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Revised UNCLASSIFIED
DEC DIR 520.9

DIRECTORY OF RADIO EQUIPMENT

COPY NO. 40

ASSIGNED TO _____

FOREWORD

THE RADIO EQUIPMENT INCLUDED IN THIS DIRECTORY IS THAT NOW IN USE BY OR UNDER PROCUREMENT FOR THE ARMY.

THE DIRECTORY HAS BEEN COMPILED IN LOOSE LEAF FORM WITH THE VARIOUS RADIO SETS APPEARING IN NUMERICAL ORDER ACCORDING TO TYPE NUMBER.

ADDITIONAL PAGES WILL BE SUPPLIED AS NEW RADIO EQUIPMENT IS STANDARDIZED.

OFFICE - CHIEF OF STATISTICAL SERVICE
SERVICES OF SUPPLY

✓
RADIO SET SCR-131

RADIO SET SCR-131

General Purpose: Command communication between Brigade and Regiments and between Regiments and Battalions of the Infantry Division.

Using Service(s): Infantry

Communicates with: SCR-131, SCR-193-(), SCR-245-()

WEIGHT:

76.5 lbs.

VOLUME:

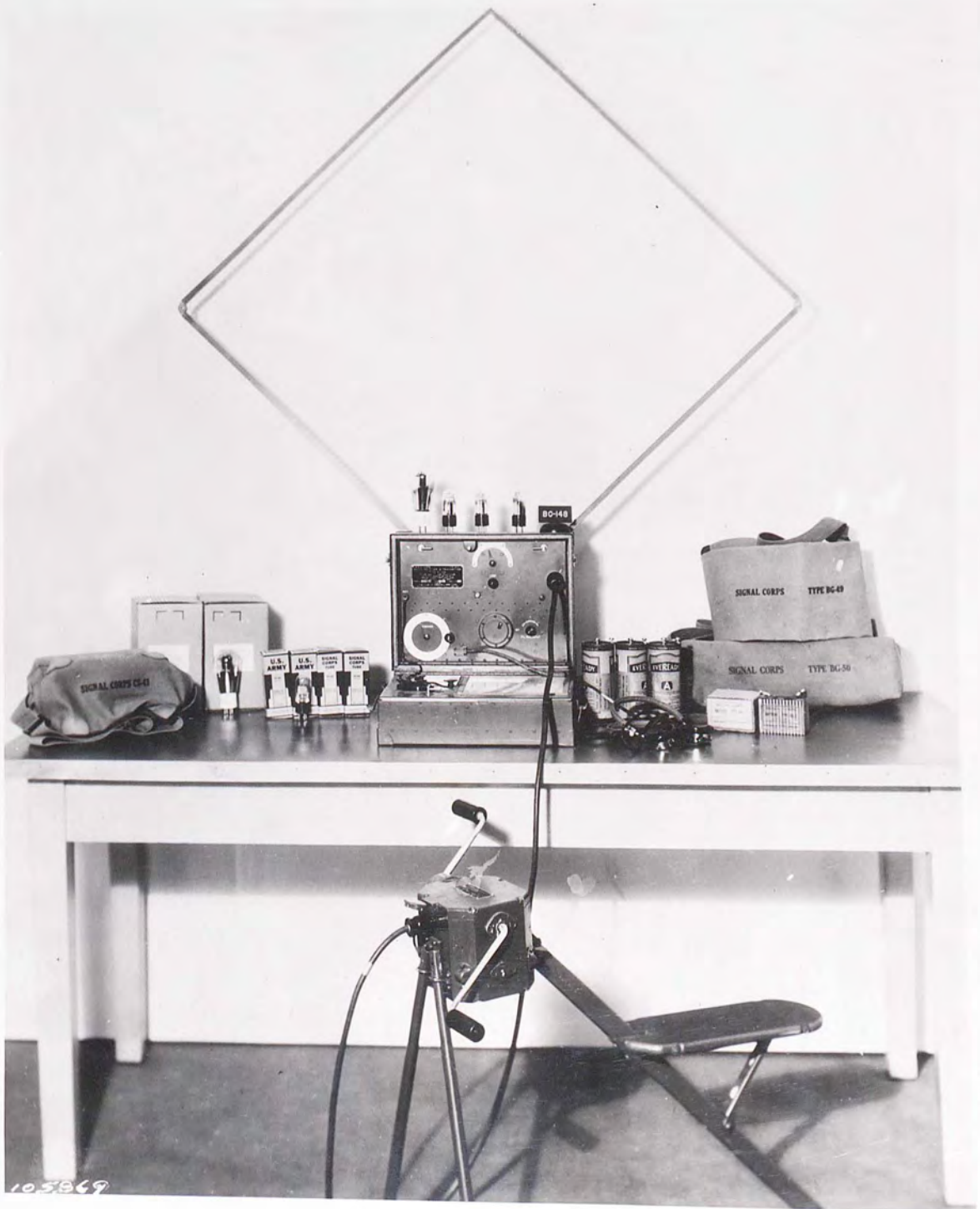
1.8 cu. ft.

Method of Transportation: Two-man pack or carried in vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	dry batteries
Frequency Range (KC)	3,960 - 4,360	3,960 - 4,360
Type of Signal	CW only	CW only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-148
 Generator GN-35
 Antenna Loop LP-7

Remarks: This set has recently been classified as limited standard. Radio Set SCR-284, recently standardized, will replace the SCR-131. Temporary replacement for training purposes is the SCR-288.



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RADIO SET SCR-161

RADIO SET SCR-161

General Purpose: Command communication between Division Artillery and Regiment and from Regiment to Battalions. Also, used for liaison purposes between Artillery Units.

Using Service(s): Field Artillery

Communicates with: SCR-161, SCR-245-(), SCR-288

Method of Transportation: Two-man pack, horse-pack or carried in vehicle

WEIGHT:

76.5 lbs.

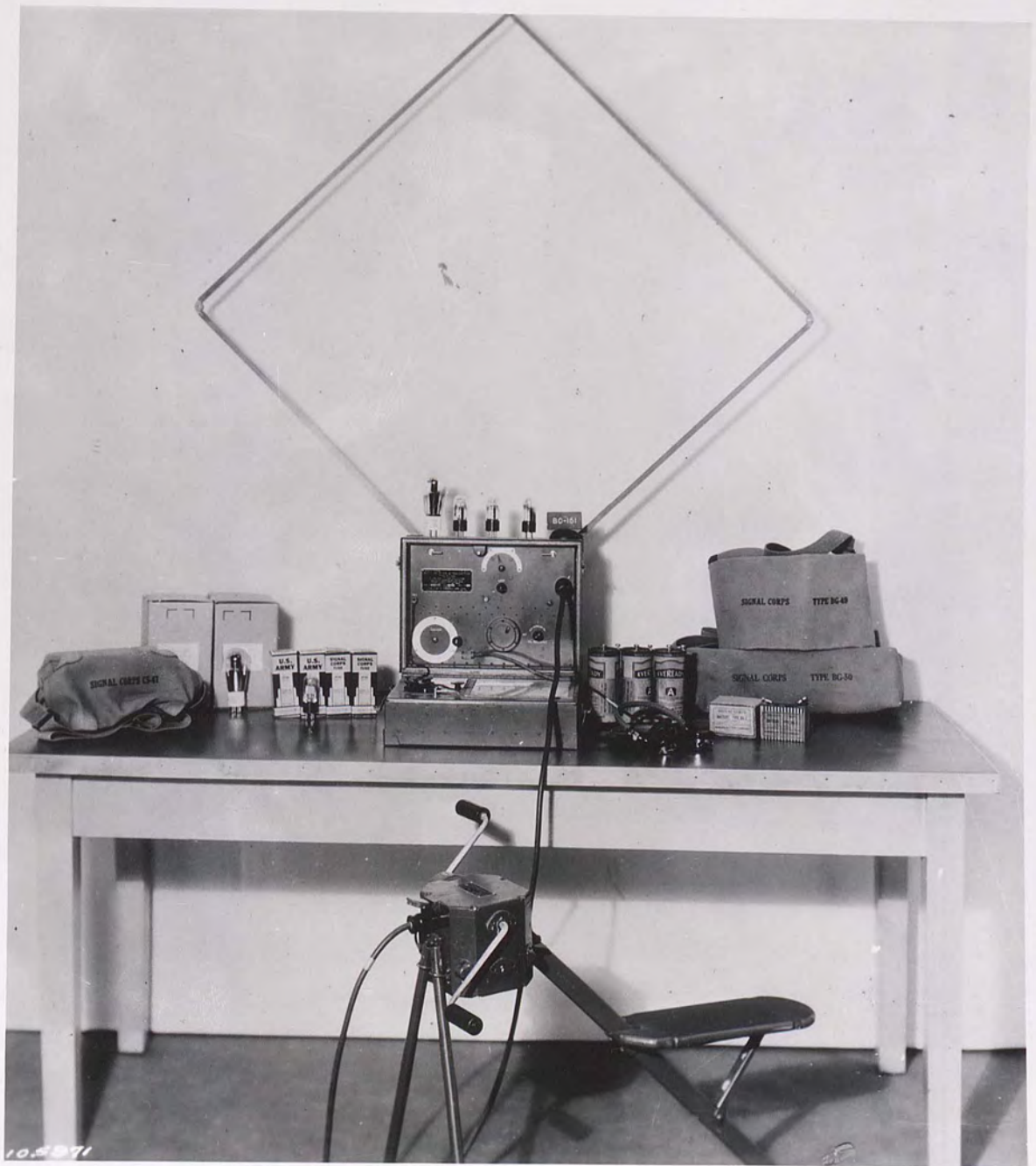
VOLUME:

1.8 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	dry batteries
Frequency Range (KC)	4,370 - 5,100	4,370 - 5,100
Type of Signal	CW only	CW only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-151
 Generator GN-35
 Antenna Loop LP-7

Remarks: This set has been classified as limited standard. SCR-284 recently standardized will replace the SCR-161. Temporary replacement for training purposes is the SCR-288.



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RADIO SET ✓ SCR-171

RADIO SET SCR-171

General Purpose: Command communication between Division Headquarters and Brigades (Square Division). Also, for similar purpose between Division Headquarters and Regiments (Triangular Division).

Using Service(s): Infantry, Field Artillery and Signal Corps

Communicates with: SCR-171, SCR-193-(), SCR-245-()

WEIGHT:

179 lbs.

VOLUME:

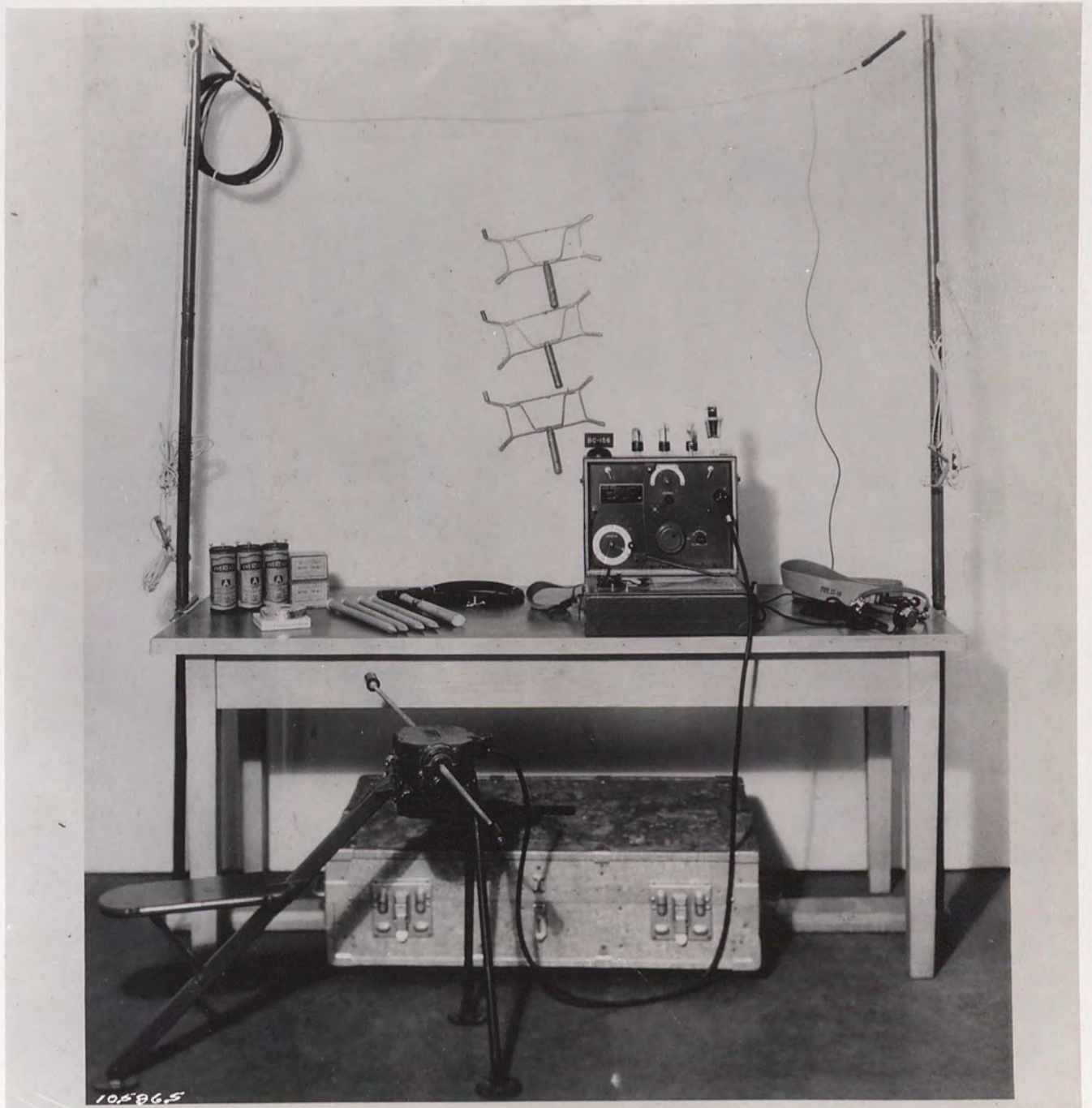
4.3 cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	dry batteries
Frequency Range (KC)	2,640 - 3,040	2,640 - 3,040
Type of Signal	CW only	CW only
Range (Miles)	15 miles	

Major Components: Radio Receiver and Transmitter BC-156
 Generator GN-35
 Antenna AN-19

Remarks: This set has been classified as limited standard and will be used for training purposes together with a temporary replacement set known as the SCR-288. It will be replaced by the SCR-284, recently standardized.



