border on the ludicrous.”

That was about the mildest thing said of the report used by the Kansas Senate committee to form its opinion. Mind you, the minority report was not even considered, but how could you expect that when no hearing was granted the folks from either K-State or KU?

We could go on and on about the reasons FOR providing educational TV funds, mentioning, among other things, how it will bring much-wanted education to 95 percent of the people of Kansas at a terrifically low per capita cost.

But if you can’t get the committee to listen to facts instead of considering an incredible and discredited document from New York state as the basis of its decision, why go to the trouble?

MANHATTAN MERCURY-CHRONICLE
March 22, 1953
Is Educational TV Lost for Kansas?

The educational television boat is passing away from Kansas, and the Kansas legislature is about to miss it.

The Senate, in fact, has decided to sit on its hands by permitting its ways and means committee to kill a bill for $450,000 to construct TV stations at K-State and K.U. The House apparently is sitting on something else.

While Missouri employs a manager and chief engineer for Missouri university's television station, the ways and means committee of the Kansas Senate has not even bothered to have a hearing on the merits of proposed educational television for Kansas. Why did this happen?

Basically the reason is three-fold: (1) Ignorance, (2) age, and (3) lack of vision.

Not that the members of the Senate committee are ignorant generally, far from it. They are men of intelligence and stature, but they lack information on the merits of educational television because they lack interest. This was pretty well established by their lack of desire for a hearing on the bill. Age. Yep, they've mostly got more of that than they want. Lack of vision. Again, it isn't a lack generally, but specifically.

Many of them are not acquainted with television since they live in areas not now covered. They have not realized what a force for education and information TV already is. So without a background of information and acquaintance with TV, it is not surprising that they have lacked vision, in this case, to see how important educational TV would be to the people of Kansas.

Besides, these men have been deluged with appropriations problems. The legislature is like an avalanche. An impression of what lies ahead is made in the beginning days of the session, then the thing teeters for weeks, and finally the closing days bring the avalanche. Every once in a while, a committee gets buried in the 'snow.'

Contrary to the impressions of some legislators, TV is not a play thing. It is not a toy or a fad. It is the greatest medium to date for mass entertainment and information. It is the educational tool par excellence. Why? Because it will get information and instruction to more people for less cost than any other means.

Where is the money coming from to build transmitters at Manhattan and Lawrence? The Senate just finished allocating $322,650,000 in state sales tax. It could have come from that. A bill now in the House provides a one-cent per gallon beer and wine sales tax. It could come from that. The appropriation call for state college recommends a sum of $450,000. Probably the law does not scream to high heaven, because the cost for TV would probably be of more value to the state than some projects $450,000 has been recommended for. There are a couple of state institutions, such as the one at Dodge City, that exist today from habit but not need.

The money is available if the committee wanted to get it, in our opinion.

We do not mean to be overly critical of the Senate ways and means committee. They were not impressed with the need for action now on educational TV. In the sales tax business, when a prospect doesn't buy, the@student gets the blame, not the prospect.
Kansas Lag on Educational TV

One of the serious oversights by the 1953 Legislature was to let the proposed joint operation of a TV station by the two big state schools go by the board. The University of Kansas and Kansas State requested an appropriation for installing facilities for this latest means of education. But the ways and means committees of both branches frowned upon the idea. They then let an authorization for accepting $100,000 from the Ford Foundation die in the waning hours of the session.

It has been proved over and over that television can be a valuable tool in education, when properly used by skilled teachers. The sad part of the whole business is that no funds were requested or received. The lack of interest on the part of the legislators, it is hoped, will be remedied at the next session, they will revert to private operators of TV stations.

Actually, the deadline set by the Federal Communications Commission for non-commercial educational TV is June 2, 1953. Unless the time is extended, many of the 242 television channels reserved for educational TV will be made available for private operators. This is true of both states, including Kansas, that are dragging their feet on this important modern aid to education.

Educational TV Setback

The Senate Ways and Means committee, which turned down the request for funds to operate a state educational institution television station has suggested that students and alumni themselves raise needed funds. But the committee doesn't know how this can be done. Members have stated to a group of students who called to express surprise and concern at rejection of the bill.

Chairman Bentley is quoted as saying the state was simply out of money. Unless friends of the university and state college can raise $100,000 the appropriation bill has little chance for survival.

It is to be hoped that should the legislature finally fail to appropriate funds, legislation that the Federal Communications Authority enact an extension of the claim to the channel.

"What is the hurry?" inquired the Lawrence Journal-World. "Both radio and TV have been spoken of as holding 'great' educational possibilities, but their use for that purpose is still in the experimental stage. It could not be expected to spring suddenly developed in an instant, as careless talkers and thinkers have intimates that it would. Like anything else, that form of education will require a period for acquiring know-how. . . . Legislators can not be blamed for failing to make appropriations for purposes not clearly defined. It takes time and thought to fit the cost of new facilities into the budget. The federal powers-that-be would show wisdom in delaying a final showdown on educational TV."

Granted, the future of education will not be doomed to dull mediocrity by failure to obtain the TV appropriation. But sponsors believed, and with good reason, that the FCC meant business when it fixed the June deadline.

There will never be an ideal time to start educational television.
Editorial

Editorial Condemns Legislature's Failure to Appropriate TV Funds

One of the first newspapers in the state to condemn the legislature for not voting funds to construct educational television facilities for K-State and KU is the Topeka Daily Capital. In an editorial this week the Capital says, "One of the serious oversights by the 1953 Legislature was to let the proposed joint operation of a TV station by the two big state schools go by the board."

"Reasons for lack of interest in the TV project among the legislature," the editorial states, "were never made clear. In view of large sums appropriated," the Capital continues, "for other welfare and educational purposes, it would seem that some start in taking advantage of the opportunity offered would have been wise."

Apparently still holding some hope that the two schools may someday get educational channels, the Capital points out that the actual deadline set by the Federal Communications Commission for non-commercial educational TV is June 2, 1953, and goes on to say, "Unless the time is extended, many of the 212 television channels reserved for educational TV will be gone. And those states including Kansas, that are dragging their feet on this important modern aid to education will rue the day their governors and legislatures lacked progressive vision."

The Capital editorial points out that according to a recent study by UNESCO, 67 states and universities in the United States are engaged in some kind of TV activities and 37 are currently offering courses in TV. For example, the editorial states, "the experimental work undertaken at Iowa State College suggests that TV, if imaginatively used, is an excellent means of stimulating city-wide interest in local problems."

"This is an addition to the educational interest," says the Capital, "by both teenagers and adults."

Emphasizing what Kansas is missing by not having the educational TV facilities at the present time, the editorial declares, "One of the large scale education programs being planned for this summer is the CBS-TV Coronation broadcasts. This will be supplemented with study projects in U.S. history, geography, economics, language, music and art. More than 100 stations in the CBS television coast-to-coast network will co-operate in distribution of manuals among the universities, colleges, high school, junior high and elementary schools in their broadcast areas."

And in closing the editorial says, "It would be a great loss if the two biggest state schools ultimately are denied the use of the educational channel now available. The indifference of the lawmakers will be responsible for the damage."

The excuse that a New York state report on educational television was responsible for the legislature's negative vote on TV appropriation doesn't satisfy us either!"
Kansas Colleges Lose TV

Several weeks ago this column praised the "look ahead" by administrators of both Kansas University and Kansas State, our two largest state schools, in their moves to secure a TV permit for both schools for educational purposes. However, we were somewhat let down in our thinking by the Kansas Legislature just ended, which failed to vote funds for installing the TV stations while the educational non-commercial channels were wide open.

Doubly detrimental was the fact the legislature in voting down the forward-looking proposal, our two colleges will not be eligible to receive the $100,000 grant offered by the Ford Foundation to offset the total cost.

Television, no doubt, will prove a valuable tool in modern education practices. Our universities to date have been leaders in the educational field, and also in television research. Now they stand to lose it all and be shoved backwards in educational circles. Deadline for awarding the TV channels for educational purposes is June 2, 1953. The 242 channels to aid education will soon be gone. Then it will be too late to correct the legislature's mistake, this deponent feels.

Sixty-five colleges and universities today can boast of TV programs. Kansas isn't or won't be one of them. Reason for the legislators letting our higher schools of learning down, is not known by this newspaper.

Money in large sums was and can be appropriated for many other less worthwhile things by the legislature. Why not for supplying TV stations for our universities?

As we see it now, the opportunity has passed. Just what the loss will mean is anyone's guess.

* * * * *

THE LIBERAL SOUTHWEST DAILY TIMES  
April 10, 1953
A Kansas TV School.

The state of Kansas is a focal point for a movement made possible by the advent of the new medium. Educational television offers a splendid opportunity to provide a university education to many citizens. Kansas has been slow in developing the educational TV system, but the request for educational television in Kansas is being made by the Federal Communications commission. The Kansas TV system is not at fault for educational television, and it is not, educational television offers a splendid program that may be beyond the scope of pure entertainment. But educational television (produced by schools sponsored by educational organizations) has been slow in developing despite the 281 channels allocated for the purpose by the Federal Communications commission. The Federal Communications commission is financing educational television. Schools are reluctant to include it in their already tight budgets and private capital funds can be expected to flock to a venture that offers no return.

This week the five state-supported schools of Kansas announced that the 1933 Legislature will be asked for 1 million dollars to provide educational TV. With microwave relay points an estimated 900,000 citizens could be reached.

The request deserves serious consideration, for the possibilities in the fields of adult and child education are unlimited. And Kansas, with a reputation for progress in education, could take another step forward with educational television.

ean stations wherever it has gone on the air. Thus Kansas has lost two years of progress in this field.

Now, with a new Legislature coming on in January, it appears educational television will again come before the voters for their consideration.

The obvious weakness in the 1933 plan has been discussed. K-State, K.U., and K.C. have exhausted the educational TV system but the other three state schools are not in a position to adopt the system. The lack of communication results in some disagreement. And though this idea may have been disapproved by farmers, the people.
Educational TV—but not for Manhattan

Educational TV has taken its limits, but if it is to develop, ten educational TV stations are now in operation. The Joint Committee on Educational Television says that substantial progress is being made on 12 more, and there is hope for at least a few others.

The FCC, in response to a pretty vociferous demand and also because of its own convictions set aside 252 channels two years ago for educational TV stations.

One of these channels was allocated to Manhattan, and another to Lawrence. As our readers know, Kansas State College and the University of Kansas were unable to persuade the legislature to vote money for the necessary stations and programming, although the Ford Foundation had promised a substantial contribution.

