Just Keeping in Touch

MACON'S VOICE BOX — Navy technicians tune one of the SRT transmitters in Radio II. Radio II is primarily a transmitter station for the heavy cruiser.

EVERY MOVE a ship makes, every port it enters or departs, every operation in which it is involved, requires one or more messages to a specific person or organization. To communications falls the unique and constant task of putting these messages through.

A great part of communications comes under the control of radiomen. Like most ships, the heavy cruiser USS *Macon* (CA 132) has three radio rooms which are loaded with complicated equipment, operated by these radiomen. These rooms are known as Radio I, Radio II, and Radio III.

Radio I contains most of the ship's receiving equipment. This includes receivers and teletypes which are set up so that each receiving position has a key for remote control of the transmitters which are located in other parts of the ship. When a message is received in the conventional manner or by teletype, it is logged in, written up, signed by the Communications Watch Officer, printed, and delivered to department heads throughout the ship. These department heads usually initial to confirm that they have seen it, tear off a copy and take the necessary action required.

Radio I is also the headquarters of the supervisor. Before assuming his daily duties he gathers all available information concerning circuit conditions, special orders, cruising disposition, traffic on hand, acknowledgements and replies pending, guard ships, control circuits in use, frequencies guarded and transmitters in use. He also sees that all necessary publications are in the radio room. In other words, he is ready to take action on anything that might come up.

Radio II is primarily a high-powered transmitter station for the ship. The men in this space are responsible for changing and keeping transmitters in tune and selecting different frequencies used in Radio I. The selected frequency is connected to the correct key by "patching" the circuit into Radio I. This is like the old-fashioned telephone switchboard. When you call the operator (Radio II) a cord is plugged into a hole. The person you want to talk to (Radio I) is reached by plugging in the other end of the cord and the connection is complete.

Radio III is more or less a complete radio room in itself and contains several transmitters and receivers. It is set up in case anything goes wrong with Radio I or II. The operators can take complete control from here and either send or receive. It also contains its own independent power supply which can be cut in if the normal ship's power goes out.

Remote control transmitting and receiving positions are located in the bridge, flag bridge and CIC. The receivers in Radio I and transmitters in Radio II and III can be connected from these points just by dialing the desired frequency. This is important during operations, when much of the radio equipment must be patched in order to maintain constant knowledge of everything taking place within your own ship and others connected with the operation.

In order to keep all of this equipment up to peak efficiency and assure that there are qualified radiomen to operate it, there must be a constant training program.

Macon, like most other ships, has its difficulties. Transfers and separations seriously reduce the number of qualified communicators. Part of this problem was overcome during the three-and-a-half month yard period in the Boston Naval Shipyard.

With permission from *Macon*'s commanding officer and the District Communications Officer, space was obtained in a building behind the First Naval District headquarters. This was furnished with tables which were wired for operating positions for 18 men. Using basic code records and oscillators, these men, striking for the rate of radioman, were soon brought up to Fleet broadcast speed of approximately 18 words per minute. This was accomplished by "pouring" the code into them for five hours a day. The remainder of the time was concentrated on copying Fleet broadcasts with introduced interference like that encountered aboard ship. The training included sending and circuit procedures.