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RADIO SET SCR-177-B

RADIO SET SCR-177-B

General Purpose: For use where a medium power, medium range radio set is required for continuous operation. For ground to plane and point to point communication between Division, Corps and Armies.

Using Service(s): Signal Corps, Air Corps and Coast Artillery

Communicates with: SCR-177-(), SCR-187-(), SCR-193-(), SCR-238-A, SCR-245-(), SCR-261-A, SCR-287-A

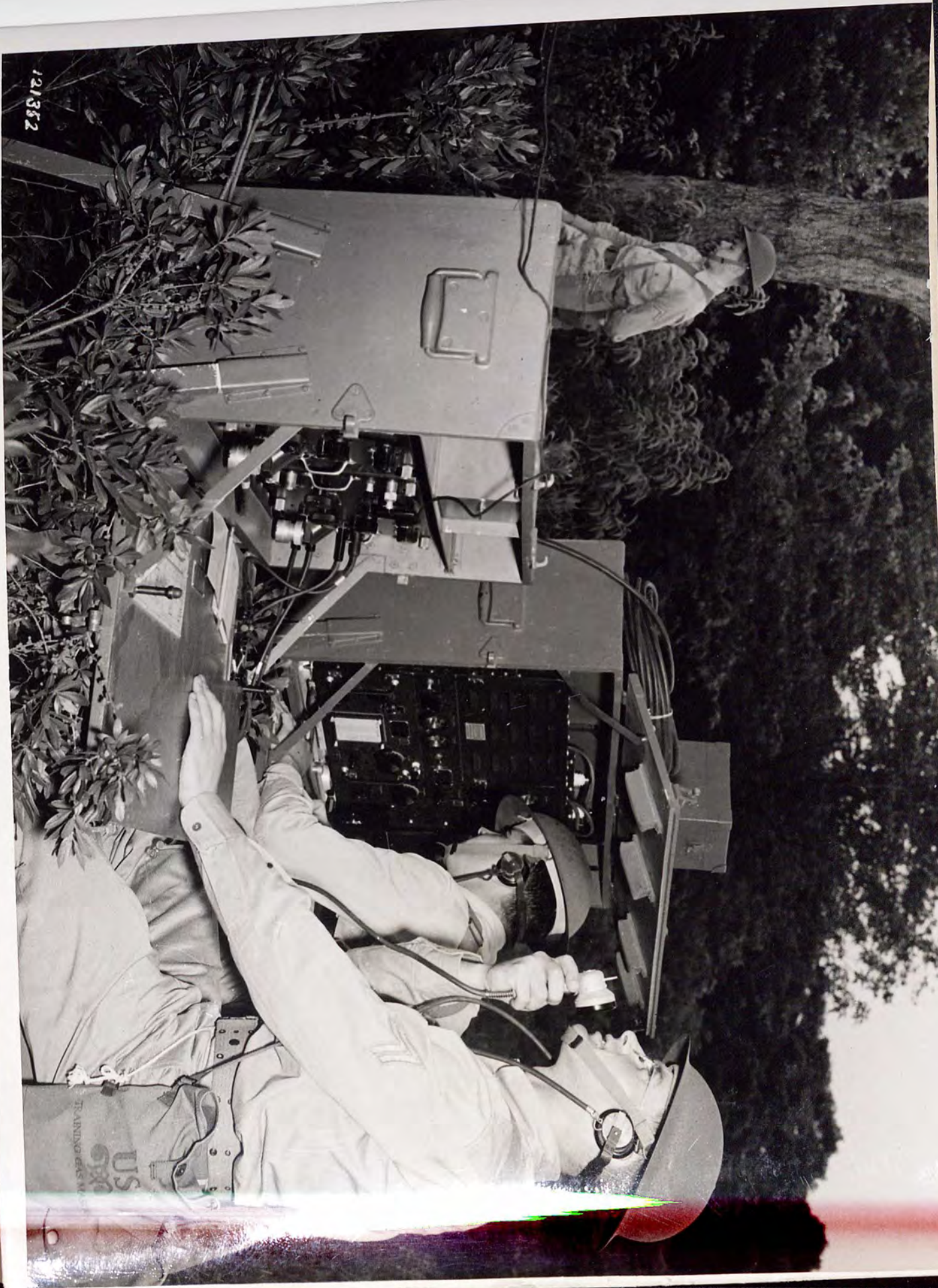
Method of Transportation: Vehicle

WEIGHT: 829.6 lbs.
VOLUME: 22 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	gas-engine-generator	12-volt storage battery
Frequency Range (KC)	400 - 800 1,500 - 4,500	150 - 1,500 1,500 - 18,000
Type of Signal	All	All
Range (Miles)	CW - 100, Tone - 70,	Voice - 30

Major Components: Radio Transmitter BC-191-() Radio Receiver BC-314-()
Radio Receiver BC-312-() Power Unit PE-49-()

Remarks: Normally operated on the ground.



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RADIO SET SCR-178



RADIO SET SCR-178

General Purpose: For point to point and ground to plane communication between all field artillery units (except pack) and aircraft for observation purposes.

Using Service(s): Field Artillery

Communicates with: SCR-178, SCR-179, SCR-238-A

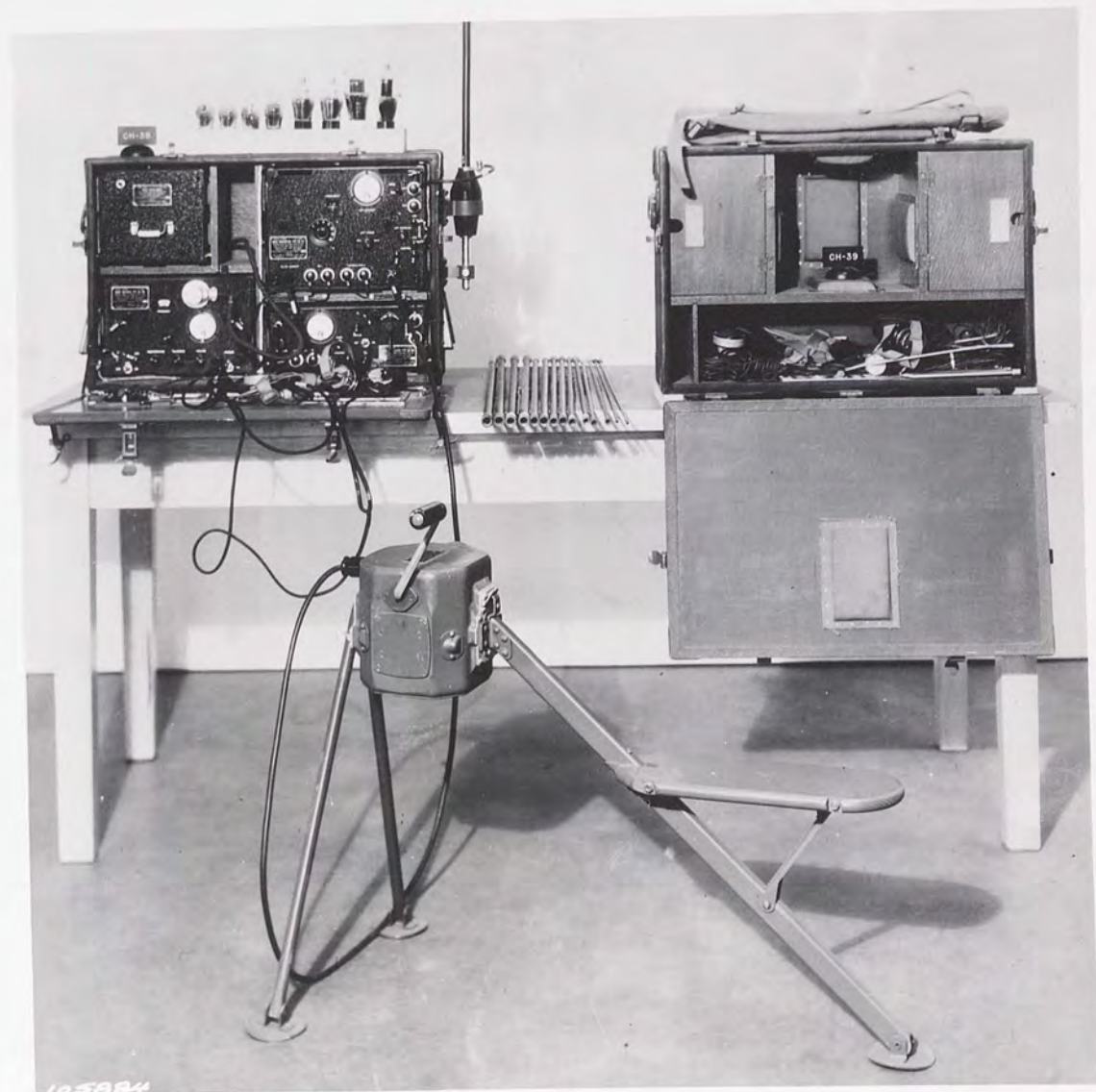
Method of Transportation: Vehicle

WEIGHT: 200 lbs.
VOLUME: 5 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	dry batteries
Frequency Range (KC)	2,400 - 3,700	2,400 - 3,700
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 25, Tone - 20,	Voice - 10

Major Components: Radio Transmitter BC-187-A Radio Receiver BC-186
Radio Modulator BC-188-A Generator GN-37

Remarks: When equipped with hangers for pack saddle mounting, this set is designated as the SCR-179.



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RADIO SET SCR-()-183

RADIO SET SCR-()-183

General Purpose: Aircraft command set used for short range air to ground work, but mainly for inter-communication between planes in the same flight.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-A, SCR-197-(),
SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283

Method of Transportation: Airplanes

WEIGHT:

45.3 lbs.

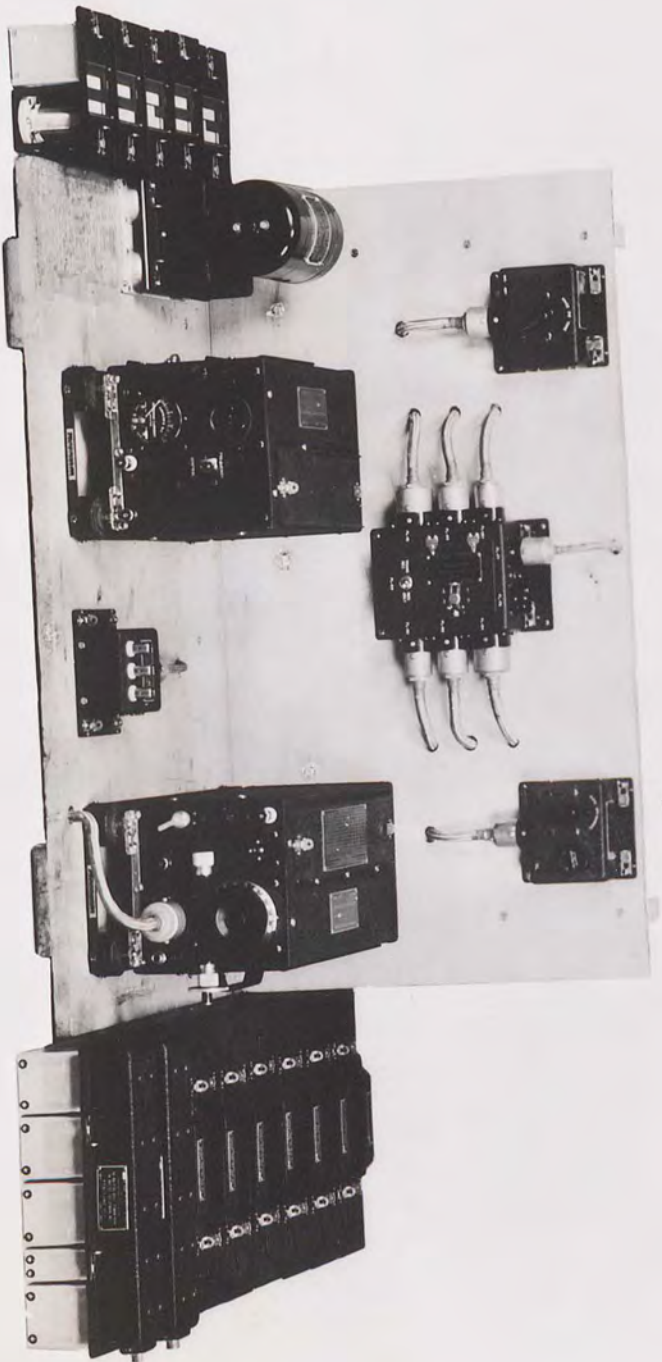
VOLUME:

1.5 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12-volt plane battery	12-volt plane battery
Frequency Range (KC)	2,500 - 7,700	200 - 400 2,500 - 7,700
Type of Signal	CW, Tone, Voice	Tone, Voice
Range (Miles)	CW - 45, Tone -	45, Voice - 30

Major Components: Radio Transmitter BC-()-230 Radio Receiver BC-()-229

Remarks: Widely used for command purposes. Is being partially replaced by SCR-274 as the latter becomes available. Similar to SCR-283 except for primary power supply.



