

# How We Get Our War News

A Glimpse Inside the "News" Lines. By H. Winfield Secor

THE problem of gathering and properly distributing to the various newspapers throughout the country, the latest war news, or in fact news of any character, is one of the greatest problems encountered by the Associated Press Bureau. This useful news organization has

and distant cities by Morse code over the telegraph wire. However, a newly perfected transmitting system, known as the "Morkrum" arrangement, is now in use for New York City and vicinity by the Associated Press. It may be remarked to start with, that in the news transmitting

reader can very easily decipher the meaning of the news item included on this particular piece of tape.

We show herewith also illustration of the transmitting and receiving instruments of the Morkrum pattern and two of the transmitting instruments are now in use in the Morkrum transmitting room of the Associated Press. These two instruments work simultaneously sending out news over a common circuit of two wires. Whatever papers require the news at the particular moment are switched on to the transmitting circuits by means of a plug and jack



Photo (C) by Underwood & Underwood. Showing Morkrum Sending and Receiving Printing Telegraph System Installed in Associated Press Offices in New York City. Local Printer to Left.

its main offices located in New York City, where it has facilities and the necessary electrical installations and circuits, enabling it to promptly receive and transcribe all the latest news from every part of the country and also from the cables across the ocean as well as long distance wireless.

office of this association, there are handled on the average 32,000 words per day.

The diagram at Fig. 1 will make clear how the network of "news" gathering and distributing lines terminate in a common clearing house, or as we know it, the Associated Press. Cables and radio bring in

MORKRUM CODE															
-	@	:	\$	3	%	&	£	B	'	(	)	?	#	9	0
A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P
[Diagram showing dot patterns for letters A-P]															
1	4	#	5	7	.	2	/	6	"	PERIOD	SHIFT	RELEASE	SPACE	LINE	RETURN
Q	R	S	T	U	V	W	X	Y	Z						
[Diagram showing dot patterns for letters Q-Z and special characters]															

Fig. 2. The New Morkrum Automatic Printing Telegraph Code.

switchboard, similar to that used in telephone work. Means is provided for the attendant at each receiving station to notify the sender of trouble with the machine.

The instruments are of the very finest workmanship, of course, and work with lightning rapidity and precision. The transmitter in the form of a typewriter as already mentioned, also includes the transmitting battery of polar relays; to the number of 12, which successively send out at high speed, the necessary positive and negative electrical impulses over the line

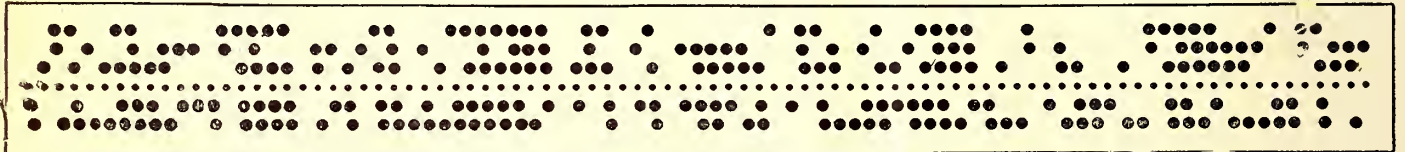


Fig. 3. Specimen of Perforated Code Tape Containing News Items, Ready to Send Through Automatic Transmitter.

When the news is received in the forms of telegrams, etc.; after the news is edited, it is transmitted to the various newspapers throughout the country and city who sub-

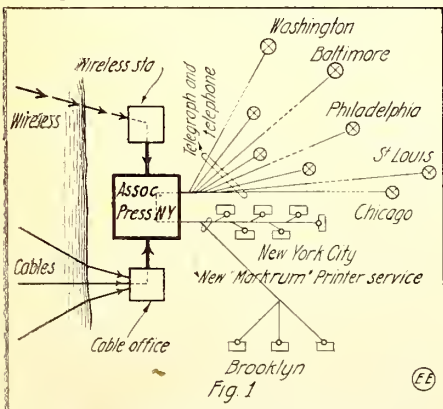
scribe to this press service. So far, and as has been the case for many years, the news is transmitted to outlying districts

the news from across the ocean, while telephone and telegraph serve to handle the land "news" service. With the previous arrangement and making use of Morse telegraph operators for transmitting this news to the various newspapers in New York and Brooklyn, it required a great many extra messengers to deliver some of the news, and also a number of Morse operators; as the average speed available by this form of electrical transmission of intelligence is rather low or about 25 to 30 words per minute.

We show herewith the new Morkrum code (Fig. 2), as used with their machines, and as seen a series of round perforations in a paper tape serve to transmit the proper sequence of electrical signals over the line to the various newspapers, to actuate a printing receiver at the end of every line. Fig. 3 shows a specimen of this perforated paper tape. This tape is prepared very quickly and easily by means of a perforator in the form of an ordinary typewriter with a keyboard exactly similar, so that any typist may with very little instruction and practice operate same successfully. By reading the rows of dots across the paper in connection with the code here given, the

to the receiving printers. As soon as the end of a printed line is reached a red light glows under the keyboard of the transmitter. The operator then presses his shift key for line spacing as many times as the printed lines are to be spaced apart. At each transmitting station, a local printer is simultaneously operated so that all of the messages sent out can be checked or watched to see that the spelling is correct and that one line is not being printed over another, etc.

As the speed of this system is much higher than that available when ordinary Morse telegraph instruments are utilized and when the greatest rush of news occurs; which is, by the way, about 11 a. m. to 1 p. m. each day; it is generally the case that three operators or more perforate the tapes simultaneously, as these tapes can be passed through the transmitting machines at very high speed, say 60 to 70 words per minute and more. It is thus seen that two transmitting keys using this tape, can take care of as many as four operators. The received news at each station is printed in type on a continuous paper roll about eight inches wide. It is detached from the printer as the machine feeds it out.



How the Associated Press Gathers and Distributes "News" From New York City as a Center.

scribe to this press service. So far, and as has been the case for many years, the news is transmitted to outlying districts