The Kansas educational institutions ran into a snag resulting from a combination of circumstances.... On the one hand, the legislature just wasn't ready for it, and on the other, commercial interests in Kansas City had designs on the Lawrence channel. The combination resulted in defeat for educational TV in Kansas.

The right has not been lost, and the 1955 legislature will reconsider the matter, with what results it is too early to say.

It is interesting to note, however, that educational TV has run into difficulties elsewhere also. In Denver the board of education is still struggling in an effort to convince the public that educational TV is worth all the money it costs. The University of Nebraska has apparently settled for some hours on a commercial station.

So far there are educational TV stations in Houston, Los Angeles, East Lansing, Pittsburgh, Madison, San Francisco, Cincinnati, St. Louis, Ames, and Columbia. The Columbia station sometimes comes into Manhattan pretty clearly. Under construction are stations at Chapel Hill, Boston, Columbus, Ohio, Champaign-Urbana, Detroit, Seattle, Oklahoma City, Tulsa and Mumford, Ala.

The JEC says that substantial progress is being made in Memphis, Chicago, New Orleans, Athens, Ga., Atlanta, Denver, Philadelphia, Cleveland, Miami, Toledo, Nashville, and Birmingham.

The impact of educational television is tremendous. I had occasion to see a University of Nebraska show in geology recently. It came at an awkward hour but the program was terrific. There is hope here that we the voters and rulers of the republic may catch up with the 20th century.

The FCC and educational institutions have learned a lesson from radio. Kansas State College, for example, was early assigned one frequency, and later a commercial station in Topeka took over more and more of its time. As it happens, radio frequencies are not of great moment in this day of TV, but had TV not come along or FM not released new channels, the college would have been in a bad way to develop an educational program on the airways.

Many educators and students of government believe that the universities and colleges will find more and more of their fruitful activities... the years ahead in adult and extension education... and in carrying information to the public at large.

Unfortunately, there are, only so many frequencies and so many channels, and once they are taken by commercial interests they are unavailable for educational institutions.

Therefore, many people are concerned that the bill may not be funded this time on educational TV and that good channels may be allocated and used while they are available.

As it happens, the only very-high-frequency channel which has been able to do much good for other viewers (which has been able to do much good for other viewers or operators) assigned to Manhattan has been the educational channel.

It is to be hoped that the people of Kansas insist that it be put to the use for which the FCC intended it before it is too late.
Educational TV for Kansas
Feb. 17, 1954

The house of the University of Missouri, and a
related college in Kansas, they will -
with the assurance of continued backing in the
field, both men agree.

This is due in part to the opening of a new com-
pany to gain legislative backing in 1954 for the
four television project which failed to "get off
the ground" at the last session.

Jim McCullough says that television rapidly is be-
ing education's "fifth dimension".

Non-commercial stations are being constructed at
the universities of Wisconsin, North Carolina, Ohio
State, Arizona and Illinois.

The University of Missouri and Iowa State Col-
lege already have commercial TV stations, but
devote much of their air time to educational pro-
gramming.

Community-based educational television stations
are planned for the cities of Pitsburgh, St. Louis,
San Francisco, New Orleans and Chicago.

Education television already is being aired regu-
larly from the University of Houston and Los
Angeles.

Oklahoma, our neighbor to the south, has autho-
ized a state network of 10 such stations.

Results from educational television are amazing
educators who are watching them closely. The
audience reached with such educational programs
promises to make television the cheapest means
of good educational technique within this genera-
tion.

Kansans tried to get started on the ground floor
two years ago, but when the last legislature let

A Great Difference
Parsons Sun Oct. 1954

St. Louis has a new educational

television station and also it's
been on the air only a short time.

St. Louis already is beginning to realize benefits. Not to mention, either, the vast difference be-
tween educational and commer-
cial television.

One of the programs this week on the new station dealt with a "stop box" discussion of a lively
community issue. The allotted
time for the program was 30 min-
utes. At the end of the half hour, however, debate was waxing so
warm and proving so informative, the station continued the pre.sentation another 30 minutes.

The ensuing program had to wait.

"Prior commitments" need not be a ruling factor in educational television and that is only one of the
advantages it offers as a new and valuable medium for spreading information and enlightenment among the public.

The last Kansas Legislature, by a 17-13 vote, killed a similar bill last year. This was due to
the personal contacts with the legislators by the
promoters who felt they deserved the benefits and
were willing to pay the cost.

Educational Television

Chances are good the next Legislature will ap-
prove the start of an educational television net-
work for the state schools.

Educators have agreed that TV can be a great
boon for education, bringing the wisdom of our
universities to the thousands of Kansans outside the classrooms. Educational TV shows will be beamed to rural and small
city schools, and extension type programs can be brought by the new medium to the citizenry at large.

The taxpayers will easily get their money's
worth from the project — providing they insist
that its promoters got the most mileage possible
out of the money invested.

As plans are evolving now, chief promoters and
chief benefactors of the TV project will be
Kansans State and K.U., it is natural, since they
are the two big schools, that this is so. But
construction of TV stations, with a tower located
somehere between Lawrence and Manhattan,
might turn out to be false economy.

A shift in plans with relocation of facilities
would permit the teachers colleges at Emporia
and Pittsburg to participate.

Kansas has to dig an investment in its smaller
city schools to prevent them from being ignored, and
educational TV will serve us better and be more
worth while than cooperation, among all the state
schools.

KANSAS TRIBUNE
April 15, 1954
TV Would Help

It is perfectly apparent in a general way that the extension services of Kansas State College have made great strides over the course of the years.

But a brochure dealing in specifics has recently been issued by Dean L. C. Williams. In it, Dean Williams summarizes the impact of the extension services on the people of Kansas.

That entire summary, probably, is the highlight of the report rather than the number of contacts made, which incidentally ran to the astounding figure of 4,906,931 including personal visits, telephone calls, meetings, publications and other means of reaching rural residents.

That highlight is contained in a statement by Dean Williams which describes the purpose of the extension services as being "to assist people in solving their own problems."

The Lawrence Journal-World, which takes cognizance of the K-State report comes to this conclusion:

"That showing, together with the greatly expanded program of the University of Kansas extension division in recent years, highlights a great change in the services rendered by the Kansas institutions of higher education. They are carrying their services to persons remote from Lawrence and Manhattan as never before.

"The increased enrollments of students in residence is impressive, but they tell only part of the story. The means of carrying educational opportunity to people in their homes wherever they may be have been greatly enlarged by modern devices and methods. That development is not based solely on the desire of the institutions to serve. It is stimulated by the desire of the people served to increase the knowledge required for better work and living."

We would add only one thought to the creditable record of the extension division and the comments thereon.

That would be to dig in even harder toward procuring educational television for our two great state schools.

What has been an amazing record of achievement by the extension division during the past years would not even hold a candle to what could be done in "assisting people in solving their own problems" through the medium of educational TV.

No doubt additional avenues will be made open to the extension division. But it would be a shame to hold down the progress of such a vital service to the thousands remote from Manhattan and Lawrence simply because of continued failure to recognize the possibilities of educational television.

Video instruction already is playing itself
TV as an Alma Mater

The presidents of our state colleges have recommended an ambitious program to literally blanket the state with an educational television system. Except for the cost (it is estimated at $8 million dollars, to be spread over eight years) no irreconcilable grounds for opposition to the proposal are evident.

The college leaders' announcement a day preceding their recommendation, in reports reaching here at any rate, did not detail the plan as regards the type of programming, other than to call it "educational television." It is reasonable to assume, however, that the telecasts would include both scheduled instruction in various subjects of particular interest to adults, and one-time programs of wide cultural appeal.

There can be no question of the value that television has as a medium of education, and it is not extravagant to say that commercial television alone, with its primary purpose is to entertain and thereby to sell, is making us a better-informed people, by the hour, than we ever were before. Properly presented educational television would do the same, but more rapidly.

The $8 million-dollar price tag represents a substantial amount of public money even in this era of multi-million dollar government. To justify such a cost, educational television would have to be conducted on a maximum appeal basis, and it will be the burden of its proponents to prove that it is worth the cost. Particularly will this be so as regards those taxpayers who live in areas remote from commercial TV stations, who do not have receivers now and who may have no thoughts of acquiring them.

More details of the proposed development will be awaited with much interest.

KANSAS CITY KANSAN
Dec. 27, 1954

Education Through Television

Ultimate solution to the problem of financing higher education is not more billions of dollars, but television, a former college president, Constance Warren, writes in the New York Times magazine. John Gutenberg's invention of movable type provided the basis for modern education, the author says. It may not be possible to keep up the dollar pace with the demands of education. But longer for the problem will be overwhelming by 1970 when colleges will be engulfed with students. And this is where TV comes in.

The "obvious solution," the writer calls it. Since doubling the number of buildings and teachers is out of the question in the next fifteen years—even if the billions of dollars required could be raised by one means or another—video on and off the campus is the answer.

"TV channels occupy the air which, from the viewpoint of electronics, communication is a form of real estate owned by the government," says this writer. "Like any other real estate there is only so much of it to go around. Only so many radio wave bands and even fewer video channels can take up room in the air. At present the Federal Communications commission the government's real estate broker for the air, is reserving 252 channels for educational purposes—222 channels which could supply a large share of "double facilities" that higher education is looking for and at only a fraction of the cost of any other method of settling the problem of numbers. The only "if" the FCC has attached to its offer is that schools, colleges and other institutions interested must prove they are attempting to raise funds to operate TV channels. Otherwise, most of the 252 will be given over for commercial use. It boils down to this: If the schools and colleges take up their options now, they will probably save themselves a large part of the amount they will be obliged to spend for expansion of plants by 1970. Air is cheaper than bricks and ground and TV sets are more plentiful than faculty members."

This ex-college head knows what she is talking about and while her comments on the need of schools of higher learning using TV to the utmost is now new, it should serve, to remind Kansans our state schools are looking ahead and planning for use of TV so they will be able, by the time they can install telecasting stations, to meet demands made upon them.

At the last session of the legislature House and Senate turned a deaf ear to requests for TV consideration by two institutions (K.U. and X-State). This year all five state schools are seeking TV channels. They vision the time their campus buildings will be taxed beyond capacity and their services in education limited by dollar scarcity.
Classes: Vic TV

Paraphrase:

The University of Southern California plans to offer college credits with television taking instruction out of the classroom and into the home. One of the major networks is cooperation with the university in an experimental program which also will be available to educational television stations throughout the country.

The potential of television as an educational medium has not been touched. The new form of communication to date has been one largely confined to entertainment, and much of that was just beginning to push its way into Kansas from stations in neighboring states.