RADIO SET SCR () 183
PRINCIPAL COMPONENTS

AIRCRAFT RADIO LABORATORY, WRIGHT FIELD.

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RADIO SET SCR-187-(1)

RADIO SET SCR-187-()

General Purpose: Medium range liaison set used in heavy bombers, medium bombers and transport aircraft.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-A, SCR-193-(), SCR-238-()

WEIGHT:

254.5 lbs.

VOLUME:

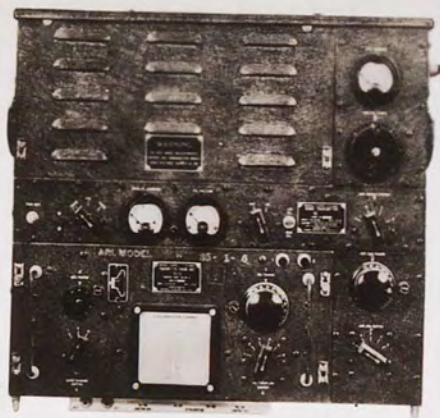
10.3 cu. ft.

Method of Transportation: Aircraft

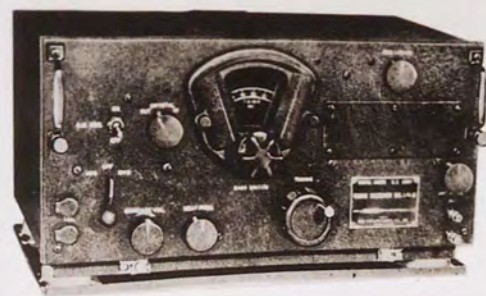
CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12-volt plane battery	12-volt plane battery
Frequency Range (KC)	400 - 12,500	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 750, Tone -	500, Voice - 250

Major Components: Radio Transmitter BC-191-() Dynamotor Unit PE-72-() or BD-77-()
Radio Receiver BC-224-()

Remarks: Similar to SCR-287 except for primary power supply.



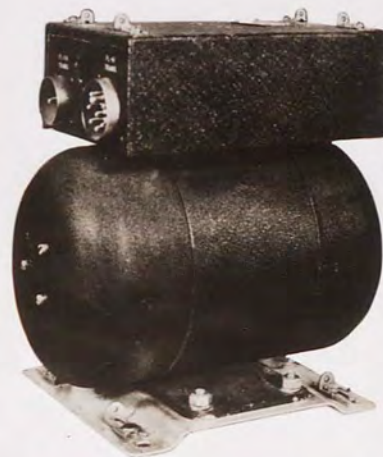
RADIO TRANSMITTER BC - 191 - A



RADIO RECEIVER BC - 224 - B



REEL RL - 80 - B



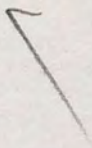
DYNAMOTOR UNIT BD - 77

RADIO SET SCR - 187 - A
PRINCIPAL COMPONENTS

AIRCRAFT RADIO LABORATORY, WRIGHT FIELD, OHIO

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RADIO SET SCR-188-A



RADIO SET SCR-188-A

General Purpose: For use where a medium power, medium range radio set is required for continuous operation, for ground to plane and point to point communication.

Using Service(s): Air Corps, Signal Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-(), SCR-197-(), SCR-238-A, SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283, SCR-287-()

Method of Transportation: Vehicle

WEIGHT: 1,150 lbs. VOLUME: 25 cu. ft.
--

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	gas-engine-generator 110-volt AC	gas-engine-generator 110-volt AC
Frequency Range (KC)	1,500 - 12,500	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 100, Tone -	70, Voice - 30

Major Components: Radio Transmitter BC-191-() Power Unit PE-75-A
 Radio Receiver BC-342-() Rectifier RA-34-A

Remarks: This set is basically similar to SCR-177-(), but differs in that the transmitter is provided with coils extending range from 4,500 to 12,500 KC for communication with medium and long range airplanes.

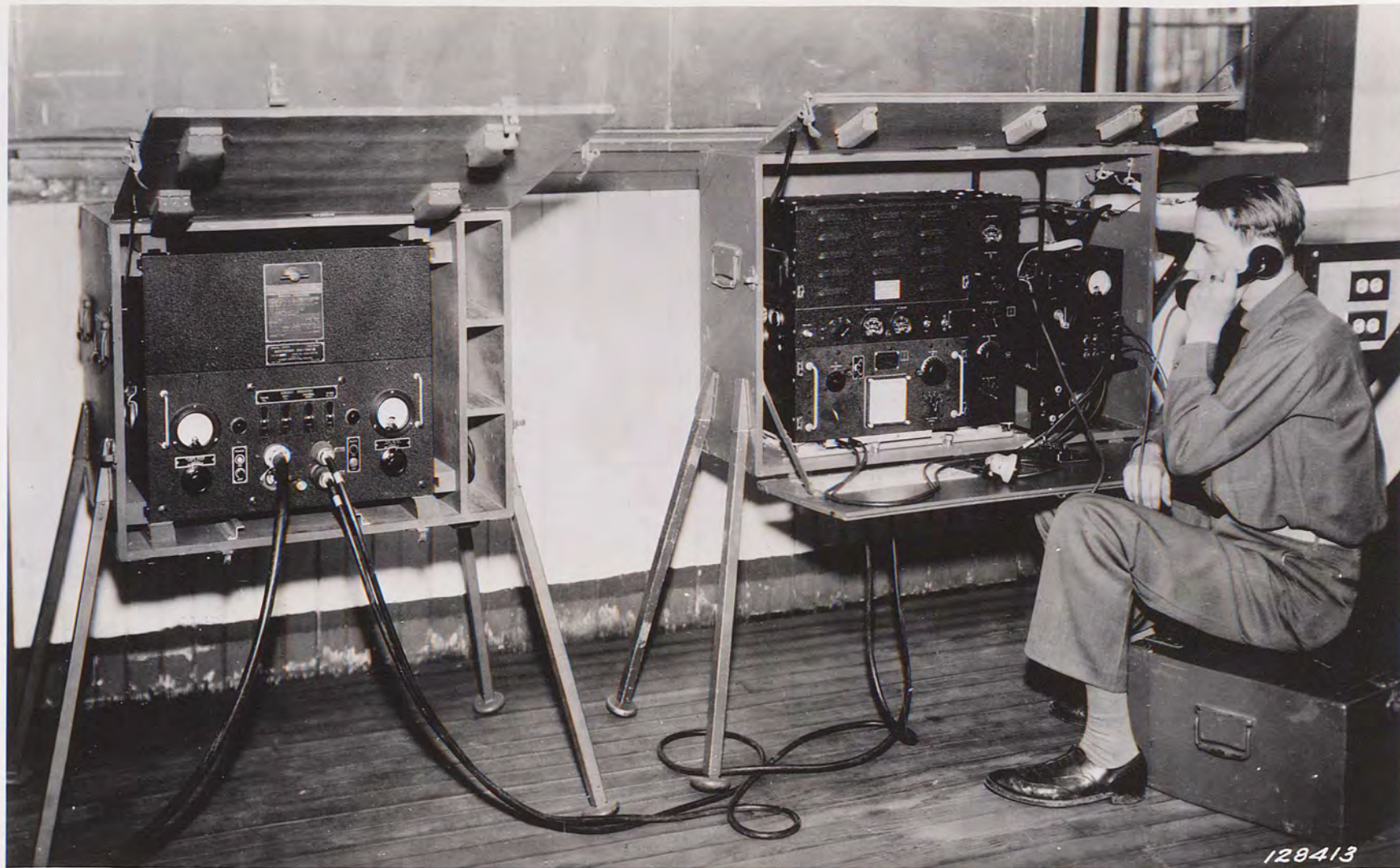


RADIO SET SCR-188-A
Showing Complete Receiver Position
On Table

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RADIO SET SCR-188-A
Showing Transmitter Setup in Action

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RADIO SET SCR-193-()



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RADIO SET SCR-194



RADIO SET SCR-194

General Purpose: Point to point voice communication within the Artillery Battalion. Known as "Walkie-Talkie".

Using Service(s): Field Artillery

Communicates with: SCR-194 (only)

WEIGHT:

26 lbs.

VOLUME:

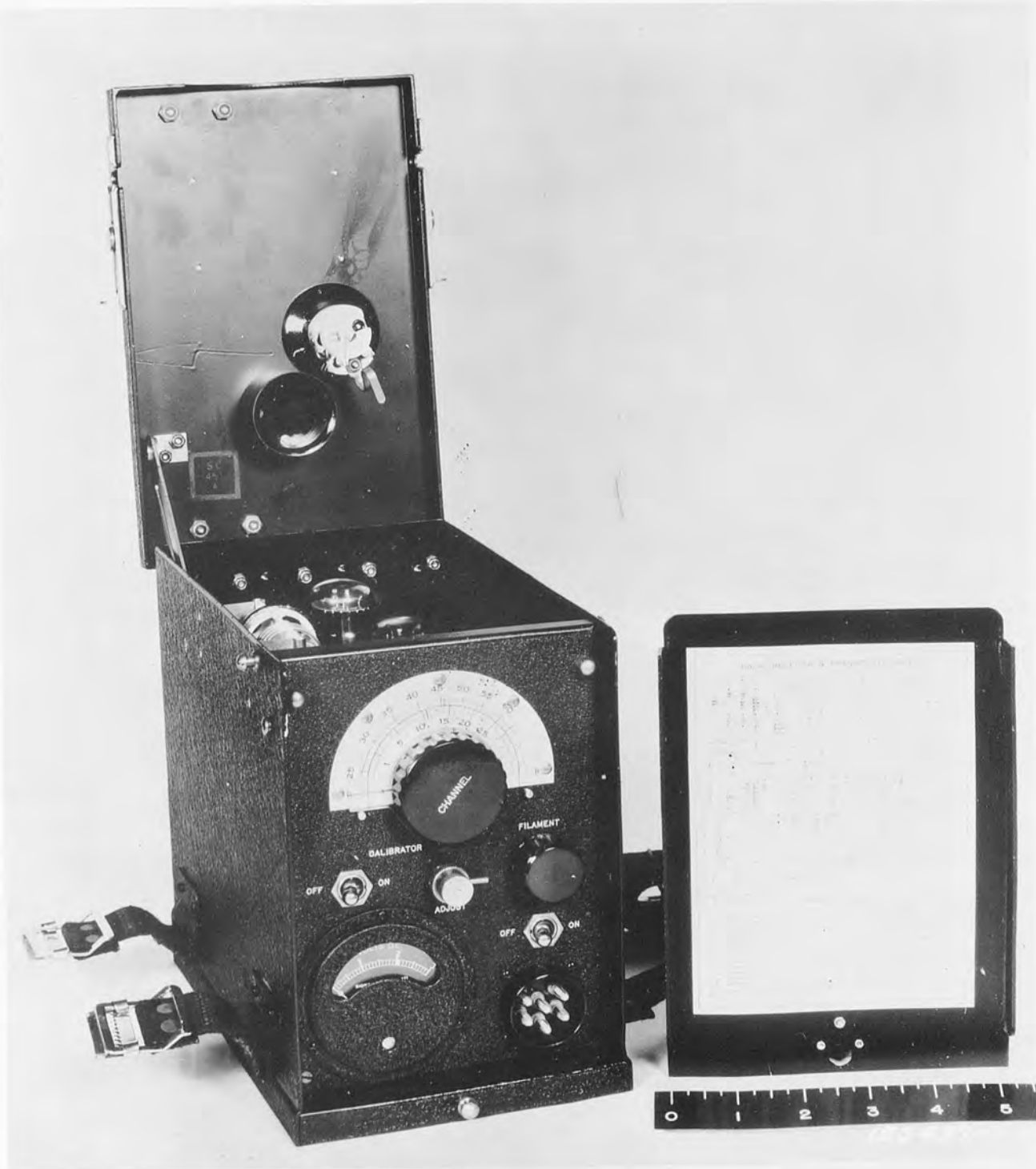
0.6 cu. ft.

Method of Transportation: Man-pack or in vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry batteries BA-32	dry batteries BA-32
Frequency Range (KC)	27,200 - 52,750	27,200 - 52,750
Type of Signal	Voice only	Voice only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-222

Remarks: Can be operated while being carried as a one-man pack or from a vehicle. When vehicular operation is desired, Antenna Equipment RC-67 is furnished. Has been partially replaced in Armored Force by SCR-509-() and SCR-510-(), and in Field Artillery by SCR-609 and SCR-610. May be replaced by SCR-300 under development.



