Development of Security Facilities

THRU: Chief, Army Communications Service
From: Asst. Chief Signal Officer
29 Mar 1945

TO; Chief, Engineering & Technical Service.

1. One of the functions of Army Communications Service charged to the Signal Security Branch is as follows: "Directs engineering and development of and operates signal security facilities." Signal security facilities fall in four categories as follows:

   a. Cryptographic security
   b. Transmission security
   c. System security
   d. Protective security

Cryptographic security includes the keying arrangement prior to introduction to the circuit. It is the method of applying the cryptographic principles.

2. Engineering & Technical Service is charged with "all research and development of Signal Corps equipment except specified cryptographic equipment."

3. The division of responsibilities is clear even where voice transmission is involved if it is borne in mind that the security which Army Communications Service is interested in is, in this case, the cryptographic portion thereof which deals with the cryptographic key to be used at the terminals. To be more specific, the AN/TRC-6 has a modulator AN/TRA-16; the latter is not considered to be a piece of cryptographic equipment. The only interest the Army Communications Service has in this device is to evaluate it for security in accordance with a prescribed keying arrangement which they should specify. It is from this keying arrangement that the length of security can be indicated.

4. Similar devices to this will unquestionably arise in connection with other pieces of equipment and for other applications, and their security similarly depends on the cryptographic keying features introduced.

5. It is therefore considered highly desirable that from the initial conception of such equipments the Army Communications Service be included in order that they may through this liaison indicate the security assurance which will be given by the apparatus.

BY ORDER OF THE CHIEF SIGNAL OFFICER:

JAMES A. CODE, JR., Major Gen.
Assistant Chief Signal Corps

COPY
TO Chief, Engineering & Technical Service
FROM Chief, Army Communications Service
29 Mar 45

COMMENT NO. 2

1. The division of responsibilities indicated in Comment No. 1 agrees with the allocation of duties as interpreted by this service and described in Memorandum Serial No. 2, 1 January 1945, "Functional Responsibilities."

2. Complete clarification between this service and Engineering & Technical Service along these lines was had early in January in a meeting between representatives of the Army Communications Service and Engineering and Technical Service.

FOR THE CHIEF, ARMY COMMUNICATIONS SERVICE:

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