The two educational institutions did their level best to "sell" the legislature the opportunity. But words and argument just weren't enough.

It will be different when the legislature meets again in 1955. By that time television will have reached clear across the state, except possibly to some areas in far Western Kansas. There will be real TV interest at the grassroots level.

The educational TV program should be a much more appealing package for the legislature in 1955. It is a pity that the state's two leading educational institutions couldn't have been given a two-year head start on the project. But it is understandable when one considers the financial pressures applied in Topeka last winter.

The educational TV setup should be dug up out of the desk drawers in the near future, dusted off, brought up to date and then "sold" to the people of Kansas well before the legislature meets again. Next time it can come out a winner.

That Educational TV Plan

The state legislature turned down an excellent opportunity to put Kansas right up in the front ranks in the brand new field of educational television last winter.

Kansas State College and the University of Kansas had jointly worked out a far-sighted educational TV program which could have been financed as we recall it, by the sales tax on television sets sold.

The legislatures turned it down.

The legislature that session was beset from almost every side with requests for increased appropriations. More money, more money, more money was the Topeka theme song.

So when the brand new television plan was dumped into their laps they probably figured that this is something we can get along without.

Most of the people who voted the bill down last winter knew little about television. Commercial television, held up by tight federal regulations, has just beginning to push its way into Kansas from stations in neighboring states.

The two educational institutions did their level best to "sell" the legislature the opportunity. But words and argument just weren't enough.

It will be different when the legislature meets again in 1955. By that time television will have reached clear across the state, except possibly to some areas in far Western Kansas. There will be real TV interest at the grassroots level.

The educational TV program should be a much more appealing package for the legislature in 1955. It is a pity that the state's two leading educational institutions couldn't have been given a two-year head start on the project. But it is understandable when one considers the financial pressures applied in Topeka last winter.

The educational TV setup should be dug up out of the desk drawers in the near future, dusted off, brought up to date and then "sold" to the people of Kansas well before the legislature meets again. Next time it can come out a winner.

PRATT TRIBUNE
Nov. 4, 1953

Educational Television

Hope springs eternal and if at first you don't succeed, try, try again. Kansas University's and Kansas State's effort to establish a joint television operation was turned down by the last Legislature, but the two principal state schools have renewed a drive to secure either public support sufficient to persuade the next Legislature to reverse the decision or private funds to finance the project.

Their effort deserves encouragement. Most Kansans now have sampled commercial TV long enough to love it and also to appreciate there is a separate place for television that is designed to educate rather than to entertain.

Twinned transmitters at Manhattan and Lawrence would be within the range of two-thirds of the people of the state. With the facilities the university could provide, the operational costs would not be large.

For every $10 in programming costs, the university could do more toward raising the cultural and intellectual levels and broadening the horizons of the people of this state than they presently can with $200 spent on classroom and laboratory routines.

HUTCHINSON NEWS-HERALD
March 1, 1954
Save That TV Channel

An ultra high frequency television station in Kansas, now operating on Channel 16, has asked the Federal Communications Commission to grant it permission to move Channel 8, now assigned to Manhattan, to Hutchinson, convert it from educational to commercial use, and televise over that very high frequency.

It would be greatly in the interest of this station to change from UHF to standard VHF operation, and it would be nice for Hutchinson to have two TV operations of its own. But if the FCC did deviate from many of its present rules and upset its nationwide allocation of channels and grant this request, it would not be to the interest of Kansas as a whole.

The FCC already has granted a permit for the construction of a Channel 8 station at Manhattan. Kansas State College holds it. The institution has plans for a joint operation with the University of Kansas of an educational television service which would reach most of the state's viewers.

The last legislature did not give K State the funds necessary for it to build a TV station. It is unlikely that the present one will. But when the state is willing to accept the hard fact, as it soon must, that new or higher taxes are essential for the governmental activities Kansans today want, the necessary funds will be appropriated.

They will, that is, unless during the interim, this or some other commercial applicant is granted the Channel and removes the Channel forever from educational use.

Kansas ultimately will get into the television business, providing the essential channels will remain, because it has been demonstrated that while commercial television caters to its audience it cannot realize the educational possibilities this medium possesses. And because for $1 million in television Kansas can obtain as much public education as it can from $10 million spent on books, classroom, and laboratory.

The Hutchinson News-Herald
Monday, February 7, 1955
HISTORY OF TELEVISION RESEARCH AT KANSAS STATE COLLEGE

The first experimental work in television was begun in the Engineering Experiment Station of Kansas State College in 1931. The College received its first experimental television license in 1932 and shortly thereafter went on the air with broadcasts on 2650 kc. The original equipment used the mechanical scanning system and the broadcasts were made over a horizontal antenna. Reports of the reception of the signal were received from as far east as Maine and as far south as Texas.

In December, 1932, a vertical antenna having a height of over 100 feet was constructed by the staff of the Department of Electrical Engineering during Christmas vacation. This antenna gave improved signals over shorter distances. Satisfactory picture signals were picked up and reported from points in Oklahoma, Missouri, and Illinois by amateurs with homemade television sets.

In 1936, construction was started on television using the iconoscope camera. The camera and chain were completed in 1936, and many demonstrations were made for Open House and conventions held at the College. In early 1937, a construction permit was granted by the Federal Communications Commission for experimental operation on Channel No. 1. However, before the transmitter was completed, World War II broke out and the college discontinued further work on the project because of the extensive war training programs in the School of Engineering. After V-J day experimental work was renewed and a new construction permit for an experimental television station on Channel No. 1 was granted by the Federal Communications Commission. A transmitter was built by the faculty and graduate students largely out of surplus war materials and gift equipment and a license for operation was granted by the FCC, effective February 1, 1948.

During the period of October, 1949, to April, 1950, the Kansas State College television station rendered a special service to the students by televising and broadcasting the basketball games played in Nichols Gymnasium. Since the gymnasium would seat only 3,000 of the 7,000 student body, the televised picture of the game was projected on a large screen (6' by 8') in the college auditorium. The televised picture was also shown on TV receiving sets in the temporary Student Union and in Recreation Center to Accomodate many students who could not obtain seats in the gymnasium. Closed circuit operation was used for this service.

During 1950 the college was granted a new experimental television license in order to: (1) find a means of providing TV services to small communities in areas of low population density, and (2) do research in the use of television in college education. This experimental work continued until 1952.

Between 1950 and 1952 the College constructed and constructed a 500 w video transmitter and a 250 w audio transmitter to operate on Channel 8. The faculty and students likewise built an image orthicon
camera chain, test and other equipment, and purchased furniture and projection equipment. The total cost of this equipment at commercial prices was estimated to be approximately $103,000.

In July, 1949, the FCC published a Proposed Set of New Rules and Standards for Television Broadcasting. At the same time the Commission set aside a period of thirty days, later extended to sixty days, for protests covering these proposed rules. Unfortunately, the issue of new rules and the period of protest came during a period when Professor Kloeffler (head of the Department) was on vacation, and when President Eisenhower (of the College) was in Europe. The new proposed rules assigned a desirable video channel (No. 6) to Junction City, Kansas, and a less desirable UHF channel (No. 15) to Manhattan. The new rules also established a standard of 10 kilowatts of effective radiated power as the minimum for commercial broadcast stations.

Numerous discussions of the new proposed standards between members of the college administration and our television engineers showed that it would be in the interest of the College to have (1) the Channel 6 assignment in Manhattan for the use of the College, and (2) to have the rules changed to permit a lower minimum of radiated power for the use of educational institutions. Accordingly, petitions with arguments covering points (1) and (2) were sent to the FCC (early in January, 1950) with the request that they be accepted though the date for submission was passed. In February, 1950, the Commission reopened a period for further petitions and those from Kansas State College were filed. A representative of the College appeared before the Commission to present oral arguments. When the Sixth Report and Order was released by the FCC on April 11, 1952, and educational channels were announced, Channel no. 6 was reserved for Manhattan, Kansas.

During 1951 and 1952, the Electrical Engineering Department constructed a UHF television station and made many field strength measurements. These measurements confirmed the validity of the FCC proposed methods for calculating UHF area coverage. This complete study was submitted to the FCC. During this same period a closed circuit color television system was developed to be used in the Veterinary Medicine School to televise surgical operations in its clinics. This permits showing the techniques of surgery to a larger number of students than was possible by class demonstration methods.

During 1952 the College made a study on the potentials of television in Kansas, and published its findings and its analysis of the future potentials of educational television in the state.

During 1954 the College made studies of television receiving antennas in response to many requests for information on the type and style giving best reception. The findings were published and distributed by the College.

Additional experimentation has been made on improved circuits for synchronizing generators, light sources for television studios and variation of VHF and UHF signal strength vs. time and path.
During 1953 and 1954 the College designed and built a television studio, complete with lighting facilities. Control room and projection room were separated with triple-glass partitions. The studio was assigned to student training in the programming end of television. The College purchased two Dage camera chains, tied in its image orthicon camera chain and its projection room equipment, installed monitoring equipment in control room, studio, and the nearest classroom, and purchased or built the necessary equipment for complete closed circuit operation. Total cost was approximately $20,000 over and above time of personnel and equipment on hand. The laboratory is used for experimentation in the use of vidicon camera tubes for studio pickup.
The following table reports percentages of families (owning sets capable of receiving FM programs) living within the individual service areas of the stations named, which reported "listening regularly" to these FM stations. Figures are taken from the Kansas Radio Audience of 1953 survey. This survey uses the method of personal interview within homes selected by a stratified-random sample of all homes in the state. A total of more than 7,000 homes are visited each year, with stratification made on a basis of geography, urbanization and standard of living. For more detailed information on methods, see description in the appendix of Exhibit 23.

It should be noted that the areas covered by the different FM stations vary greatly in density of population and extent area reached by the station. The highest concentration of FM sets was found in Riley County (home county of KSDB-FM); the lowest percentage of homes with FM was found in Ottawa County (home county of KNU).

The following table shows the percentage of those families equipped to hear the station which reported "listening regularly" to that station.