RADIO SET SCR-194

Radio Transmitter and Receiver BC-222 . Front Panel View . Cover Open

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RADIO SET ✓ SCR-195

RADIO SET SCR-195

General Purpose: Point to point voice communication within the infantry regiment.
Known as the "Walkie-Talkie".

Using Service(s): Infantry

Communicates with: SCR-195 (only)

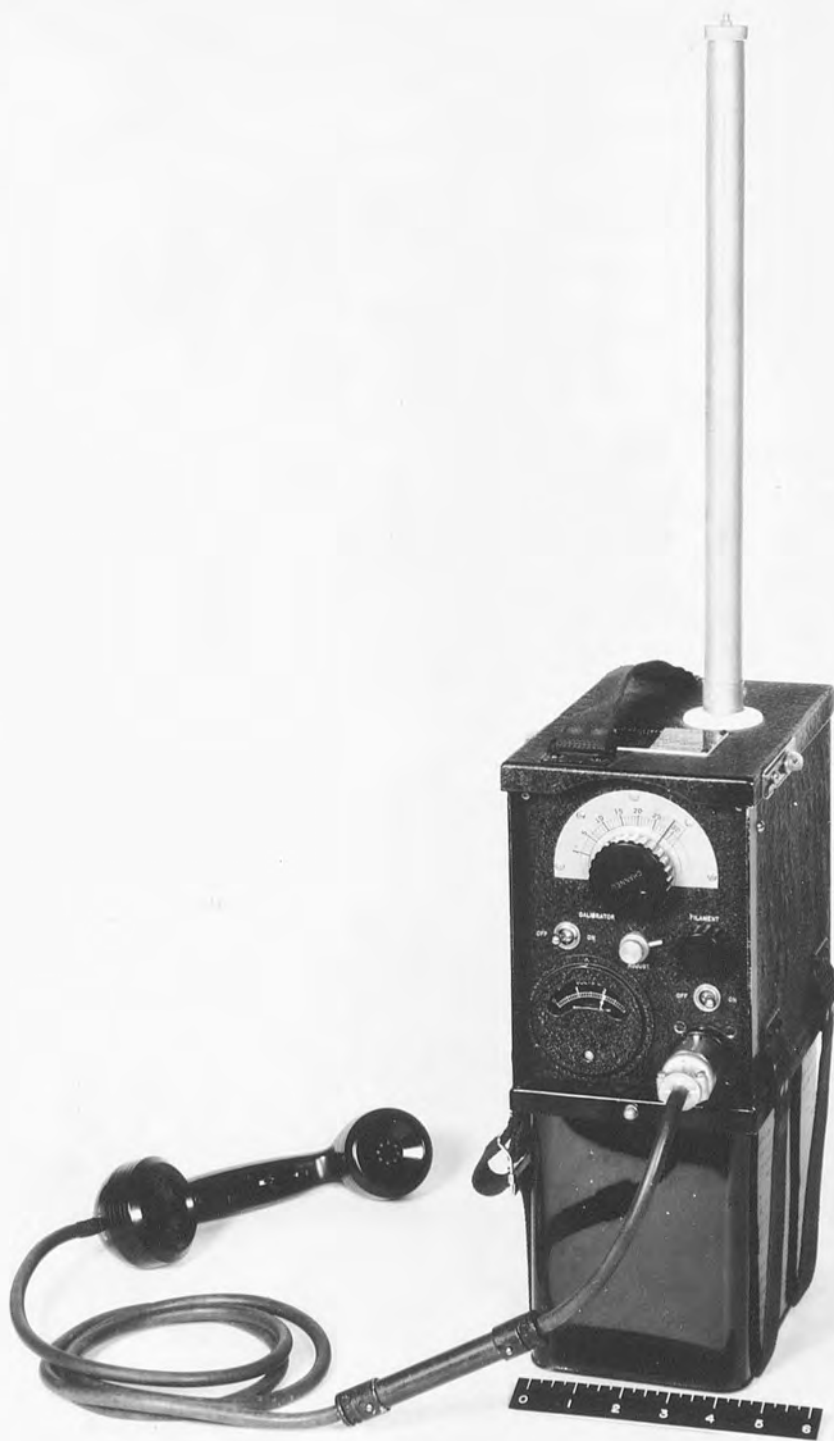
WEIGHT: 26 lbs.
VOLUME: 0.6 cu. ft.

Method of Transportation: Man-pack or in vehicle.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry batteries BA-32	dry batteries BA-32
Frequency Range (KC)	52,250 - 66,250	52,250 - 66,250
Type of Signal	Voice only	Voice only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-322

Remarks: Can be operated while being carried as a one-man pack or from a vehicle. The SCR-195 includes most sections and all apparatus necessary for vehicular operation. Normally only 2 sets can be operated in one net because of the peculiar double regenerative circuit used. Possible replacement set SCR-300 (Development).



RADIO SET SCR-195

Assembled View

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RADIO SET SCR-197-()

RADIO SET SCR-197-()

General Purpose: Used principally by Group and Wing units of the Air Corps for long range ground to plane liaison communication.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-238-A, SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283

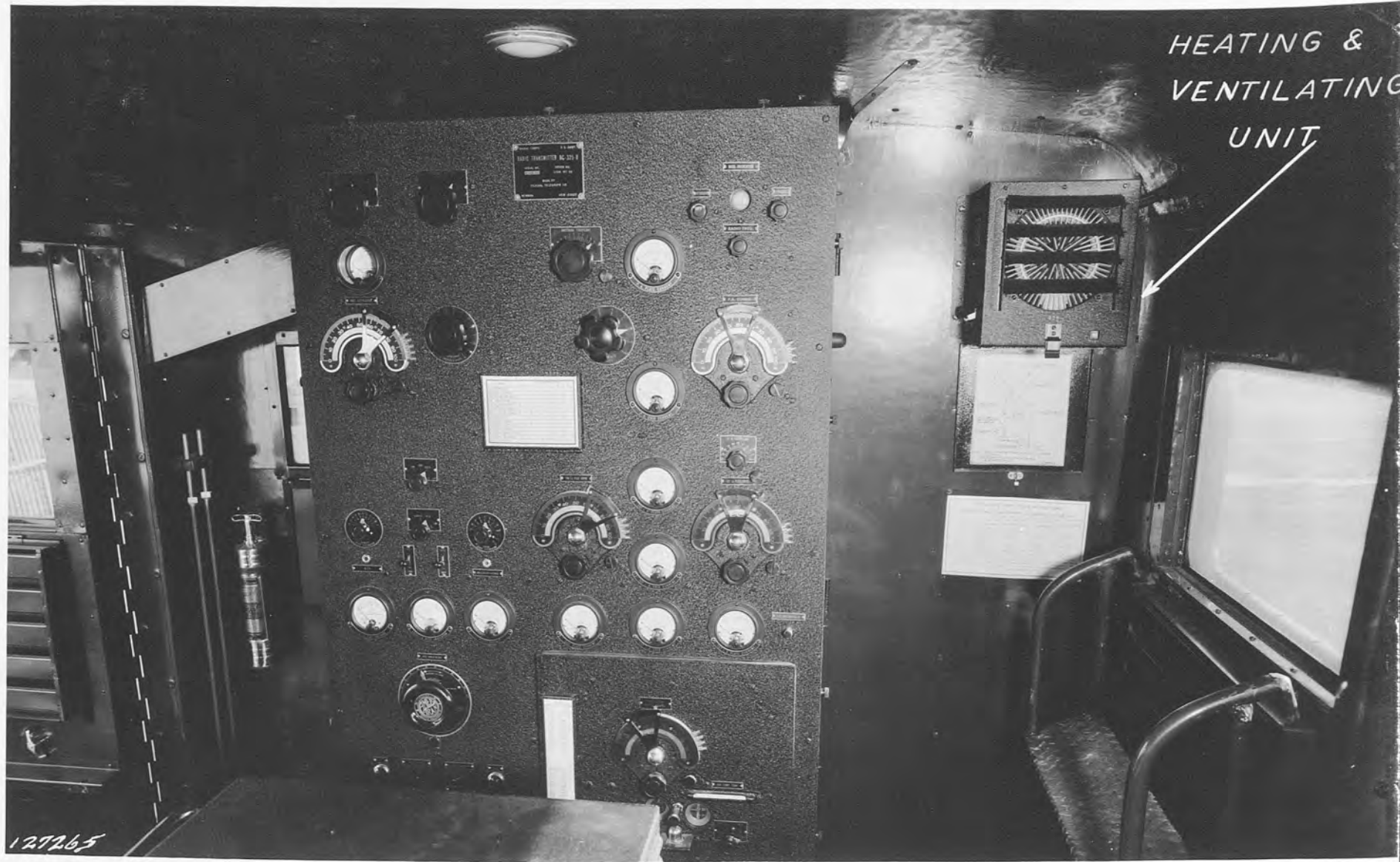
Method of Transportation: Truck and Trailer

WEIGHT: 15,000 lbs. VOLUME: 1,947 cu. ft.
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CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	110-volt AC gas-engine-generator	110-volt AC gas-engine-generator
Frequency Range (KC)	1,500 - 18,000	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 750, Tone - 500,	Voice - 250

Major Components: Radio Transmitter BC-325-() Trailer K-19-()
Radio Receiver BC-342-() (3 each) Power Unit PE-75-()
Truck K-18-()

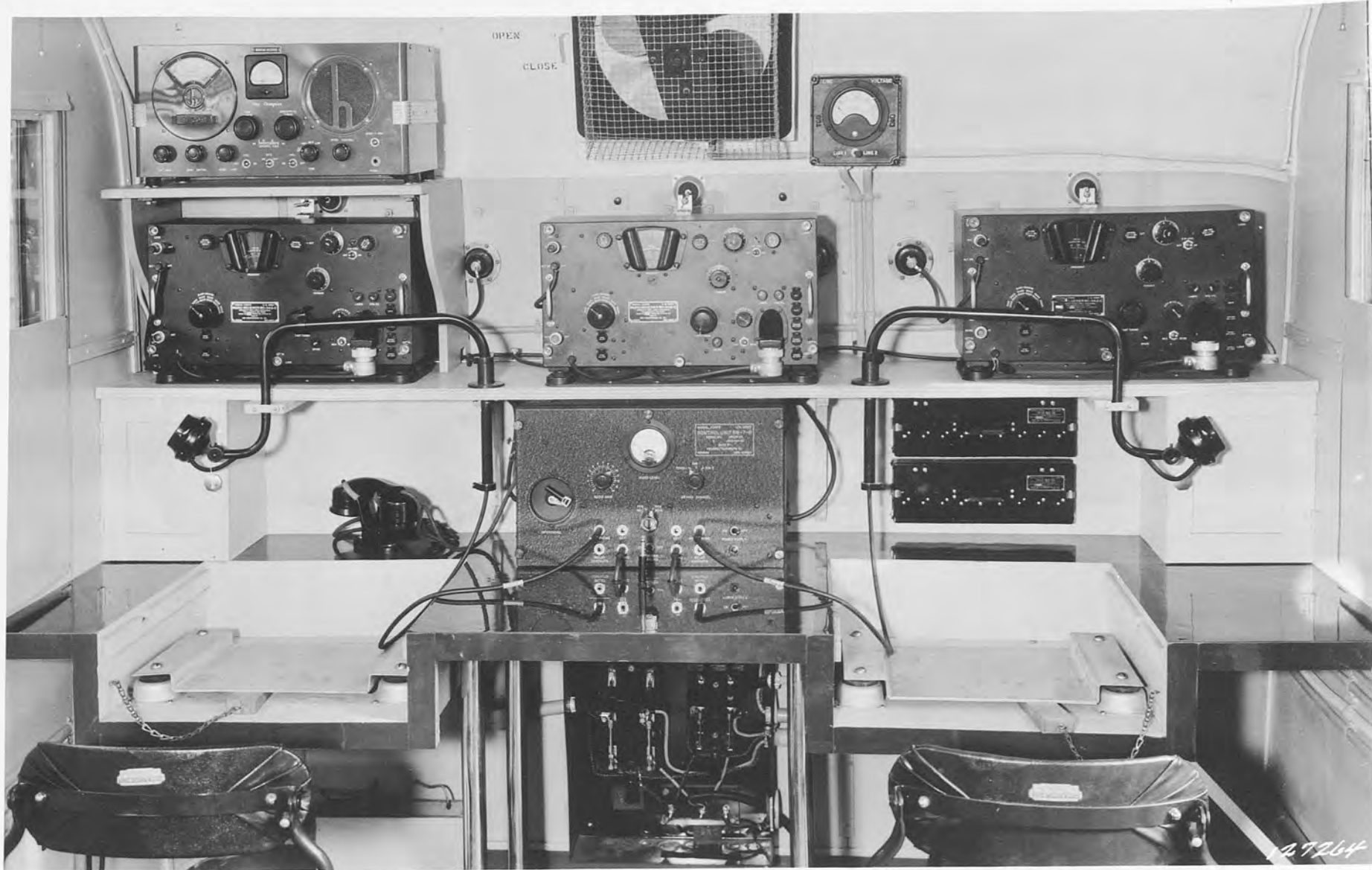
Remarks: Carried in the trailer but not included as components of this set are two teletypewriters, typewriter, switchboard, and complete message center equipment. This unit is designed to operate as a limited communication center.



