

AMATEUR RADIO

AIR DATES: SATURDAY - NOVEMBER 5 - 12:25 - 8:30 p.m.
SUNDAY 6 7:30 p.m.

PROGRAM # 11

tape date: 10/28

LENGTH: FIVE MINUTES (TOTAL)
:30 taped intro
4:15 interview
:15 closing

GUEST SPEAKER: DONALD J. STENZ, HEAD,
ELECTRONIC COMMUNICATIONS TECHNOLOGY-MSOE
FACULTY ADVISOR-STATIONW9HHX
COMMENTATOR: TOM LAMBERT, WISN

FACULTY COORDINATOR: T. CLEMENTS

ASS'T. FAC. COORDINATOR: THOMAS NEDWEK
PR CONTACT: JIM SLAWNY

30 seconds taped introduction

LAMBERT: (introduces subject and speaker) WHAT IS AMATEUR RADIO OR
WHAT IS A RADIO AMATEUR?

STENZ: WELL, TOM, AMATEUR RADIO IS A HOBBY, A SCIENTIFIC HOBBY.
MORE THAN THAT, EVERY RADIO AMATEUR WHO PURSUES THIS HOBBY
IS A MEMBER OF AN INTERNATIONAL FRATERNITY. THERE ARE ABOUT
250,000 RADIO AMATEURS, OR HAMS, AS THEY ARE CALLED, IN THE
WORLD TODAY. NEARLY 200,000 ARE IN THE UNITED STATES.
TO DEFINE A RADIO AMATEUR, I THINK WE WOULD HAVE TO CALL HIM A
COMMUNICATOR AND AN EXPERIMENTER. HE ENJOYS TALKING WITH OTHER
AMATEURS THROUGHOUT THE WORLD BY USE OF THE RADIO EQUIPMENT HE
HAS BUILT. HIS TRANSMITTER MAY BE THE RESULT OF HIS OWN DESIGN
AND EXPERIMENTATION, OR IT MAY BE BUILT FROM A SIMPLE KIT...
THE SAME TYPE OF KIT THAT A HI FI FAN MIGHT ASSEMBLE HIS STEREO
PHONOGRAPH FROM. THE HAM HAS THE ADVANTAGE THAT, WHEN HE TALKS
INTO THIS PIECE OF HARDWARE, HE HAS ~~EXACTLY~~ CONSTRUCTED, A NEW
COUNTRY MIGHT ANSWER BACK, OR PERHAPS IT WILL BE THE VOICE OF
AN OLD FRIEND. HE MIGHT NEVER MEET THIS FRIEND IN PERSON EVEN
THOUGH THEY TALK TOGETHER EVERY DAY. EVEN TALKING WITH A STATION
IN RUSSIA WOULD NOT BE UNCOMMON, AND HERE MORSE CODE WOULD BE

STENZ:

...USED TO HURDLE THE LANGUAGE BARRIER.

LAMBERT:

WHAT DO THESE PEOPLE TALK ABOUT WHEN THEY MAKE CONTACT BY TWO WAY RADIO?

STENZ:

ANYTHING AND EVERYTHING. AFTER DISCUSSING THE WEATHER AND THE BASEBALL SITUATION, THE TOPIC USUALLY COMES AROUND TO THE EQUIPMENT BEING USED. THIS IS NOT UNUSUAL SINCE MOST AMATEURS HAVE INVESTED MANY HOURS IN THE BUILDING OF THEIR STATION. USUALLY MORE HOURS THAN DOLLARS.

LAMBERT:

HOW MUCH WOULD AN AMATEUR STATION COST ?

STENZ:

AS WITH ANY HOBBY, THE INVESTMENT CAN BE ANYWHERE FROM \$10 UP. I WOULD SAY THE AVERAGE MIGHT BE LESS THAN \$100. AS AN EXAMPLE, THE TRANSMITTER I HAVE IN MY CAR WAS ASSEMBLED FROM A KIT THAT COST \$40. BY EXPERIMENTING WITH SURPLUS AND USED PARTS, THE COST COULD BE KEPT VERY LOW.

AS AN EXPERIMENTER, THE AMATEUR IS FAMOUS. THE AMATEUR IS CONSTANTLY IN THE FOREFRONT OF TECHNICAL PROGRESS BECAUSE OF HIS CURIOSITY AND EAGERNESS TO TRY ANYTHING NEW. IT TOOK AMATEURS TO PROVE THAT HIGH FREQUENCY TRANSATLANTIC COMMUNICATIONS WAS POSSIBLE IN 1923. HE HAS THE TIME AND WILLINGNESS TO TRY NEW IDEAS THAT RESEARCH ORGANIZATIONS WOULD NOT FIND WORTH THEIR MONEY TO EXPERIMENT WITH.

LAMBERT:

HOW DOES ONE BECOME A RADIO AMATEUR?

STENZ:

THE FEDERAL COMMUNICATIONS COMMISSION REGULATES AMATEUR RADIO JUST AS IT REGULATES COMMERCIAL RADIO OR RADIO OF ANY KIND IN THE UNITED STATES. THERE IS AN EXAMINATION WHICH COSTS NOTHING AND WHICH COVERS RULES AND REGULATIONS, SOME RADIO THEORY, AND A TEST IN MORSE CODE. THE MORSE CODE IS NECESSARY EVEN IF THE OPERATOR DOESN'T INTEND TO USE IT BECAUSE OF POSSIBLE EMERGENCY SITUATIONS. IN AN EMERGENCY A TRANSMITTER TO SEND CODE WOULD BE VERY EASY TO CONSTRUCT FROM PRACTICALLY

STENZ: ...ANY PIECE OF EQUIPMENT THAT HAS A TUBE IN IT. WITH THIS A MAN COULD CALL FOR HELP WITH THE CONFIDENCE THAT EVERY AMATEUR CAN READ AND UNDERSTAND HIS SOS BY MORSE CODE.

LAMBERT: ^{EMERGENCIES}
BUT HOW OFTEN DO THESE ~~EMERGENCIES~~ HAPPEN ?

STENZ: MORE OFTEN THAN WE WOULD LIKE, TOM. AFTER EVERY HURRICANE OR FLOOD, YOU WILL READ ABOUT HOW AMATEURS FURNISHED COMMUNICATION WHILE TELEPHONE LINES AND REGULAR CHANNELS WERE DOWN OR TIED UP. THE AMATEURS HAVE A VAST ACCUMULATION OF COMMUNICATION EQUIPMENT THAT IS ALWAYS READY BECAUSE THEY USE IT EVERY DAY. YOU WILL FIND THAT HAMS ARE QUITE OFTEN THE CORE OF CIVIL DEFENSE. FOR THE REASON THAT IT SERVES THE PUBLIC INTEREST IN THIS FORM AND IN MANY OTHER WAYS, SUCH AS COMMUNICATION WITH SERVICEMEN OVERSEAS, I THINK THAT AMATEUR RADIO IS A WORTHWHILE HOBBY....AND IT'S LOTS OF FUN.

LAMBERT: (CLOSING - INTRODUCES NEXT WEEK'S PROGRAM - MODERN RADIO)