<table>
<thead>
<tr>
<th>CALL-LETTERS</th>
<th>POWER</th>
<th>LOCATION</th>
<th>PER CENT OF FM-EQUIPPED HOMES IN COVERAGE AREA, &quot;REGULARLY&quot; LISTENING TO THE STATION NAMED</th>
</tr>
</thead>
<tbody>
<tr>
<td>KSDB-FM</td>
<td>10 w</td>
<td>Kansas State College</td>
<td>90.0 %</td>
</tr>
<tr>
<td>WKSH-FM</td>
<td>70,000 w</td>
<td>Joplin, Mo.</td>
<td>62.0</td>
</tr>
<tr>
<td>KMJO-FM</td>
<td>56,000 w</td>
<td>Kansas City, Mo.</td>
<td>41.5</td>
</tr>
<tr>
<td>KMMO</td>
<td>10 w</td>
<td>Ottawa University</td>
<td>33.3</td>
</tr>
<tr>
<td>KPQ-FM</td>
<td>10,500 w</td>
<td>Wichita, Kansas</td>
<td>28.5</td>
</tr>
<tr>
<td>KANU</td>
<td>35,000 w</td>
<td>University of Kansas</td>
<td>5.5</td>
</tr>
<tr>
<td>KXCM</td>
<td>10 w</td>
<td>University of Wichita</td>
<td>4.9</td>
</tr>
<tr>
<td>KTUL-FM</td>
<td>1,250 w</td>
<td>Tulsa, Oklahoma</td>
<td>3.0</td>
</tr>
<tr>
<td>KWAC-FM</td>
<td>15,000 w</td>
<td>Hutchinson, Kansas</td>
<td>2.2</td>
</tr>
</tbody>
</table>

It should be noted that the above figures are based on families surveyed who owned RADIO sets capable of receiving FM signals. Besides these families, others having TV sets were able to hear (Channel 6) some of the educational FM stations at the low end of the FM band. The survey did not inquire of these families whether the family used the TV set as a receiver for FM broadcasts. In the case of KSDB-FM such practice is believed to be relatively common because the station is the only one carrying popular programs at certain times. For example, KSDB-FM was the only station in 1953 and 1954 carrying Kansas State College basketball games played away from home.

The above figures accurately compare the "pulling power" of the FM stations within their own markets at the time of the survey.
TOPEKA -- Formation of a Citizens Committee on Educational Television for Kansas has been completed following a recent meeting here of more than 20 civic and professional leaders from throughout the state.

Oliver Ebel, executive secretary of the Kansas Medical Society and newly-elected chairman of the citizens committee, said the organization reflects wide-spread grass-roots sentiment of the people for educational TV.

He reported that the citizens group proposes "that the state of Kansas finance the building and operation of a state-wide system of non-commercial educational television broadcasting for the preparation and distribution of educational, cultural and informational programs to all the homes and schools of Kansas."

"We expect such a proposal to be introduced in the 1957 session of the Kansas legislature," Ebel declared.

The proposed eight-station system was adopted by the citizens group following recommendations based on several years of study by a joint television committee of the five state colleges.

An invitation has been issued to more than 100 state leaders to attend a second citizens meeting in Topeka on January 3.

###
Statement of:
Max W. Milbourn
Assistant to the President
Kansas State University
Manhattan, Kansas
In Topeka, Kansas, November 3, 1959
Before the Sub-Committee on Communications and Power of the Interstate and Foreign Commerce Committee

As you know, Kansas State University is no Johnny-come-lately in its interest in educational television.

Committees from Kansas State University and the University of Kansas first met on December 6, 1951 to discuss the possibilities of jointly developing plans to bring educational, cultural and informational television programs to all the homes and schools of Kansas.

This joint committee (and I quote from the minutes of December 6, 1951):

"1. Agreed with the philosophy of a long-range, joint cooperative TV effort in all phases of engineering, programming and production.

"2. Recommended that...immediate exploratory steps be taken to investigate jointly this cooperative effort...

"3. Agreed that consideration should be given to other educational institutions as well as units of state government, for inclusion in the ultimate cooperative program arrangement.

"4. Agreed that the current TV activity of both schools should be supported until a broader and perhaps more satisfactory joint plan is evolved."

These minutes were approved and the joint committee was charged "with the responsibility of completing the necessary studies and making recommendations...with a view toward the establishment of an educational television system designed to begin its service to the state not later than the fall of 1953."
The joint committee began immediately an intensive study of the problems involved, including those of engineering, programming and production. With approval of the Board of Regents, Kansas State filed with the Federal Communications Commission a request to construct a non-commercial educational television station on Channel 3, Manhattan. A Federal Communications Commission "Memorandum Opinion..." was adopted on July 23, 1952 granting this application, the first to be so granted in the United States.

On January 15, 1953, the Board of Regents passed this resolution, and I quote only the last of the five paragraphs of the resolution:

"Now, therefore, be it resolved, that the Board of Regents is of the opinion that the future and possibilities in television as an educational medium are far-reaching, and feels that the State Legislature should make the decision as to whether or not the State wants to avail itself of the opportunity now offered, or run the risk of losing something that once lost, may never be replaced."

Mr. Oscar Stauffer made the motion which was unanimously adopted.

Mr. Stauffer, as you know, has wide-spread interests in newspapers, radio and television.

The board authorized funds separate from the institutional budgets to be requested for ETV from the 1953 legislature. A month or so before, the Ford Foundation offered to provide matching funds of $100,000 each to Kansas State University and the University of Kansas toward station construction—Channel 3 at Manhattan and Channel 11 at Lawrence.
Our efforts were not successful, the legislature adjourned without really considering the request, and the Ford Foundation was released from its pledge of $200,000 in matching funds for station construction. The foundation had set a deadline for use of these funds which we were unable to meet.

It should be said, in all fairness to the Kansas legislators, that, in retrospect, the ETV proposal in 1953 was premature. There was not a single commercial TV station operating in Kansas. Legislators were asked to support educational television when the majority of legislators never had seen a television set.

Since 1953 the ETV proposal has been enlarged to provide state-wide coverage, and a Kansas Citizens' Committee for Educational Television was formed to allow for the broadest possible citizen representation.

You are familiar, I am sure, with the $25,000 appropriation made by the 1959 session of the Kansas legislature for an exhaustive legislative study of educational television.

Kansas State University, as a land-grant institution, has many state-wide responsibilities—with its cooperative program of extension and with its agricultural and engineering experiment stations, to name only a few. Our obligation is to serve all the people of the state to the best of our ability within the areas of our responsibility—and to do so as effectively and as efficiently as possible.

We believe today, as we did in 1951, that educational television is a great new medium which a university such as Kansas State can use in achieving its traditional objectives at relatively low cost.
We believe that in recent months there is evidence of a growing interest in ETV throughout Kansas as the people come to realize the many ways ETV can profitably serve them—not only through their institutions of higher learning, but through the public schools, private schools and through numerous other agencies, private and public which have legitimate educational functions to perform.

An ETV system such as the one proposed for Kansas by the Citizens' Committee cannot come into being over night. The land-grant college system itself—of which K-State is a part—was years in development, and the many contributions of this system are well known.

Kansas State University joins with others in a plea for more time to develop educational television in Kansas.

We urge the Congress of the United States to see to it that the channels reserved for education in Kansas are reserved indefinitely so that time is available to solve the problems of finance.

Channel 8, assigned to Kansas State University, is a vital link in the proposed educational television system for our state. Once lost, it never can be replaced for educational purposes.
ENGINEERING STATEMENT

This engineering statement sets forth a channel reservation proposal suitable for implementing a statewide educational television broadcasting system for the State of Kansas.

On September 15, 1960, Dr. John C. Schwarzwalder released a Survey and Report/1 (hereinafter referred to as the "Kansas Report"), prepared for, and at the direction of, the Committee on Education of the Legislative Council of the State of Kansas. The author of this engineering statement was Chief Engineering Consultant for Dr. Schwarzwalder in preparation of the "Kansas Report". Contained in the "Kansas Report" was a tentative channel allocation proposal which permitted the most effective statewide service for educational television in Kansas.

1. Proposal

The proposal for channel reservations in the State of Kansas for educational television is as follows:

<table>
<thead>
<tr>
<th>Add</th>
<th>Delete</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manhattan, Kansas</td>
<td></td>
</tr>
<tr>
<td>Hutchinson, Kansas</td>
<td>1</td>
</tr>
<tr>
<td>Lawrence, Kansas</td>
<td></td>
</tr>
<tr>
<td>Topeka, Kansas</td>
<td>1</td>
</tr>
<tr>
<td>Wichita, Kansas</td>
<td>1</td>
</tr>
<tr>
<td>Chanute, Kansas</td>
<td></td>
</tr>
<tr>
<td>Grainfield, Kansas</td>
<td>1</td>
</tr>
<tr>
<td>Garden City, Kansas</td>
<td></td>
</tr>
<tr>
<td>Lincoln, Kansas</td>
<td></td>
</tr>
<tr>
<td>Lakin, Kansas(or Satanta)</td>
<td>1</td>
</tr>
</tbody>
</table>

Figure 1 attached depicts the Grade A and Grade B signal contours which might be expected utilizing the six channels listed.

/1 "A Survey and Report Concerning the Feasibility of an Educational Television Network for the State of Kansas" by John C. Schwarzwalder.
above with maximum permissible power and an antenna height above average terrain of 1000 feet. The actual transmitting sites shown in Figure A are such as to comply with "Principal City" requirements of the Rules and still maintain minimum station separations for Zone II. 67,698 sq. mi. of the area within the State of Kansas will be provided with Grade B or better signal. Within this area, 2,039,315 people reside (1960 U.S. Census). This represents 82% coverage of the area and 93.5% coverage of the population within the State.

It must be noted that the proposed channel reservation for Grainfield, Kansas (Channel 4) conflicts with the proposed allocation of Channel 4 to Superior, Nebraska, and with a proposal by the Nebraska Council for Educational Television, Inc. (hereafter referred to as "Nebraska Council") to reserve Channel 4 for Kearney, Nebraska. Conferences have been held with legal and engineering counsel and representatives for Nebraska Council in an effort to resolve the Channel 4 conflict between the two states for educational use. However, any plan which would provide minimum separation between the two Channel 4 reservations reduced the effectiveness, if used, of Channel 4 in both states. If educational television is to be of help on a statewide basis, it is imperative that adequate coverage be given sparsely populated areas, as well as to centers of population. Thus, area coverage (as contrasted to population coverage) becomes an important consideration in any effective allocation plan for educational use.