RADIO SET SCR-197-()

Front Wall of Main Compartment . Showing Radio Transmitter BC-325-()

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RADIO SET SCR-197-()

Trailer K-19-() . Interior View of Front Wall Showing Operating Positions

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RADIO SET SCR-203



RADIO SET SCR-203

General Purpose: Command purposes in Horse Cavalry and Field Artillery units. For communication between Brigade and Regiments and Regiments and Squadrons. Also used for communication with observation aircraft.

Using Service(s): Cavalry, Field Artillery, Signal Corps

Communicates with: SCR-187-(), SCR-193-(), SCR-203, SCR-209-(), SCR-210-(), SCR-238-(), SCR-245-()

WEIGHT:
160 lbs.
VOLUME:
10 cu. ft.

Method of Transportation: Horse-pack or carried in vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	dry batteries
Frequency Range (KC)	2,200 - 3,060	2,200 - 3,060
Type of Signal	CW, Tone, Voice	All
Range (Miles)	Fixed: CW = 30 Tone = 20 Voice = 5 Moving: CW = 10 Tone = 6 Voice = 3	

Major Components: Radio Transmitter BC-228 Generator GN-35
Radio Receiver BC-227 Frame FM-18

Remarks: Has been partially replaced by SCR-245 in mechanized elements of Cavalry. Can be operated from back of pack animal while in motion or removed and operated on the ground. Project for a replacement of this set with more satisfactory equipment is now under way.



-39-33-A

SIGNAL CORPS LABORATORIES, FORT MONMOUTH, N. J.

RADIO SET SCR-203
PRODUCTION MODEL, UNPACKED
LESS COVER AND FRAME

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RADIO SET SCR-206-(1)

RADIO SET SCR-206-()

General Purpose: Radio direction finder used by Radio Intelligence Companies (generally Army Troops) to locate enemy radio transmitting stations.

Using Service(s): Signal Corps

Communicates with: Receiver only

Method of Transportation: Vehicle

WEIGHT:
350 lbs.

VOLUME:

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	storage battery
Frequency Range (KC)	None	200 - 18,000 (in 8 bands)
Type of Signal	None	All
Range (Miles)		

Major Components: Radio set SCR-206-()

Remarks: Set has been found to be inefficient on the upper 1/3 of its band. Temporary replacement is now being used (SCR-255) until a more suitable replacement is developed. This set replaced SCR-172, SCR-173, and SCR-174.

RADIO SET SCR-210-()



RADIO SET SCR-210-()

General Purpose: Designed for installation in vehicles to provide inter-vehicular communication whether vehicles are stationary or in motion.

Using Service(s): Armored Force

Communicates with: Receiver only, operates with SCR-193-(), SCR-245-()

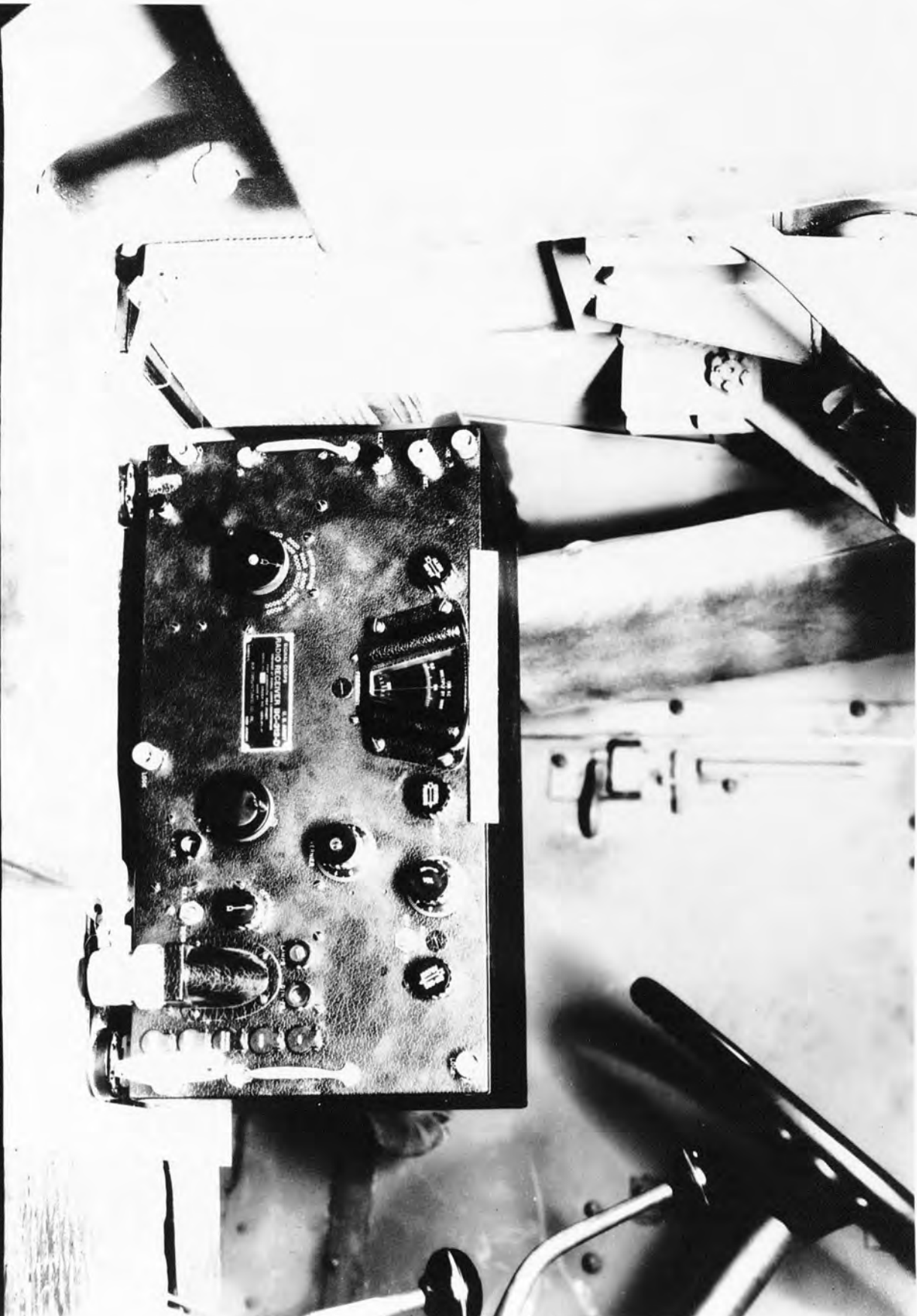
Method of Transportation: Vehicle

WEIGHT: 85 lbs.
VOLUME: 2 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	12-volt vehicular battery
Frequency Range (KC)	None	1,500 - 18,000
Type of Signal	None	All
Range (Miles)		

Major Components: Radio Receiver BC-312-()

Remarks: This set is a receiver only and was designed primarily to receive signals from the SCR-193-() and SCR-245-(), which are vehicular sets. Several modifications are available. Vehicles of the Armored Force are being equipped with SCR-538-(), as replacement for the SCR-210-().



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8-4-41

ABERDEEN PROVING GROUND

ORDNANCE DEPT.

Mock-up Installation of Radio Set SCR-210 in 75 mm Gun Motor Carriage T-12.

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RADIO SET SCR-238-A

RADIO SET SCR-238-A

General Purpose: Short Range Liaison Set used in Corps and Division Observation Aircraft and to a limited extent in light bombers.

Using Service(s): Air Corps

Communicates with: SCR-177-A, SCR-178, SCR-187-(), SCR-188-A, SCR-193-(), SCR-203, SCR-238-A, SCR-245-()

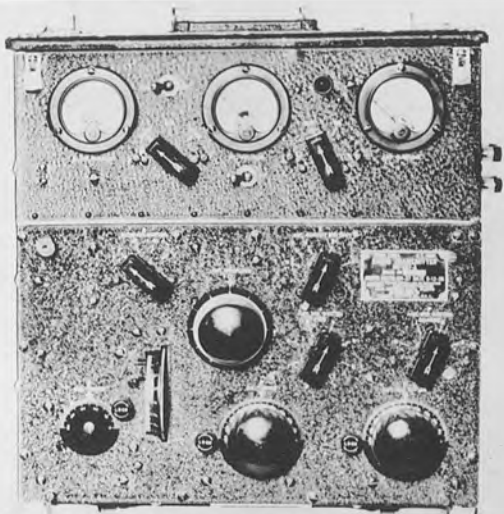
Method of Transportation: Aircraft

WEIGHT:
100 lbs.
VOLUME:
2.5 cu. ft.

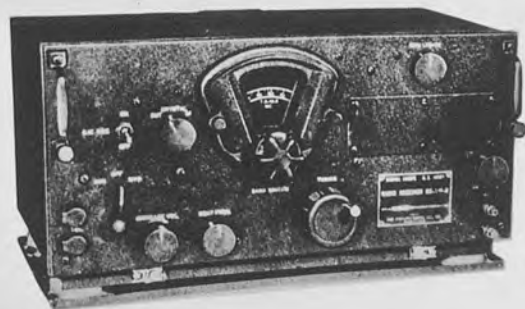
CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12-volt plane battery	12-volt plane battery
Frequency Range (KC)	1,500 - 8,100	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 400, Tone -	200, Voice - 100

Major Components: Radio Transmitter BC-307-() Dynamotor Unit BD-86-()
Radio Receiver BC-224-()

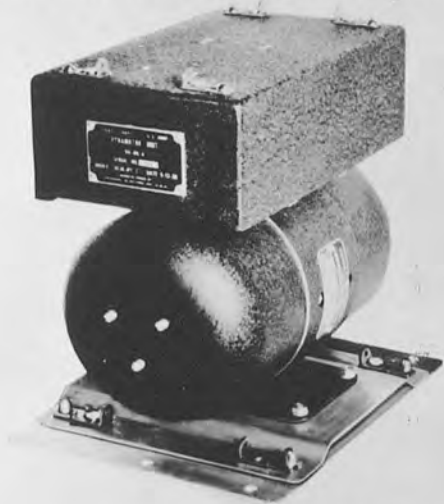
Remarks: Similar to SCR-260-A except that latter set operates from 24-volt power supply.



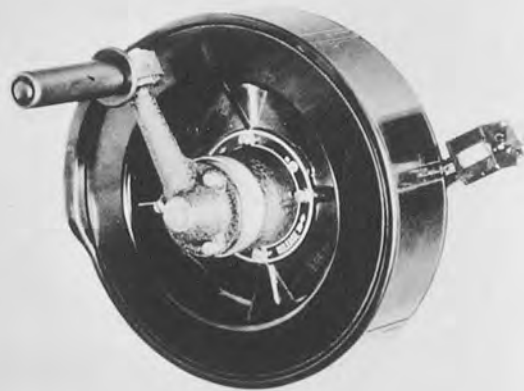
RADIO TRANSMITTER BC-307-A



RADIO RECEIVER BC-224-A



DYNAMOTOR UNIT BD-86-A



REEL RL-30-B



RADIO CONTROL BOX BC-308-A

RADIO SET SCR-238
PRINCIPAL COMPONENTS

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RADIO SET SCR-240-A

RADIO SET SCR-240-A

General Purpose: Command set for short range air to ground or intercommunication between planes in flight. Used in some heavy and light bombers and in a few observation and transport aircraft.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-A, SCR-197-(), SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283

Method of Transportation: Aircraft

WEIGHT:
141 lbs.
VOLUME:
3.13 cu. ft.

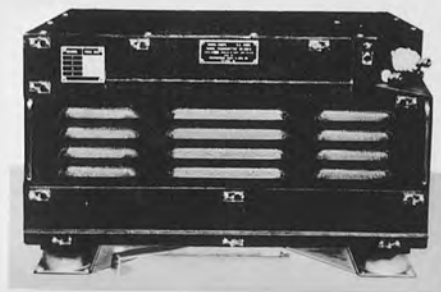
CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12-volt plane battery	12-volt plane battery
Frequency Range (KC)	3,000 - 8,000	200 - 400 500 - 1,500 2,500 - 8,000
Type of Signal	CW, Voice	All
Range (Miles)	low frequency CW - 100 high frequency CW - 250	Voice - 50 Voice - 100

Major Components: Radio Transmitter BC-338-() Dynamotor Unit PE-59-()
Radio Receiver BC-225-()

Remarks: This set differs from SCR-()-183 in that 4 preset channels are provided in transmitter and 3 in receiver. Tuning is not continuous.



RADIO RECEIVER BC - 225 - A



RADIO TRANSMITTER BC - 338 - A



LOOP LP - 16 - A



MOUNTING PT - 179 - A (TRANSMITTER)



CONTROL BOX BC - 226 - A



MOUNTING PT - 180 - A (RECEIVER)



DYNAMOTOR UNIT PE - 59 - A

RADIO SET SCR - 240 - A

PRINCIPAL COMPONENTS

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RADIO SET ✓
SCR-243

RADIO SET SCR-243

General Purpose: Used by Radio Intelligence units for intercept work on low frequencies.

Using Service(s): Signal Corps (Radio Intelligence Company)

Communicates with: Receiver only

Method of Transportation: Vehicle

WEIGHT:
100 lbs.

VOLUME:
2 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	110-volt AC
Frequency Range (KC)	None	100 - 1,000
Type of Signal	None	All
Range (Miles)		

Major Components: Radio Receiver BC-197-()

Remarks: This set, which is a receiver only, operates from a power source of 110-volts AC. Where AC power lines are not available, Power Unit PE-52 or a similar power source may be employed.



RADIO SET SCR-243
Radio Receiver BC-197-C . Top 3/4 View

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RADIO SET SCR-244-A



RADIO SET SCR-244-A

General Purpose: Used by Radio Intelligence units for intercept work on higher frequencies.

Using Service(s): Signal Corps (Radio Intelligence Company)

Communicates with: Receiver only

Method of Transportation: Vehicle

WEIGHT: 100 lbs.
VOLUME: 2 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	110-volt AC
Frequency Range (KC)	None	540 - 20,000
Type of Signal	None	All
Range (Miles)		

Major Components: Commercial Receiver - Hammarlund Super-Pro (SP-200-x)

Remarks: Receiver only. Operates from 110-volt AC power source. In the field, where power lines are not available, this set can be operated with power unit PE-52 or a similar power source.



129154

RADIO SET SCR-244-A (Manufacturer's Model)

Components . Front View

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RADIO SET SCR-245-()

RADIO SET SCR-245-()

General Purpose: This is the most widely used, medium range, mobile radio set in the Army. Used by the Armored Force in command tanks and by antitank units of the Infantry and Field Artillery. Also in reconnaissance nets of the Cavalry.

Using Service(s): Armored Force, Infantry, Field Artillery, Cavalry

Communicates with: SCR-131, SCR-171, SCR-177-(), SCR-187-(), SCR-193-(),
SCR-203, SCR-210-(), SCR-245-(), SCR-288

Method of Transportation: Vehicle

WEIGHT:

140 lbs.

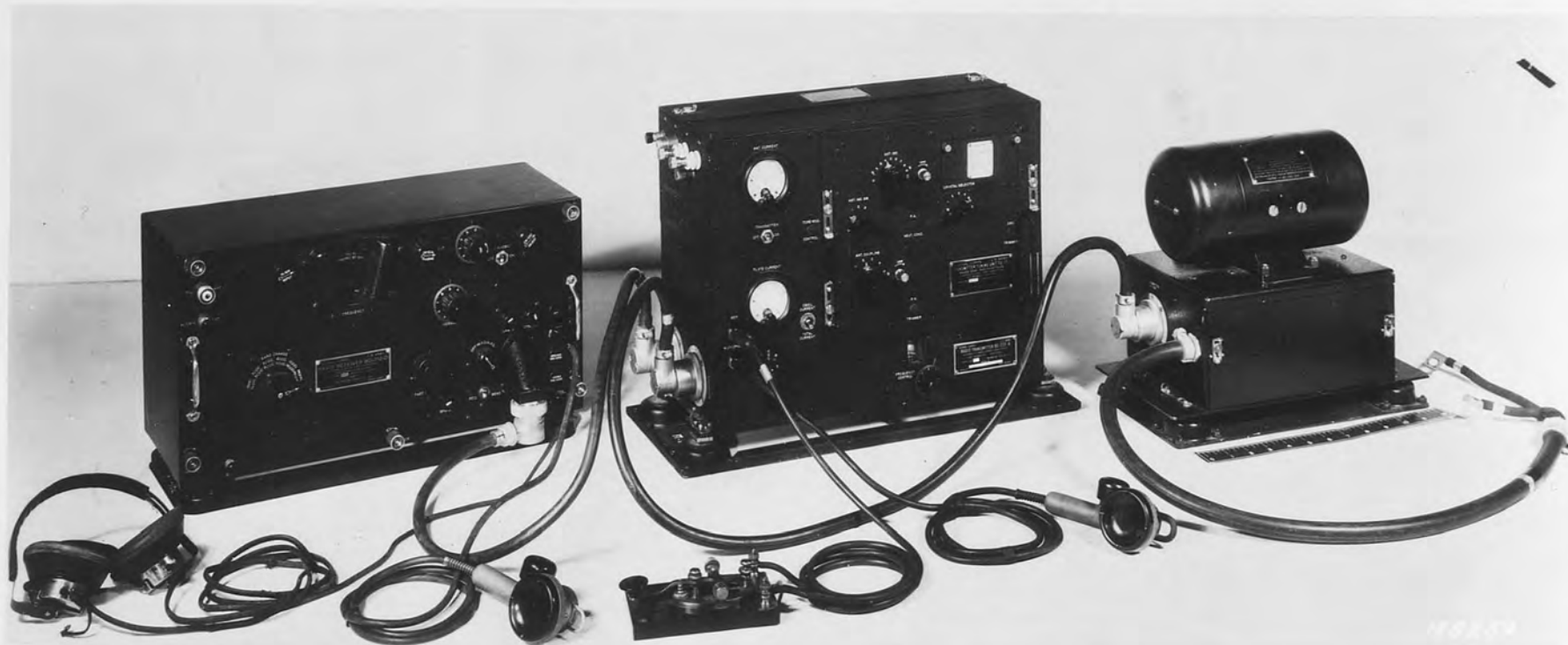
VOLUME:

4 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12-volt battery	12-volt battery
Frequency Range (KC)	2,000 - 4,500	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 45, Tone -	35, Voice - 20

Major Components: Radio Transmitter BC-223 or BC-223-A Dynamotor Unit PE-55
Radio Receiver BC-312-()

Remarks: Several modifications are available for installation in various types of vehicles. This set is to be replaced in the Armored Force by the new SCR-506, SCR-508-(), SCR-528-().



RADIO SET SCR-245-()

Assembled

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NO. SCL- 2437

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RADIO COMPASS SCR-246-A ✓

RADIO COMPASS SCR-246-A

General Purpose: Functions as a homing device or as a radio range and weather broadcast receiver.

Using Service(s): Air Corps

Communicates with: None

Method of Transportation: Aircraft

WEIGHT:

38.5 lbs.

VOLUME:

15-5/8" x 8"
x 8"

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	12-volt storage battery
Frequency Range (KC)	None	195 - 410 KC
Type of Signal	None	Tone and Voice
Range (Miles)		

Major Components: Loop LP-17-A Radio Compass Unit BC-373-A
Radio Control Box BC-374-A

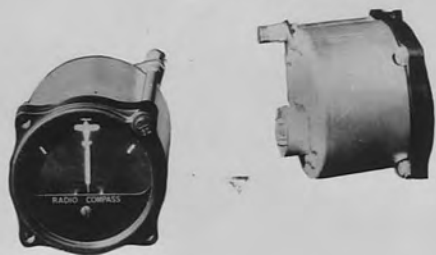
Remarks: Used in single engine aircraft.



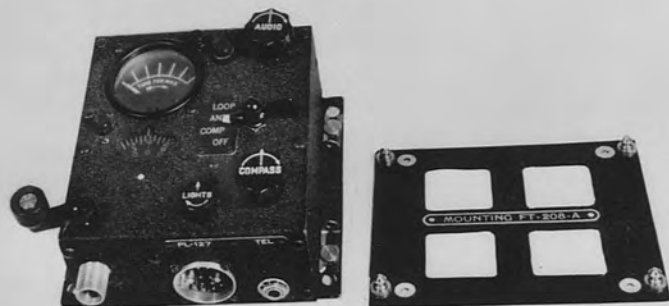
SET BOX BC - 373 - A



LOOP LP - 17 - A



INDICATOR I - 73 - A



CONTROL BOX BC - 374 - A

RADIO COMPASS SCR - 246

PRINCIPAL COMPONENTS

AIRCRAFT RADIO LABORATORY, WRIGHT FIELD, OHIO

189396

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RADIO SET SCR-261-A



RADIO SET SCR-261-A

General Purpose: Command set for short range air to ground or intercommunication between planes in flight. Used in some heavy bombers and in a few pursuit fighters.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-A, SCR-197-(), SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283, SCR-287-()

Method of Transportation: Airplanes

WEIGHT:

141 lbs.

VOLUME:

3.13 cu. ft.

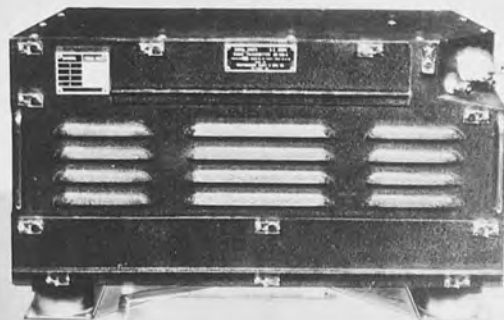
CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	24-volt plane battery	24-volt plane battery
Frequency Range (KC)	3,000 - 8,000	200 - 400 550 - 1,500 2,500 - 8,000
Type of Signal	CW - Voice	All
Range (Miles)	low frequency CW-100 high frequency CW-250	Voice - 50 Voice -100

Major Components: Radio Transmitter BC-353-A Dynamotor Unit PE-62-A
Radio Receiver BC-352-A

Remarks: Differs from SCR-()-283 in that 4 preset channels are provided in transmitter and 3 in receiver. Tuning is not continuous.



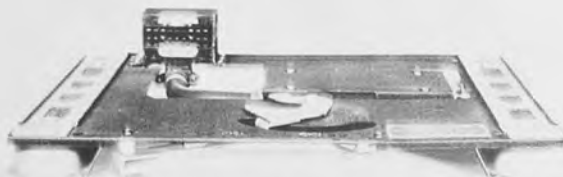
RADIO RECEIVER BC-352-A



RADIO TRANSMITTER BC-353-A



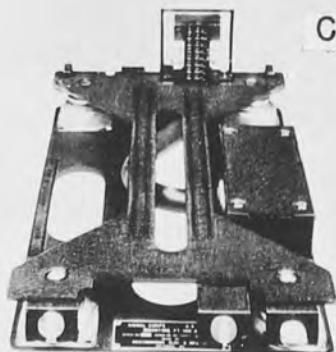
LOOP LP-16-A



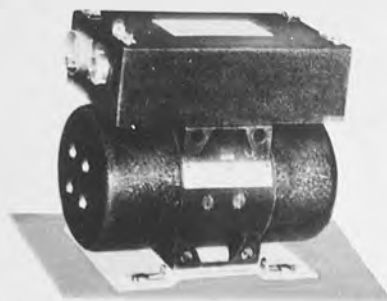
MOUNTING FT-179-A TRANSMITTER



CONTROL BOX BC-351-A



MOUNTING FT-180-A RECEIVER



DYNAMOTOR UNIT PE-62-A

RADIO SET SCR-261-A- PRINCIPAL COMPONENTS

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RADIO COMPASS SCR-263-A

RADIO COMPASS SCR-263-A

General Purpose: Functions as homing device and provides reception of modulated frequency energy. Two remote control positions are provided.

Using Service(s): Air Corps

Communicates with: None

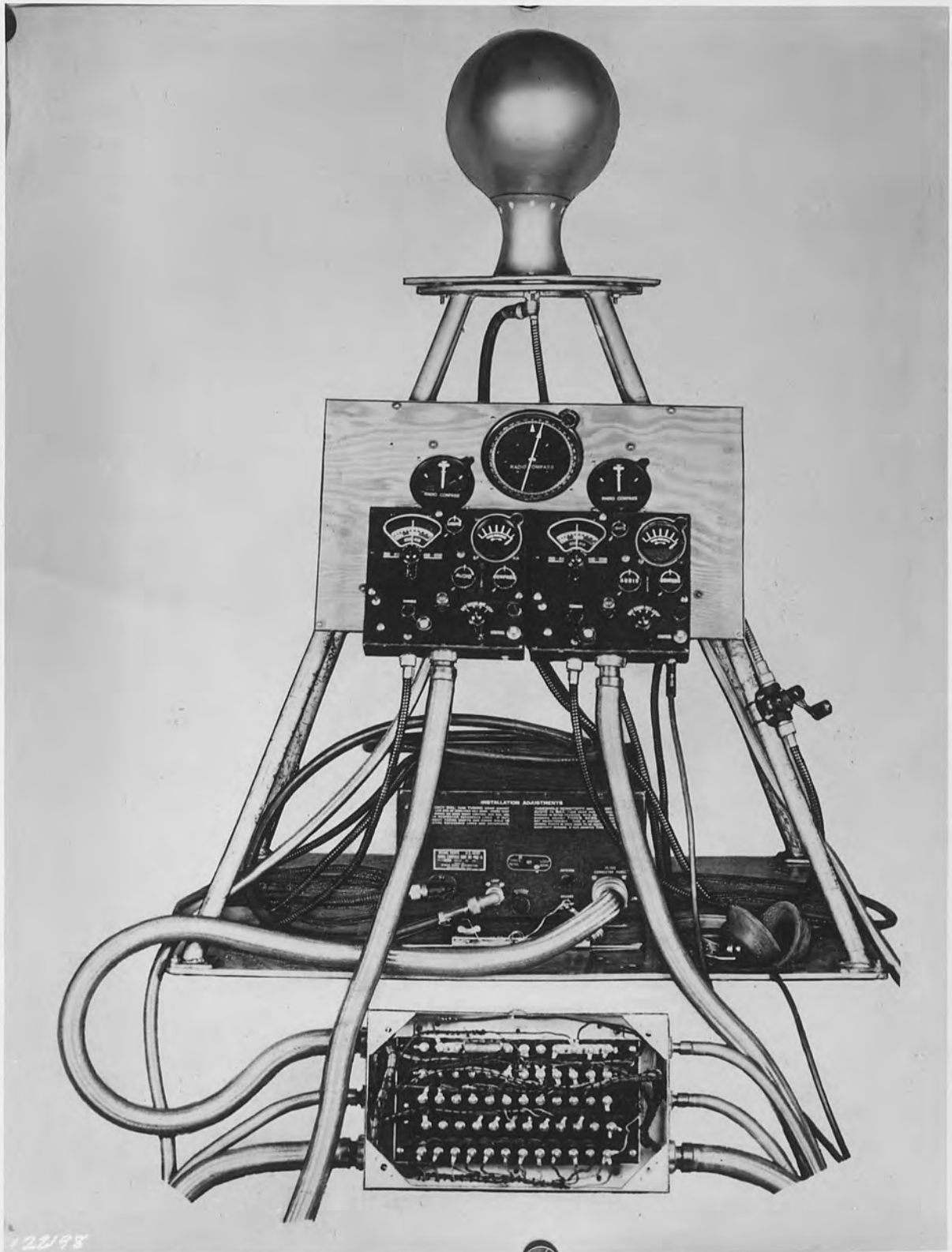
Method of Transportation: Aircraft

WEIGHT: 72.0 lbs. VOLUME: 19-13/16" x 12" x 7-7/8"
--

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	storage battery 24-volt
Frequency Range (KC)	None	200 - 1,750
Type of Signal	None	Tone and Voice
Range (Miles)		

Major Components: Radio Compass Unit BC-443-A
 Loop LP-19-A
 Radio Control Box BC-444-A

Remarks: Similar to SCR-280-A except for primary power requirements.