The Channel 41 reservation for Topeka complies with present Channel 41 allocation in Grand Island, Nebraska. The actual station location proposed for Topeka will comply with the proposed station location of KGUN-TV near Bartwell, Nebraska. See IPP No. 573.
Counterproposal

In an attempt to arrive at a channel reservation proposal which will permit Nebraska and Kansas to have an effective statewide educational television system, the following Nebraska Table of reservations is proposed:

<table>
<thead>
<tr>
<th>City</th>
<th>Add</th>
<th>Delete</th>
<th>Status Quo</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lincoln, Nebraska</td>
<td></td>
<td>*7</td>
<td>*12</td>
</tr>
<tr>
<td>Bassett, Nebraska</td>
<td>*7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Albion, Nebraska</td>
<td>*8</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oxford, Nebraska</td>
<td>*9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Alliance, Nebraska</td>
<td>*13</td>
<td>13</td>
<td></td>
</tr>
<tr>
<td>North Platte, Nebraska</td>
<td>*9</td>
<td>9</td>
<td></td>
</tr>
</tbody>
</table>

With the above proposal for Nebraska, the Channel 3 reservation for Kansas is changed from Lakin to Satanta. It is expected that the actual station location for Channel 3 in Nebraska will be west of Holdredge approximately 5 miles, and the station location for Satanta in Kansas will be the same as that proposed for Lakin. Further, it should be noted that the move of the Channel 8 reservation in Kansas from Manhattan to Hutchinson permits increased latitude for Channel 8 use in Nebraska.

While this counterproposal resolves the Channel 4 conflict between Kansas and Nebraska educational use, it does not resolve the conflict which arises between the proposed allocation for commercial use of Channel 4 in Superior, Nebraska, and the reservation for educational use of Channel 4 at Grainfield, Kansas.

Summary

The proposal and counterproposal contained in this statement are predicated on the existing co-channel and adjacent channel minimum separation permitted under the Rules. They will permit an effective statewide educational television system to be developed in the States of Nebraska and Kansas.
The license which can be obtained for the channel is the one now held by the station that has been rejected by the FCC for failure to meet the technical standards. This license is held by the station that has been rejected by the FCC because of the technical standards. The FCC has not announced that it believes there is the possibility of a change in the technical standards. The channel will not be available for commercial use.

WHAT'S the timetable of events? Nobody knows for certain. The most immediate problem is raising $150,000 to operate for the first year. Baker believes there is a good possibility the money might come from private sources—possibly from a foundation which has expressed some interest.

The Economic Education Institute at Washburn, which was established by the Garvey Fund at Wichita, but is administered by a Washburn committee, is picking up the work for the preliminary expenses involved in the first year. Baker believes that if the money comes, the station will be ready for operation.

Baker says people in the public schools and the local boards of education and several school administrators have endorsed the idea. Once the idea of the air is out, he believes, there will be demand for interested people in the network. That's been the experience in other states, he says.

The GARF is a station on the air for a part of the year.
MR. CHAIRMAN:

The Committee on Education submits this final report on Proposal No. 22, relating to the reservation of very high frequency television channels and their retention for educational use in Kansas, current developments in educational television, and recommendations regarding educational television in Kansas.

Legislative and Council Consideration

Educational television was first introduced for consideration by the legislative council in September, 1957. Previously, requests had been presented to the legislature beginning in 1953 for funds to establish educational television stations at the University of Kansas and at Kansas State University. Channels reserved for educational purposes were allocated to the two universities more than a decade ago. The first permit issued by the Federal Communications Commission to construct a non-commercial educational station (Channel 8) was granted to Kansas State College on July 23, 1952. At the same time the University of Kansas was successful in preventing the reassignment of Channel 11 to Kansas City for commercial purposes. The channel had been reserved for educational purposes at Lawrence, and the University submitted an application to construct a station. This application is still pending before the Federal Commission. Neither the permit for Channel 8 nor the application for Channel 11 have been implemented because necessary funds therefor were not provided.

In the 1953 legislative session, the House of Representatives passed a Ways and Means committee bill (H.B. 556), authorizing the acceptance of gifts and donations for the purposes of constructing, equipping, and operating a non-commercial educational television broadcasting system by Kansas State College and the University of Kansas. Appropriation requests also were considered in 1955, but no bills were introduced.

In the 1957 session, the House Ways and Means Committee amended Senate Bill No. 430, appropriating funds to the State Board of Regents, by inserting an item appropriating $10,000 "to commence and develop an educational television system for Kansas", and submit a report to the governor in time for the budget hearings on or before October 1, 1957. The Senate did not accede to the House amendment, and the third conference committee report recommended that the item be omitted. However, the House refused to accept the conference committee report, and a fourth conference committee was appointed. The Senate refused to yield and the House finally agreed to drop the $10,000 appropriation. Subsequently, the proposal for a council study was introduced.

In the first council study, considerable information was acquired concerning the feasibility, cost and use of educational television throughout the country for both elementary and secondary schools and on and off campus.
Instruction. With the legislative consent, the committee's report was submitted directly to the 1960 legislature.

It recommended the establishment of a state-wide network of educational television stations, and the creation of a separate state authority to program and operate the system. The committee's report was printed in the Legislative Journals for March 5th and 9th, 1959. A bill introduced to carry out these recommendations included an appropriation of $25,000 to enable the authority to begin work planning a program for Kansas (S.B. 336).

Although the House passed a companion measure (H.B. 511), and both bills were approved by the Senate education committee, they were not approved by another Senate committee to which they had also been jointly referred, which in effect killed both bills. However, a miscellaneous appropriation bill was amended in the Senate to add a $25,000 appropriation to the legislative council for the purpose of making the benefits of educational television known to and promoting its use by the people of Kansas, and of making an engineering survey to determine the proper number and location of transmitters to provide adequate television coverage of the state.

Proposal No. 12 was introduced in the legislative council to carry out the purpose of the appropriation item, and was referred to the committee on education. At the May, 1959, session, the council also allocated the $25,000 to the committee on education.

Following several conferences with some of the outstanding authorities and administrators in the field of educational television, and inspection of educational telecasting, the committee on education entered into a contract on February 19, 1960, with Dr. John C. Schwarzwalder, manager of the Twin City Area Educational Television Corporation, to make a feasibility survey. The survey was conducted during the spring and summer of 1960. The committee presented the survey report to the legislative council on November 16, 1960, and received permission to continue its consideration of Proposal No. 12, and to submit its final report directly to the 1961 legislature.

The establishment of a state-wide network and a state educational television authority representing the various educational agencies and interests of the state was again recommended in the report submitted to the legislature. It was printed in the Senate Journal for February 13th, pages 99-103. An appropriation of $1 million to the authority to develop a program and begin a system of educational television for Kansas also was recommended by the council committee. Subsequently, the Senate Committee on Education introduced two bills to carry out these recommendations, Senate Bills 372 and 373.

Senate Bill 372 was passed by the Senate and was reported favorably by the House Committee on Education, but died in the House Ways and Means Committee to which it had been jointly referred. As a consequence, the position of Kansas at this time is that it has no official agency which can proceed with the necessary planning for beginning a program, or which can negotiate for federal funds. There have been no funds appropriated for the construction
of stations, the purchase of equipment, the employment of a director, or the development of an educational program for televising. A plan for a statewide network has been outlined, but the plan has not been implemented.

The money which the legislature and the council provided the committee has been expended primarily to make the engineering feasibility survey and to assure the availability of the channels which the survey had recommended.

Efforts to Prevent Loss of Channels

The primary purpose of the sponsors of Proposal No. 22 was to prevent the loss of potentially valuable properties, namely, the unused VHF wavelengths, and to save them for possible future educational use in Kansas. Although several parties have begun proceedings which would jeopardize the educational use of these channels, none of them thus far have been awarded to other applicants. Considerable effort has been expended by your committee in its endeavor to keep these channels available for the benefit of Kansas school children and college students. With the anticipated increases in school population and costs in the next two decades, we believe Kansas will be in urgent need of these facilities to help meet its educational responsibilities to the next generation of Kansas young people.

As early as December, 1961, the committee became aware that a commercial operator in Nebraska, the Bi-States Company, had filed an application with the Federal Communications Commission for Channel 4 to be assigned to Superior, Nebraska. This was one of the channels included in the proposed Kansas six-channel state-wide network. The committee was advised that unless efforts were made to oppose this application the loss of the channel might deprive the state of a vital link in the proposed network and leave northwest Kansas without any VHF station. On January 6, 1961, the Nebraska Council for Educational Television requested institution of rule-making procedures by the Federal Communications Commission for the allocation of certain of these same channels for a Nebraska educational television network. The Federal Communications Commission then consolidated the several separate proceedings and advised interested parties to file comments.

The committee was faced with a real dilemma. The possibility existed that the potentially valuable VHF channels constituting the proposed Kansas network might be allocated to other applicants, and would not be available at the time the legislature was ready to take action on the bills then under consideration. It was therefore concluded that it was essential that steps be taken to make certain that the channels comprising the Kansas educational network would remain available. This necessitated efforts to oppose the plans of other parties interested in the same channels.

Efforts were successful in securing postponement of the proceedings until the legislature had an opportunity to consider the bills, but after adjournment of the session and prior to final presentation of the bills, the Federal Communications Commission scheduled a final hearing on May 23, 1961. In these proceedings, counter-propositions were submitted expressing opposition to the Nebraska applications and requesting the reservation and allocation of
the six channels for Kansas were for educational television, as described in the survey report of September 1, 1961. The failure of the legislature to pass the bills was noted, but attention was called to the fact that Proposal No. 22 had been introduced at the May, 1961, session of the legislative council, for the purpose of doing whatever was possible to hold the television channels open for future use in Kansas for educational purposes.

No action on this matter was taken until October 18, 1961, when the Federal Communications Commission issued its Third Notice of Proposed Rule Making and Memorandum Opinion and Order announcing its intention to review all pending applications in Kansas, Colorado, Nebraska, and Wyoming (Docket No. 13860), and advising interested parties to submit comments by November 30, 1961. In this notice, the Communications Commission recognized the Kansas plan by official reference to the counter-proposals submitted on May 25.

In order to have the benefit of the views of informed Kansas people as to what action, if any, should be taken with respect to the Third Notice, the committee on education held a conference with a number of individuals and representatives of groups and agencies interested in educational television. It was the consensus of the group that the committee should take all necessary steps to retain the channels for future educational use.

The committee arranged for the necessary engineering studies and for the case for the Kansas plan to be presented to the Federal Communications Commission. Comments were filed with the Commission on behalf of the committee on January 15, and Reply Comments were filed on February 28, 1962, affirming the reasonableness and feasibleness of the plan proposed for Kansas. This contention was strengthened by letters from the Chancellor of the University and the President of Kansas State University expressing their support of the plan for a state-wide network. In the meantime, representatives of the committee had succeeded in having the Nebraska Council for Educational Television agree to the Kansas plan of channel allocation.

The Reply Comments filed with the Commission pointed out that the Nebraska Council for Educational Television had accepted the Kansas suggestion for assignment of channels in the two states, thus resolving any potential conflicts between them regarding allocation of channels. Recommendation was made that Channel 13 at Garden City be assigned to station KAKE-TV for commercial use, to remove any possibility of infringement on the proposed educational television network in southwest Kansas.