122198

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RADIO COMPASS SCR-269-()



RADIO COMPASS SCR-269-()

General Purpose: Used in large aircraft to give continuous bearing on any radio station to which the compass is tuned throughout 360°. Controlled from one or two remote positions.

Using Service(s): Air Corps

Communicates with: None

Method of Transportation: Aircraft

WEIGHT:

78.1 lbs

VOLUME:

19-13/16" x 12"
x 7-7/8"

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	115-volt 400 cycle AC plus 12 or 24-volt AC
Frequency Range (KC)	None	200 - 1,750
Type of Signal	None	Tone and Voice
Range (Miles)		

Major Components: Radio Compass Unit BC-433-() Loop LP-21-()
Radio Control Box BC-434-()

Remarks: Supersedes Radio Compass SCR-242-(), SCR-263-A and SCR-280-A.

CONTROL BOX
BC - 434 - A

LOOP LP - 21 - A

COMPASS UNIT
BC - 434 - A

RADIO COMPASS SCR - 269
PRINCIPAL COMPONENTS

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RADIO COMPASS SCR-273-A

RADIO COMPASS SCR-273-A

General Purpose: Functions as homing device and provides reception of modulated frequency energy. Two remote control positions are provided.

Using Service(s): Air Corps

Communicates with: None

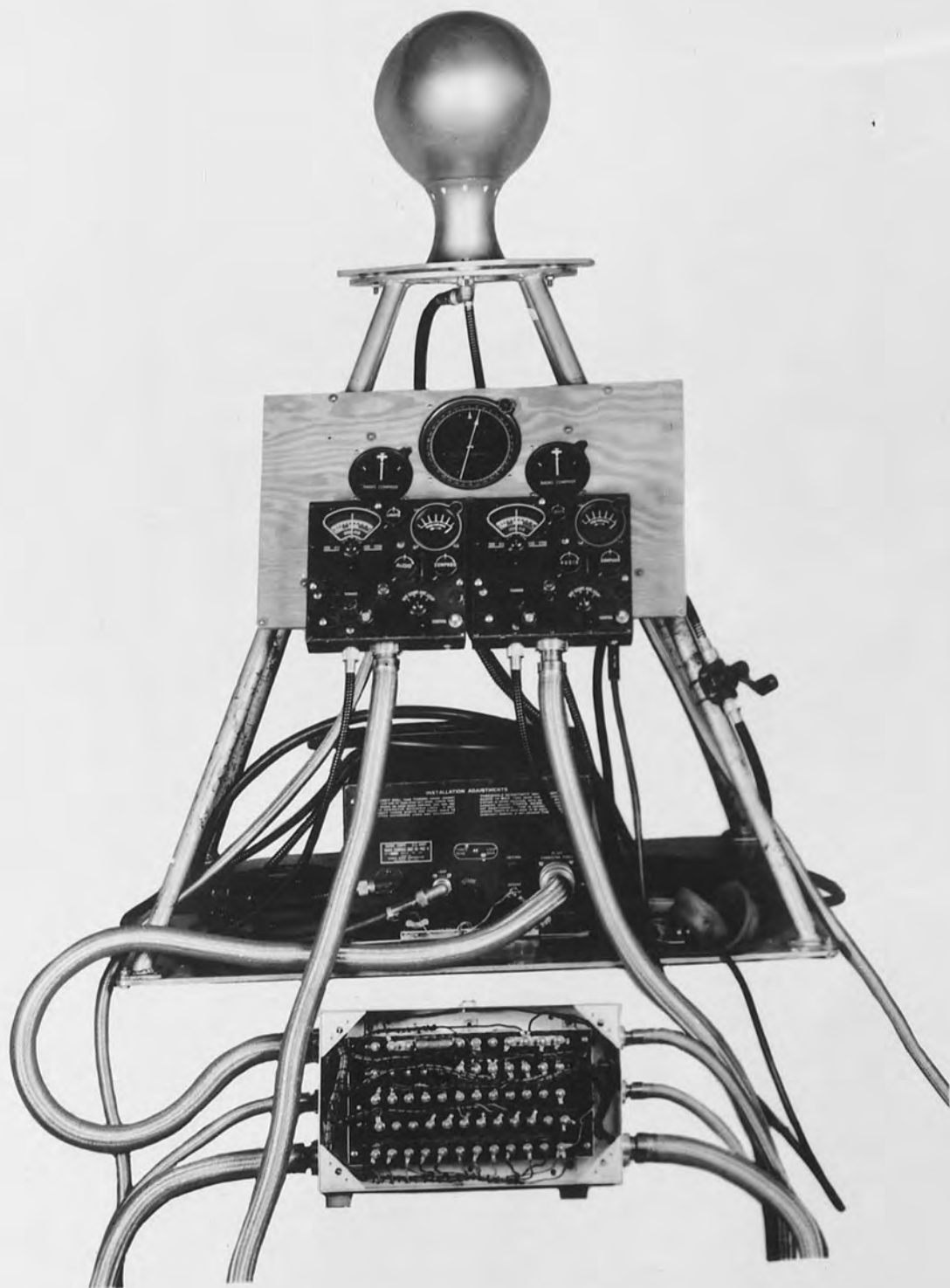
Method of Transportation: Aircraft

WEIGHT: 72 lbs. VOLUME: 19-13/16" x 12" x 7-7/8"
--

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	storage battery 12 to 14-volt
Frequency Range (KC)	None	150 - 1,500
Type of Signal	None	Tone and Voice
Range (Miles)		

Major Components: Radio Compass Unit BC-413-A
 Loop LP-19-A
 Radio Control Box BC-414-A

Remarks: Similar to SCR-280-A except 150 - 1500 KC range.



RADIO COMPASS SCR - 273
PRINCIPAL COMPONENTS

AIRCRAFT RADIO LABORATORY, WRIGHT FIELD, OHIO

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RADIO SET SCR-274-N



RADIO SET SCR-274-N

General Purpose: Command set used in all airplanes (except primary trainer) for intercommunication between planes and short range work air to ground.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-188-(), SCR-197-(), SCR-240-A,
SCR-261-A, SCR-274-N, SCR-()-283

Method of Transportation: Aircraft

WEIGHT:

86.6 lbs.

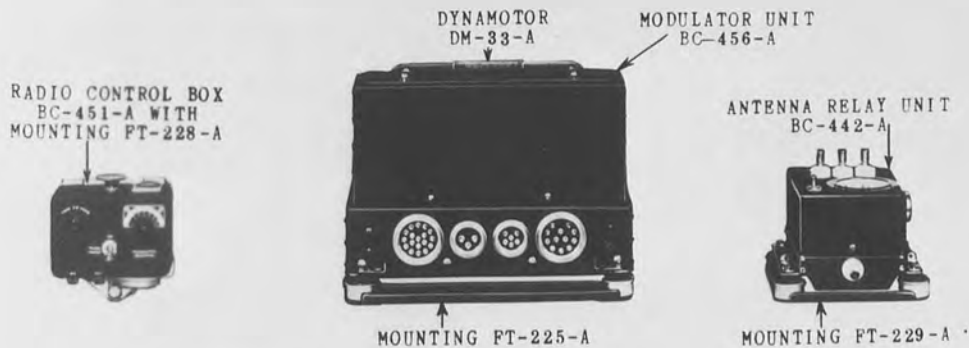
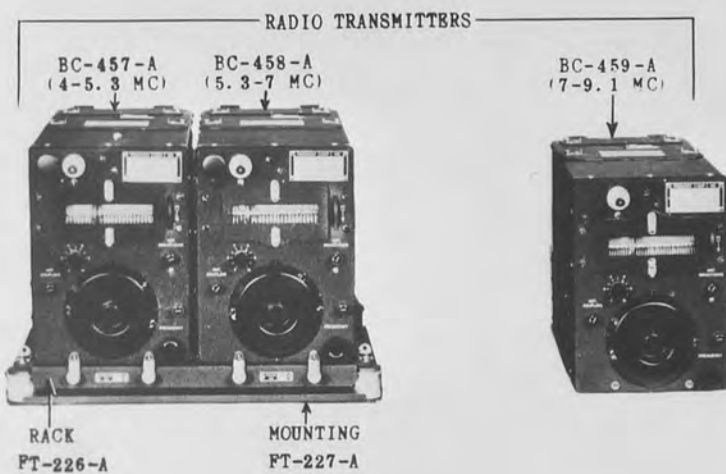
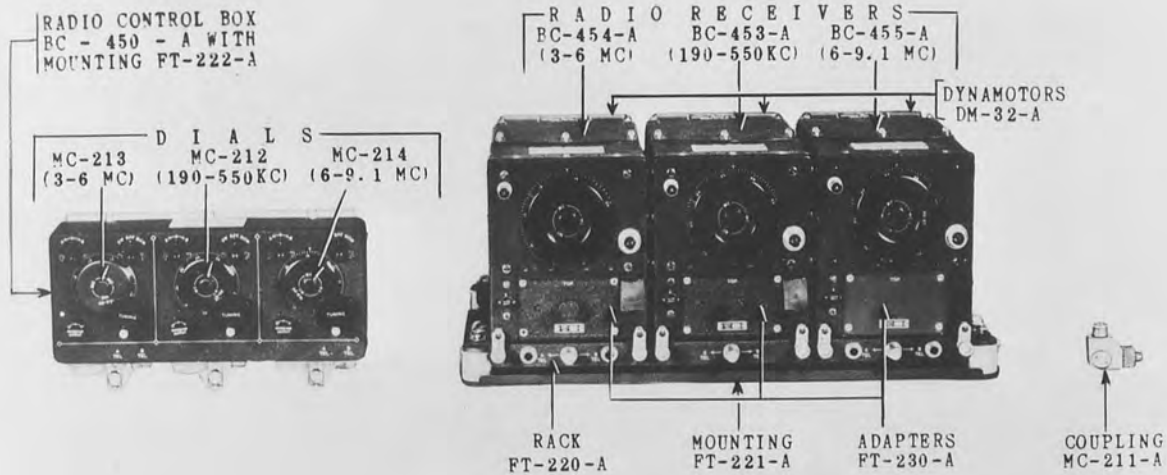
VOLUME:

2.2 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12 or 24-volt plane battery	12 or 24-volt plane battery
Frequency Range (KC)	4,000 - 5,300 5,300 - 7,000 7,000 - 9,100	190 - 550 3,000 - 6,000 6,000 - 9,100
Type of Signal	CW, Tone, Voice	CW, Tone, Voice
Range (Miles)	CW - 150, Tone -	150, Voice - 75

Major Components: Radio Transmitter BC-457-A Radio Receiver BC-453-A
Radio Transmitter BC-458-A Radio Receiver BC-454-A
Radio Transmitter BC-459-A Radio Receiver BC-455-A

Remarks: Replacing SCR-()-183, SCR-()-283 and may replace all other command sets.
Each frequency band listed is covered by a different set box.



RADIO SET SCR - 274 - N
PRINCIPAL COMPONENTS

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RADIO SET SCR-277-A



RADIO SET SCR-277-A

General Purpose: Radio Range, Mobile. Homing device for interceptor aircraft which have no radio compass for this purpose.