It was contended that the application of the Bi-States Company for Channel 4 at Superior, Nebraska, was without merit and should be denied. The view was expressed that the use of non-commercial educational television is inevitable, but time must be allowed for state legislatures to pass laws and appropriate funds to initiate and activate such programs.

As a result of these proceedings, it appears that, in effect, a request has been made for the reservation of six channels for educational television purposes, and for the allocation of these channels to Kansas, without a formal application therefore having been submitted either by the committee or by any Kansas administrative agency. The Commission has not announced any decision on the various matters which it has under consideration. It is...
possible that a decision might be rendered at any time, but a final ruling might be delayed until after the legislative sessions in 1963.1

Recently, the Tulsa Broadcasting Company has proposed changes in the location of Channel 8 at Hutchinson to permit a shift in the site of the transmitter for Station KTUL-TV, now near Haskell to a location near Red Fork, Oklahoma. The committee opposes this proposed move because it would tend to deprive populous areas in Butler, Cowley, and Sumner Counties of good television service, and would reduce the quality of the television signal in Wichita. Steps have been taken to submit arguments to the Federal Communications Commission in opposition to the application of the Tulsa Broadcasting Company.
WESTERN UNION
TELEGRAM
W. H. MARSHALL, President

This time zone shown in the date line on domestic telegrams is LOCAL TIME at point of origin. Time of receipt is LOCAL TIME at point of destination.

KA224 WACO WCASO

WW WFA279 ML COLLEGE-NEF WASHINGTON DC 14 M 14 PM 8 17

DR HAROLD E SPONBERG P RESIDENT=
WASHERBURN UNIVERSITY OF TOPEKA
17TH AND COLLEGE TOPEKA KANS=

COMMISSION GRANTED BPER-211 NEW COMMERCIAL
EDUCATIONAL TELEVISION STATION CHANNEL 11 TOPEKA
KANSAS ERP VISUAL 3.56 KILOWATTS AURAL 158 KILOWATTS
ANTENNA HEIGHT ABOVE AVERAGE TERRAIN 1000 FEET=
DEN F NAPLE SECY FCC==

- BPER-211 11 3.56 158 1000=

THE COMPANY WILL APPRECIATE SUGGESTIONS FROM ITS PATRONS CONCERNING ITS SERVICE
WAT TV's New Plan Revealed for City

By DL K. Turner

Waterloo, Iowa, St. Louis, Oct. 17.

M. E. Miller, president of the Great Plains Broadcasting Company, said at a meeting of stockholders yesterday that WAT, who operate TV station in the city, has decided to go into the electronic manufacturing business.

The company has had discussions with the FCC and has been assured that all requirements will be met.

Mr. Miller said that the company will begin manufacturing immediately and that the first product will be a television set.

A meeting of stockholders was held yesterday afternoon and it was decided to go into the electronic manufacturing business.

The company will begin manufacturing television sets immediately.
US IS ABOUT the time browsing, community and concern, time. A TV station to the point that it is to form broadcasting pro-

The Richland station serves 37 school districts, public, private and parochial, within a 70-mile radius of the city. This represents 15,000 school children, and each school is assessed $1 a year for each enrolled pupil.

The more recent of this field is a Wash. State Board of Education and TV, and thevision Corporation, located and distributed in the area. There are 800 licenses, covering 90 percent of the population. The Richland station is the only one with a 100 percent coverage.

Since individuals who would be concerned with educational programs of this vision are welcome this opportunity to make a contribution. The Richland and the civic and service organizations could perform a great service for the community and the region by getting involved in the TV station.
The point of discussion began with the brief statement of understanding dated October 11, 1963 between the Garvey Foundation and Washburn University, relative to contributions which were being made by the Garvey Foundation to the Fine Arts Center to be erected on the campus of Washburn University. The statement provided, among other things, that the Garvey Foundation would have the privilege of reviewing the plans of the building and making suggestions regarding the plans. It also provided that the auditorium should be so designed that if Washburn operates Education TV it will lend itself to the needs of that operation. Both of these present no problem. Obviously, any auditorium which is designed will be adaptable for educational TV use in the sense that any production which can be profitably utilized in conjunction with Education TV will be so utilized and the stages adaptable for that purpose.

2. The only point which seems to raise a question is the final point which provides:

"If practicable the building shall provide quarters for the . . . . Educational TV Center." (also provides for the Economic Education Center)

It is possible that the connotation of this statement of purpose has misled people into an undue enlargement concerning what is contemplated by a "Educational TV Center".

3. It is extremely important to understand that nobody has any desire to minimize the point and purpose of the statement of understanding between Garvey Foundation and Washburn University. What is important is to avoid doing things which are economically ill-advised in the mistaken idea that such things are required as parts of the purpose and spirit of the aforesaid statement and agreement. This is the reason for the conference and the conversation with Garvey Foundation.
When the tentative plans were prepared for the Fine Arts Center, apparently the plans (this memorandum is being dictated by Mr. Lewis who has not personally seen the plans in their entirety) provided for a fourth floor primarily dedicated to Educational TV use. By reason of putting in all of the Educational TV items, it required a fourth floor of approximately 11,000 square feet, plus certain portions of both the second and third floors. This is a very elaborate lay-out. The question arose when the cost estimates on the construction of the Fine Arts Center were submitted by the architects. The space devoted to Educational TV (primarily the addition of the fourth floor) added between $300,000 and $325,000 to the cost. The first reaction to this was that perhaps even more suitable facilities could be provided at one-third of this cost by erecting a one floor structure in the vicinity of the transmitter tower on Security Benefit Hill, northwest of Topeka. This is the 40 acre tract which is included in the Education TV set-up and for which Washburn has an option to purchase as well as a long time lease. Question had been raised in Board of Regents meetings as to whether or not it was even necessary to have this structure since there was already a transmitter tower building. Several members of the Board of Regents felt that it was impracticable to be spending this kind of money at the beginning of the Educational TV program; and that it should be planned to utilize the existing facilities without involving ourselves in substantial additional capital expenditures at this time.

5. In order to have a full understanding of the issues considered at the conference, it was apparent that there were three things to be considered:

A. Should the plans be accepted as prepared including all of the ETV facilities on the fourth floor of the Fine Arts Center as proposed?

B. Should there be erected at the transmitter tower site a separate building facility costing somewhere in the neighborhood of $125,000?

C. Should we go ahead and operate using the transmitter tower building, as now in existence, with such redecorating as has already been authorized, (This redecorating amounts to between $10,000 and $11,000.) without either the fourth floor concept in the Fine Arts Center or a separate new building in the tower area?
A telephone conversation took place between Lewis and Bob Page at Wichita, looking towards a possible subsequent conference with Mrs. Garvey to get her ideas. It was Bob Page's suggestion that we first discuss the matter with Thad Sandstrom. He would have the best ideas as to what was necessary for the good of the ETV program. Also, a very brief conversation had been had with Ruth Carvey Fink, who had suggested that the contacts be made with Wichita. Cliff Allison, who had been involved at earlier stages, was out of the city at the time of the conversation on July 19th. Cliff Allison had seen the tentative plans of the proposed Fine Arts Center at an earlier date.

As a result of the conference between Sandstrom, Weidling and Lewis, the conclusions which they reached are as follows:

(a) The present transmitter tower building is quite adaptable for all current needs. This building appears to be in excellent condition and a minimum amount of alterations and redecorating will take care of most of the needs of the ETV program for a number of years. These proposals have already been gone over by Mr. Sandstrom. It would appear that this building is adaptable not only for the technical aspects of the program; but can also provide needed office space for the time being and either currently or in the future could provide a small studio area.

(b) It would be desirable to have some space in the Fine Arts Center which could be utilized for the administrative center of the ETV. It was suggested that somewhere in the neighborhood of 1,000 to 1,200 square feet of space should be provided in order that there could be modest offices for the ETV director and the program director, some clerical work area and a conference room. This area would be quite adaptable for other use if at some future time it should be decided to have a separate building or separate facility for ETV. In the meantime, it would provide the administrative center and would cause persons dealing with the ETV program to come onto the Washburn campus. It is believed that this is desirable. It would be favorable, both to the program and to the university, to have the administrative headquarters on the campus and in the Fine Arts Center. This space could be provided on either the second floor or the third floor. It is quite apparent from the letter of April 21, 1965 of
the architect that there was some space on the second and third floor which could be eliminated if they eliminate the fourth floor ETV Center. Perhaps some of this space could be utilized for office suite for educational TV center so as to make it as convenient as possible to persons coming in from the outside. It might even be possible for them to place this area on the first floor with some revamping of the existing plans.

c. Sandstrom was strongly of the opinion that it was poor economy and poor design to think in terms of building a studio on the fourth floor of the Fine Arts Center. In the first place, it will be a number of years before there would be any necessity of having any studio. In the second place, it would not be desirable to have a studio on the fourth floor, where it would require an excessive amount of handling with all of the various equipment and supplies which would be required. It was also his feeling that there was no need for having any space in the Fine Arts Center for an engineer's office, control room, carpenter shop, property and materials storage room, dark room, film handling and storage room, etc. Most of these things can be well taken care of out in the terminal tower building at the present time and in the future. Sandstrom, Weidling and Lewis made a tour of the terminal tower building and it is quite apparent to us, unless there is something which is hidden from our eyes, that this building would afford all of the needs indicated for the foreseeable future.

d. If approximately 1,000 to 1,200 square feet of space could be provided on the first or second floor of the Fine Arts Center, it would be the Educational TV Center (solely for administrative purposes) and nothing else would need to be done for a number of years, with the exception of utilizing the terminal tower building which is now in the process of being redecorated and revamped to some extent.

e. After the Fine Arts Center is completed, the ETV Director and Program Director would move to it. The north end of the first floor of the terminal tower building then could be adapted for a small studio or studios.

f. If at a future date ETV programs get to the point where it is desired to have a separate studio, it would be much more desirable to have the studio on a first floor location. If this was done in the future, then it might be desirable at
Following this conference, a telephone call was put in to Dick Vogel advising him of our thinking. It was requested that he get in touch with the architects and have the architects and Lloyd Darrow visit with Thor Sandstrom in order to get his ideas. We also advised them that we wanted to find out how they could work in the desired limited space for office center on one of the lower floors of the Fine Arts Center; but eliminating the fourth floor and the west of the contemplated ETV facilities.

9. On the following morning a summary of the conference and our conclusions were communicated by phone to Bob Page. He indicated an impression that the conclusions sounded sensible. A copy of this memo is being sent to him. The plans of the Fine Arts Center should, in our judgment, be revised to eliminate the proposed elaborate layout on the fourth floor; but to provide administrative office space for the Educational TV in the Fine Arts Center. After the revised plans are prepared, they should then be submitted to The Garvey Foundation in accordance with the agreement of October 11, 1963.

P. H. L.

cc: Mr. Robert Page
    Mr. F. G. Neuling
    Mr. George Greenwood
    Mr. Richard Vogel
    Mr. Lloyd Darrow
In the next two years, I submit the following proposal.

It has been observed that educational television in northern Kansas City, in the current period, has been only a tentative operation. This is in keeping with a national statement and practice in educational television.

1. I estimate that 60% of the educational and television operating budget is to be provided by the participating elementary and secondary schools of northern Kansas City. It has been planned that the initial service will be primarily one of fulfilling the varying needs of the school systems from library sources. However, the cost of all school districts, participating and not, doing so with the understanding that, within a period of eighteen months, they or their local facilities would be able to meet the administrative and production of programming.

2. A joint, educational, and administrative staff is to fill the curriculum needs of northern Kansas City. This task has already been performed by the Kansas City educational systems in the city of Kansas City. While it is true that the central facility, educational enrollment districts, will continue to the future, educational broadcasting, I think it could be anticipated that it would be a severe decline in participation if local originating facilities were not forthcoming.

3. In planning a joint, educational and university educational facilities, one of the outstanding factors that generally influence the potential of utilizing radio and television in secondary progressive school systems, national interest has already been extended through the Department of Health, Education, and Welfare in Washington, with the cooperation to the University of Kansas and the University of California. All of these are in the D. C. area, obviously, to provide an educational service in which to
3. It is anticipated that the University, in order to be able to utilize educational television on an experimental basis in the near-to-distant future, as in the case of educational television stations, will be required to produce educational programs for educational television. While there is the possibility that the University will have to act as an educational television station, it is likely that it will not have a type of educational television station designed for educational television, but rather one that will be adapted for educational television. The major difficulty with educational television is that the production facilities of an educational television station are not as well developed as those of a educational television station. The University might be willing to give up the necessary amount of time and space to produce the type of program that the University needs. However, the utilization of educational television as a means of teaching and research will be limited by financial prohibitions.

In that event, the University could use the possible University involvement on a selective basis. In such a case, the cost of educational television production for a University is much lower than for a educational television station. The major cost of educational television production is the cost of educational television programs. The University, however, has the advantage of having educational television programs that are designed for educational television. The University could then provide educational television programs to educational television stations. In this way, the University could provide educational television programs to educational television stations on a selective basis. The University could provide educational television programs to educational television stations on a selective basis. The University could also provide educational television programs to educational television stations on a selective basis.
I trust this letter finds you; the necessary information that you require. Of course, it is not difficult for personal opinion
in the matter. However, for the sake of thorough understanding the family
that, if we must cooperate with the administration, I shall not expect to have
in the interest of this community, and, indeed, can it long expect to
to direct it all under the present or social restrictions in which it
certainly be granted. If I pay by or further assistance to you in
this or other cases, please do not hesitate to call on me immediately.
July 30, 1965

Mr. Phillip H. Lewis
Lillard, Eldson, Lewis & Porter
320 New England Bldg.
Topeka, Kansas 66603

Dear Phil,

Thank you so very much for your letter of July 28 with the enclosed memorandums. In my judgment both memorandums present strong and convincing arguments — and I agree that a conference of all those involved should be held at an early date. May I request that Paul Winders from our staff be included.

It is our desire to see the Washburn ETV program be completely self-sustaining and completely successful. We are prepared individually — and as a company — to do whatever we practically can to assure this success.

It seems to me that the transmitter building being leased by Washburn for ETV contains ample space for the initial operation as has been discussed and planned over the months. It will accommodate adequate facilities for handling and shipping film and videotape, facilities for getting film and videotape on the air — as well as sufficient space for offices for the ETV Manager, chief engineer and secretarial help for the foreseeable future. This building, I believe, should be adequate for the first two or three years.

In the meantime, Washburn will have the availability of WIBW-TV studio space. While Mr. Wheeler makes light of our studio facilities, we have found them to be perfectly adequate for some ten years. I am not an ETV expert, but my objection of most ETV programs is that the studio production requirements should be fairly simple. By using the WIBW studio during early years, it eliminates the necessity of hiring full time directors, cameramen, floor men, etc., — and allows Washburn to use our trained people at no cost for the first year as spelled out in the agreement — and at a cost per hour basis to be negotiated after the first year. I am sure our studies have limitations — but I also see little need for Washburn to plunge full steam into local live production until ETV gets its feet on the ground and the Regents and administration have a chance to see how the ETV program is going to progress.
I also have the strong feeling that it would be most desirable to eventually have studio and office space on the campus. When and if this day arrives, the transmitter facility at SBA Hill could be abandoned except for transmitting purposes. By that time, I believe the FCC will have authorized "remote control" for TV transmitters. Thus, it would be unnecessary to have personnel stationed at SBA Hill. It would be used only as a transmitting plant -- fed by microwave from the Washburn campus. It is my personal opinion that it would be a mistake to build large scale studios at the SBA site because they would not be on the Washburn campus and just wouldn't have the identification with Washburn. I may place more emphasis on this point than necessary, but I do think it is important that the ETV program be tied closely to Washburn.

As to what should be done about long-range studio planning -- I do not know. Wheeler makes some strong points about the need for adequate studio space. I would bow to his judgment in the ETV field. One of the reasons I was anxious that Wheeler be hired for this job is because of his knowledge and experience in ETV. On the other hand, I know that local production is expensive -- Washburn cannot possibly consider local production and studios until we see the finances to do so properly. And at any rate, whatever is done should be done at the Washburn campus.

I will be glad to meet with you, Ted and the others at any time. Thank you for asking my opinion.

Sincerely

Thad M. Sandstrom

cc Robert A. Page
    J. C. Weldling
    George Greenwood
    Richard G. Vogel
    Ian M. Wheeler
    Gerald Barker
    Paul Winders

TX3:ap
F. G. Weidling, Chairman
Board of Regents - Washburn University
The First National Bank of Topeka
Topeka, Kansas

Dear Mr. Weidling:

Pursuant to our recent conversations with Mr. Philip Lewis, Garvey Foundation requests that the sum of $150,000.00 be segregated and set aside from the $500,000.00 pledge toward the Fine Arts Center for the purpose of building a separate facility for educational television if and when this need develops.

We understand that you will discuss with us the location of this separate ETV facility prior to construction.

We also understand that the privilege to name the Fine Arts Center is unaffected by this change.

Very sincerely yours,

D. Clifford Allison
Executive Vice President

cc: Philip H. Lewis
    Gerald K. Barker
To: Mr. Smith, City Engineer

From: Mr. Johnson, Public Works Director

Subject: Replacement of Wastewater Treatment Plant

Dear Mr. Smith,

I am writing to inform you of the current status of the wastewater treatment plant replacement project. Due to unforeseen circumstances, the original timeline has been extended by six months, and we are now scheduled to complete the project by the end of next year. This delay is due to unexpected challenges in procuring the required equipment and materials.

A complete listing of the equipment order has been included in this letter. It includes a complete list of the equipment, quantities, and prices. Please review it carefully and let me know if you have any questions or concerns.

A service contract for the operation and maintenance of the new facility is available at the rate of $250,000 per year.

The new facility is scheduled to be completed and in operation by the end of next year. It will include a new treatment system that will meet all current regulatory requirements.

Please let me know if you require any further information.

Sincerely,

Mr. Johnson

Public Works Director
December 28, 1965

Mr. Thad M. Sandstrom, Vice President
and General Manager
WTWB-TV-AM-IM
Box 119
Topeka, Kansas 66601

Dear Thad:

Thank you for your personal interest in the extension of the Channel 11 service via existing CATV facilities.

I have written Vuore of Abilene relative to the aforementioned proposition and have had conversations with that organization in Manhattan. While this discussion has not shown any positive results as yet, I think that it is an area of mutual interest and concern.

Needless to say, the Commission's stand requiring CATV Companies involved with micro-wave to carry the services of stations providing a Grade A signal will assist us in obtaining our goal in Manhattan.

Again, thank you for your assistance.

Cordially,

Ian N. Wheeler
General Manager

INW:cr
November 23, 1965

Mr. Thad Sandstrom  
Vice President - General Manager  
WBW-AM-FM  
Box 119  
Topeka, Kansas 66601

Dear Thad:

As of July 1, 1966, the ETV Facilities Program of the U.S. Office of Education will terminate consideration of expansion projects from existing educational television stations.

I bring this to your attention, in that KTWJ had anticipated a second grant request to obtain certain additional items required for our future studio location, (i.e., STL-microwave; lights; dimmer; studio switcher, etc.). We had originally felt that this would not be necessary for a period in excess of one year, however, K.E.W. has placed the pressure on us and we will attempt to put a request together in the next few months.

To this end Dr. Henderson, in the last Regents meeting, indicated that the station would embark on a $40,000 capital fund raising effort. I am apprising you of this fact in that I think the time has come to request of other commercial broadcasters in the state, assistance both financial and equipment wise, to help in meeting our $40,000 goal.

I discussed this possibility with you by letter sometime ago, indicating that used equipment, in working order, could be used for gift-in-kind matching dollars. I hope that other broadcasters in Kansas will follow the lead of WIBW in insuring the strongest ETV service possible, as KTWJ, in the not-to-distant future, will be furnishing programming from the state capital throughout Kansas.

I would be pleased to discuss this matter with you personally at your convenience, and look forward to your favorable reply.

Cordially,

Dr. Dr. Henderson  
Inn W. Mueller  
Director, Educational Television
January 15, 1954

Mr. Ilfeld, etc., etc., etc.

116th St.

Sioux City, Iowa

Dear Mr. Ilfeld,

I have received with interest the details of the telecasting throughout the network. Recently, Kansas gained its first educational television station through the activation of Channel 11 in Topeka by Washburn University. This channel, while operated by the University, is completely community-supported in that our state Constitution prohibits expenditures of tax money for projects not previously approved by the legislature.

I am planning to assist Channel 11 in raising funds and securing equipment to ensure this station's growth and development. I hope you agree that a strong, dynamic educational outlet in the state capital will greatly expand the future expansion of educational television and the eventual expansion of channels throughout Kansas.

Kansans, commercial broadcasters throughout the nation, have already established a precedent and pattern of support to educational television. I hope you will join in this worthwhile effort and provide whatever assistance you can to Channel 11.

I enclose a list of items needed by the station to equip their studio facilities. If there is any equipment which may be surplus to your needs, Channel 11 will be most grateful for any donation. Development and capital grants are being sought by Channel 11 for equipment required to meet needs under existing state law.

Yours truly,

[Signature]

[Name]

[Title]
Questions should be addressed to:

Mr. Karl Wheeler
General Manager, KTV-1
Empire State University of Topeka
Topeka, Kansas 66604

Please lend your concern to the programming on KTV-1. It is sure
you’ll note this in no way offers serious "competition" to your schedule.

I look forward to your favorable response to this request, and in your own
organization joining our station in the enhancement of Kansas’ first
educational television facility.

Cordially yours

Thad M. Sandstrom

718 Market

Inc.
This letter has been sent to the following:

Mr. R.E. Farnsworth
KCMO-TV
Signal Hill
Kansas City, Missouri

Mr. S. R. Hartenbower
KCMO-TV
123 E. 31st
Kansas City, Missouri

Mr. Neil Woolinger
KCMO-TV
11th and Central
Kansas City, Missouri

Mr. Ralph Wade
KCMO-TV
Box 656
Pittsburg, Kansas

Mr. D. F. Knight
KODE-TV
1023 W. 16th
Joplin, Missouri

Mr. Samuel Isenmu
KKTV
1500 N.W. Street
Wichita, Kansas

Mr. M. Bess Benson
KKTV, Channel 12
Box 12
Wichita, Kansas

Mr. George Brown
KCTV
121 E. 21st
Wichita, Kansas

Mr. Tom Matthews
KTTV-14
40th and Paraco Streets
St. Joseph, Missouri

Mr. Rob Schmidt
KAYS-TV
2600 Hall Street
Hays, Kansas

Mr. Wendell Elliott
KVC-TV
Box 157
Dodge City, Kansas

Mr. Rush Evans
KKTV
Box 2110
Colorado Springs, Colorado 80901
LIST OF EQUIPMENT  \IMMI AL K. MU-TV -- TOPEKA, KANSAS

(1) Microwave STL or Remote Equipment

(2) Film Chain -- Pick-up head, Projectors, Multiplex systems

(3) Lighting -- Fresnels, Scoops, Barn-doors, Dimmers

(4) Audio -- Microphones, Beams, Tape Recorders, Turntables

(5) Studio -- Cameras, Monitors, with related equipment

(6) Transmitter -- Color phase equalizing (RCA)

  Color signal analyzer

  Vectorscope

  Distribution amplifiers

  Color bar generator
of the Dr. John
May 12, 1960

Mr. Jim Eads
Vice President and General Manager
Southwestern Bell Telephone Co.
628 Cuinoy
Topeka, Kansas

Dear Jim,

Topeka's ETV station is in serious difficulty. Washburn's station, KTWU on Channel 11, is doing a fine job, without the use of local tax money. KTWU hoped to raise $25,000 from the Topeka business community. So far, $6,000 has been raised. A minimum of $10,000 is needed to continue through until fall when new funds become available.

Stauffer Publications recently gave an additional $25,000 to the ETV project. I am writing to a dozen Topeka business leaders. WIBW will give another $1,000 if we can get nine others to do the same, and save our ETV station.

I'll be contacting you the first of the week.

Cordially yours,

Thad M. Sandstrom

Th. Stup
Mr. Thad Svanstrom  
General Manager WIBW-AM-FM-TV  
5600 N. 6th  
Topeka, Kansas 66604

Dear Thad:

Let me add my congratulations to the others I am sure you have received in response to your selection as one of the eight recipients of the Distinguished Citizens Award presented at Washburn University Thursday evening at the Civic Dinner.

I should also like to thank WIBW-TV for the exciting cooperative telecast arrangements associated with the visitation of Governor Ronald Reagan and Senator Frank Carlson to Manhattan and Topeka respectively.

It is my hope that WIBW-TV will cover all or as many of the 1967-1968 Alf Landon Lectures as possible and that WIBW-TV might generously share the coverage of these speeches as was done with Governor Reagan. The lecture series is an unique project and from the comments I have heard, people are very much looking forward to seeing and hearing Governor Romney and Senator Robert Kennedy. I am too.

In closing may I reiterate KTNJ's thanks and congratulations to WIBW-TV and yourself.

Most cordially,

Dr. Dale N. Anderson  
Director, Educational Television
December 9, 1967

Dr. Dale Anderson
Director, KWU
Shibburn University
Topeka, Kansas

Subject: CHANNEL 11 on CABLE SYSTEMS

Dear Dale,

I thought you would be interested in the attached letter which our cable company at Pittsburg, Kansas, sent to Larry Hudson of Iola who operates a cable system up through Southeast Kansas. As you can see from this letter, we are asking that they provide service on Channel 11 and Channel 13 to our cable system at Pittsburg. At the present time, this microwave system does not carry Channel 11, but we think they should carry Channel 11 in place of one of the Kansas City channels. At the present time, this microwave system carries the main Kansas City channels plus channel 11. Since most of the cable systems in question receive all NBC programs via channel 11 in Pittsburg, we are recommending that they drop Channel 4 and substitute Channel 11.

If our efforts are successful, it seems that channel 11 would be added to the cable systems via microwave at Chanute, Humboldt, Iola, Neodesha, Neosho, Independence, Coffeyville, Parsons, Pittsburg and possibly Joplin, Missouri.

Just wanted you to know that we keep plugging away.

Cordially,

[Signature]

[Address]

P.S.
BIBLIOGRAPHY

Periodicals


"Instructional Television," Curator of the University of Missouri, School of Education, University of Missouri at Kansas City, 1965.

"Special Issue on ETV," Nation's Schools, October, 1965.


School and State Publications

Kansas State College. Proposal for a research grant for a project in the use of Closed Circuit Instructional Television, 1955. (Mimeographed.)

Kansas State College. Proposal of the Five State Colleges in Kansas to the Kansas Legislature, 1955. (Printed.)


Kansas State College. Sworn Statement of the College before the Federal Communications Commission. Manhattan, Kansas, October, 1951. (Mimeographed.)


Throckmorton, Adel F. A Guide to Educational Television. Issued by the Kansas State Department of Public Instruction, Topeka. 1966. (Printed.)

University of Kansas. Sworn Statement of the University before the Federal Communications Commission. Lawrence, Kansas: Kansas University Press, 1951. (Printed.)

Newspaper Articles


Allen, John O. Complaint filed with the FAA, October 5, 1963.

Citizens Committee for Educational Television in Kansas. Press releases prepared for the mass media about educational television, December, 1956. ( Mimeographed.)

Federal Communications Commission. Opinion Memorandum issued regarding the application of Kansas State College for a construction permit for a new Television Broadcast Station. July 25, 1952. (Typewritten.)


Milbourn, Max W. Text of a statement made before the Sub-Committee on Communications and Power, of the Interstate and Foreign Commerce Committee, Kansas State Legislature. November 3, 1959. (Typewritten.)

Whan, Forest. Unpublished survey of educational television station budgets. 1956. (Typewritten.)
PERSONAL LETTERS USED FOR THESIS RESEARCH


Garvey Foundation. Letter to Washburn University, April 16, 1964.


Garvey, Willard W. Letter to Dr. Frank Stanton, July 24, 1963.


Steel, David. Letter to Thad Sandstrom, August 28, 1963.


A HISTORY OF EDUCATIONAL TELEVISION IN THE STATE OF KANSAS

by

JAMES LAWRENCE HAMILTON

B. A., Creighton University, 1966

AN ABSTRACT OF A MASTER'S THESIS

submitted in partial fulfillment of the

requirements for the degree

MASTER OF SCIENCE

Department of Journalism

KANSAS STATE UNIVERSITY
Manhattan, Kansas

1968
The State of Kansas is one of the very few states that does not operate a state-wide educational television network. Kansas has only one educational television station (ETV) on the air in June, 1968...that station being operated without direct state aid or support.

Television is not new to Kansas by any means. In 1932, Kansas State College, Manhattan, started experiments with TV equipment. Faculty and students of the College of Engineering designed and built a complete TV transmitter, and held an experimental license for Channel 1 in the 1930's.

ETV received support again in 1953, before any commercial television station was on the air in Kansas. Kansas State College (now Kansas State University) was the first in the nation to hold a construction permit for an ETV facility. Initial efforts to get money from the Legislature failed, and five state schools presented a joint proposal in 1955. However, efforts to obtain any money from the Kansas Legislature were unsuccessful until 1960.

In 1960, the sum of $25,000 was appropriated for an exhaustive study of the feasibility of educational television for the State of Kansas. The study was conducted by John Schwarzwalder. The result of the 10-month survey gave Kansas the plan for a six million dollar state-wide ETV network.

There was a controversy over the survey, and the ETV issue did not come to a vote in the Legislature until 1963. The wait for the introduction of an ETV bill was anticlimactic...the schools had been asking for some type of educational television.
system since 1953. A bill was finally introduced in the 1963 Legislature that would have given the state an ETV system of six stations...thereby covering the state with ETV signals. The bill passed through the Kansas Senate, and came through committee to the Kansas House. In the 1963 House, the ETV bill lost by one vote. This probably ended all hopes for a state-wide ETV system ever to exist in the State of Kansas.

After the refusal by the Legislature to allow the larger state schools to enter the television business, a small municipal school became interested in ETV. Washburn University of Topeka started to explore the ETV problem in 1963. WIBW-TV donated a used tower and transmitter to the University for ETV. For two years Washburn tried to obtain the necessary funds to get a television station on the air. A grant from the Federal Government under the Department of Health, Education, and Welfare gave the station the push to purchase equipment and get on the air.

KTWU (the call letters of the ETV station operated in Topeka by Washburn University) inaugurated full operation on October 21, 1965, with an annual operating budget of $100,000 a year.

In only three months the station was in financial trouble. The main source of revenue for the new station was to be through in-service, in-school programming. School districts were to pay a per-student fee for the use of the KTWU programs in the classroom. This source of revenue had been over-estimated, and a gift of $25,000 from Stauffer Publications kept the station from going black.
KTVU picked up individual support from viewers, and managed to skirt financial disaster. The tornado that struck Topeka the night of June 8, 1966 did not harm the station, but much of the Washburn University campus was destroyed. A combination of Federal Disaster Relief, business gifts, individual contributions and state funds allowed Topeka, Washburn University and KTVU to survive. KTVU continues despite limited staff and facilities to be the only ETV station in Kansas.