Using Service(s): Air Corps

Communicates with: None

WEIGHT:

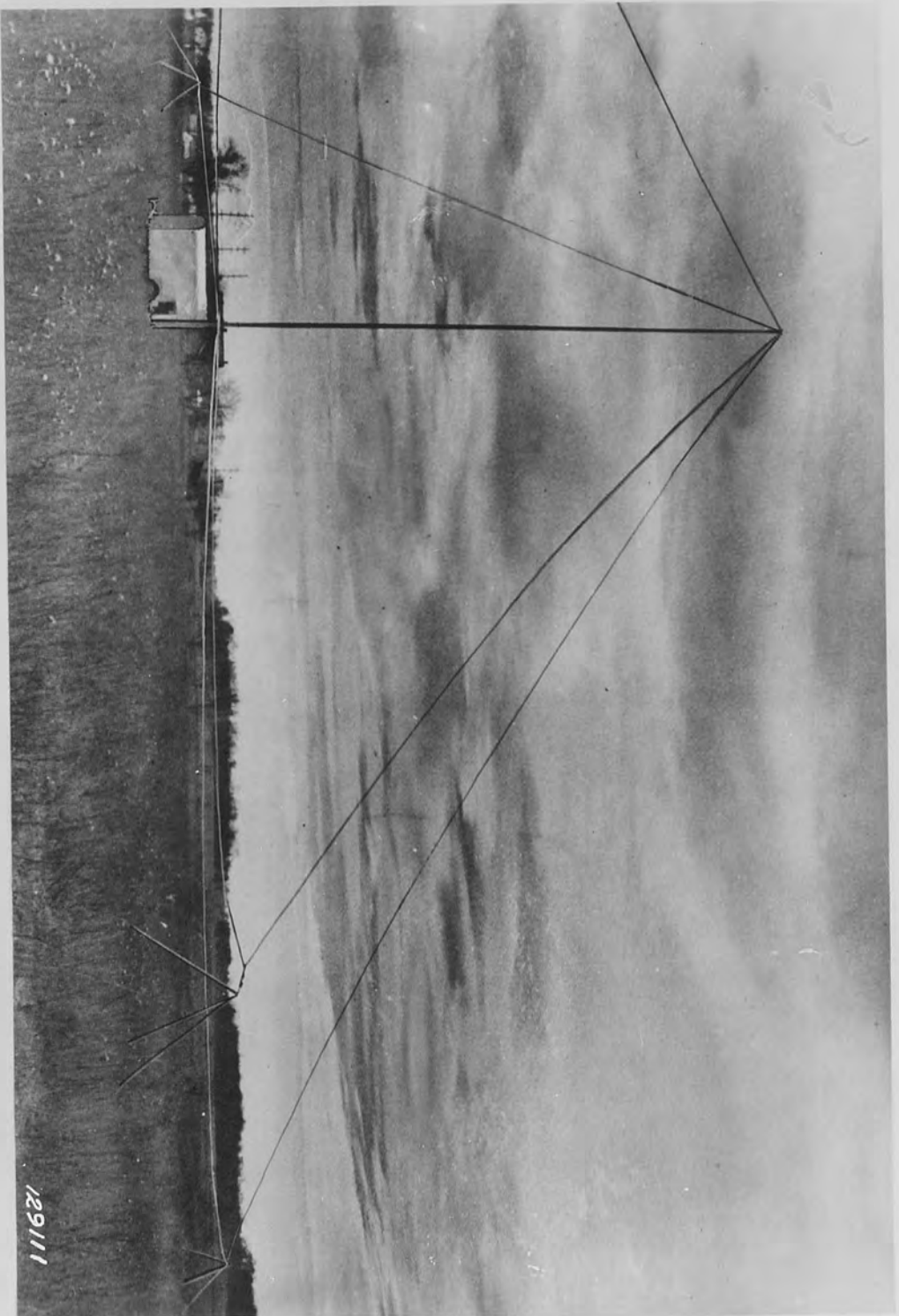
VOLUME:

Method of Transportation: Trailer K-29-A

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	gasoline engine driven generator	110-volt 60 cycles AC
Frequency Range (KC)	200 - 400	1,500 - 18,000
Type of Signal	Tone	CW, Tone, Voice
Range (Miles)		

Major Components: Trailer K-29-A Radio Receiver BC-342-C Goniometer Unit BC-468-A
 Power Unit PE-90-A Radio Transmitter BC-467-A

Remarks: Includes complete antenna system (mast, wire, guys, etc.) and Tool Equipment TE-57 for erecting antenna. Set operates from 110-volt, 60 cycle AC or from self contained gasoline engine.



129111

PORTABLE RADIO RANGE, RADIO SET SCR-277-T1
WITH ANTENNA SYSTEM ERECTED

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RADIO COMPASS SCR-280-A



RADIO COMPASS SCR-280-A

General Purpose: Used on large aircraft for navigation by homing and by taking bearings on radio stations on either side of the line of flight. Controlled from one or two remote positions.

Using Service(s): Air Corps

Communicates with: None

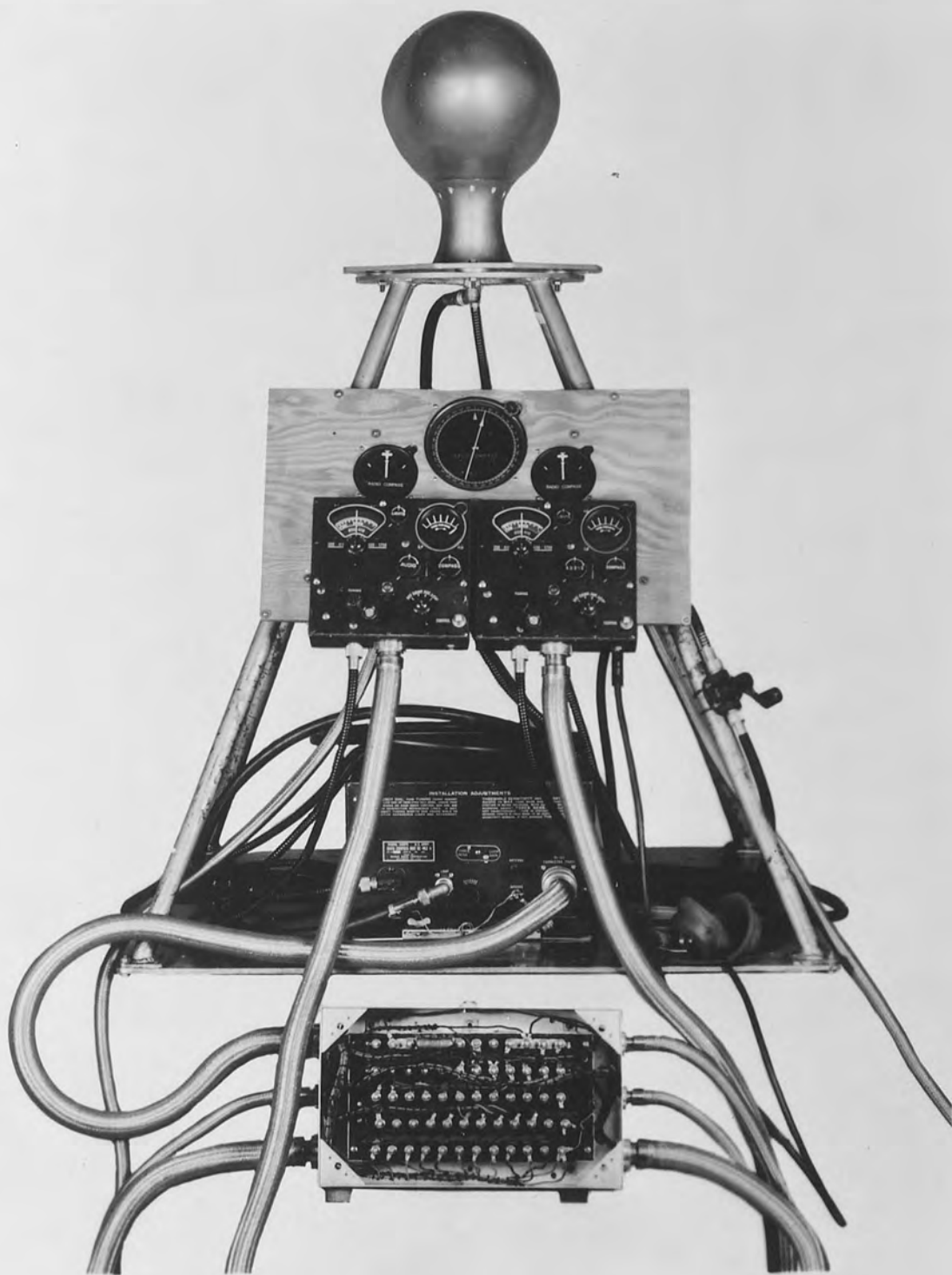
Method of Transportation: Aircraft

WEIGHT: 72 lbs. VOLUME:

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	12-volt battery
Frequency Range (KC)	None	200 - 1,750 KC
Type of Signal	None	Tone and Voice
Range (Miles)		

Major Components: Radio Compass Unit BC-431-A
Radio Control Box BC-432-A
Loop LP-19-A

Remarks: Same as SCR-263-A except for primary voltage requirements.



RADIO COMPASS SCR - 280
PRINCIPAL COMPONENTS

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RADIO SET SCR - () - 283

RADIO SET SCR-()-283

General Purpose: Airplane command set used for short range air to ground work, but mainly for intercommunication between planes in same flight.

Using Service(s): Air Corps

Communicates with: SCR-()-183, SCR-187-(), SCR-188-(), SCR-197-(),
SCR-240-A, SCR-261-A, SCR-274-N, SCR-()-283

WEIGHT:

45.3 lbs.

VOLUME:

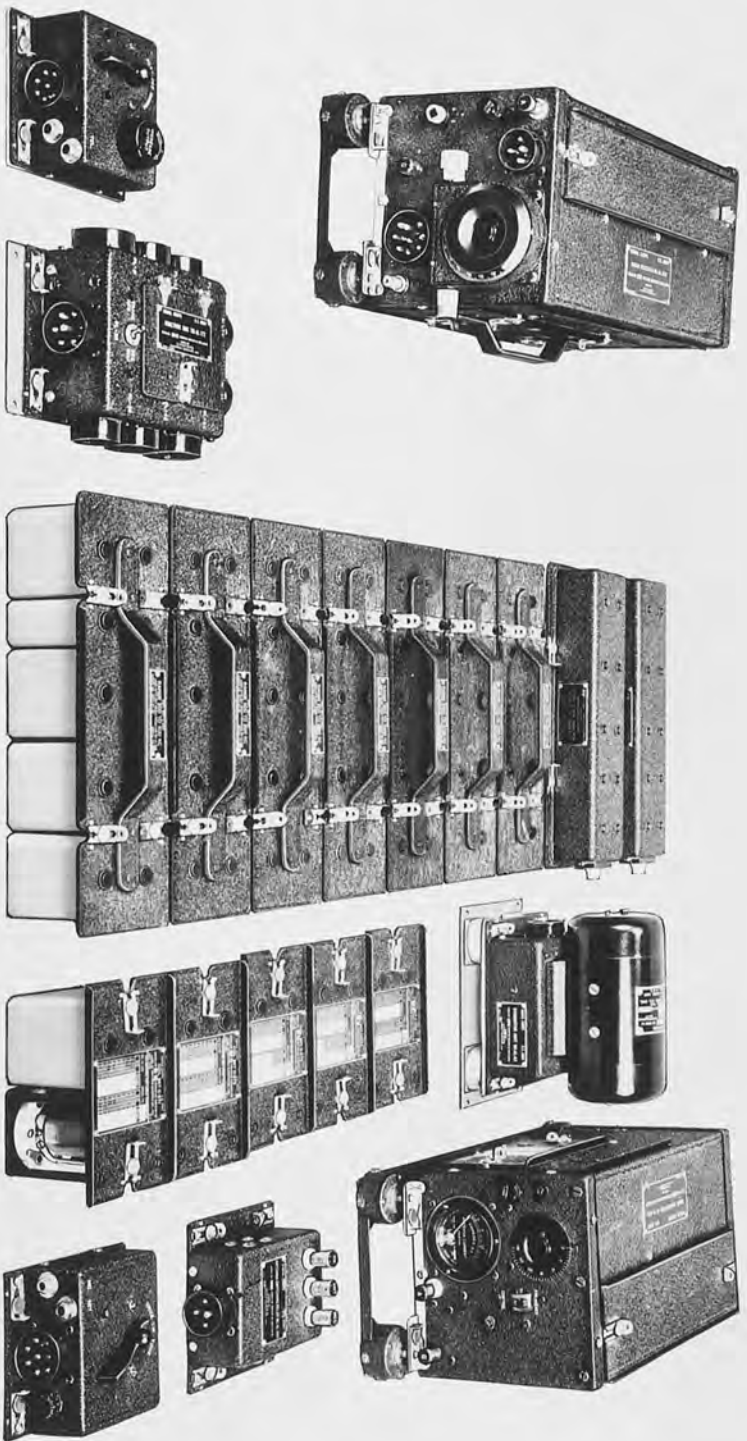
1.5 cu. ft.

Method of Transportation: Aircraft

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	24-volt plane battery	24-volt plane battery
Frequency Range (KC)	2,500 - 7,700	200 - 400 2,500 - 7,700
Type of Signal	CW - Voice	Tone - Voice
Range (Miles)	CW - 45 Voice - 30	

Major Components: Radio Transmitter BC-()-430
Radio Receiver BC-()-429
Dynamotor Unit BD-()-93

Remarks: Used in all airplanes having 24-volt primary power except primary trainers. May be replaced by SCR-274-N. The 12-volt (primary power) equivalent to this set is SCR-()-183,



PRINCIPAL COMPONENTS OF RADIO SET SCR-AL-283

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RADIO SET SCR-284-A ✓

RADIO SET SCR-284-A

General Purpose: Command use from Division HQ down to include Battalions and for communication with tank destroyer units.

Using Service(s): Infantry, Field Artillery and Signal Corps.

Communicates with: SCR-131, SCR-161, SCR-()-183, SCR-274-N, SCR-()-283, SCR-284, SCR-288, SCR-536-()

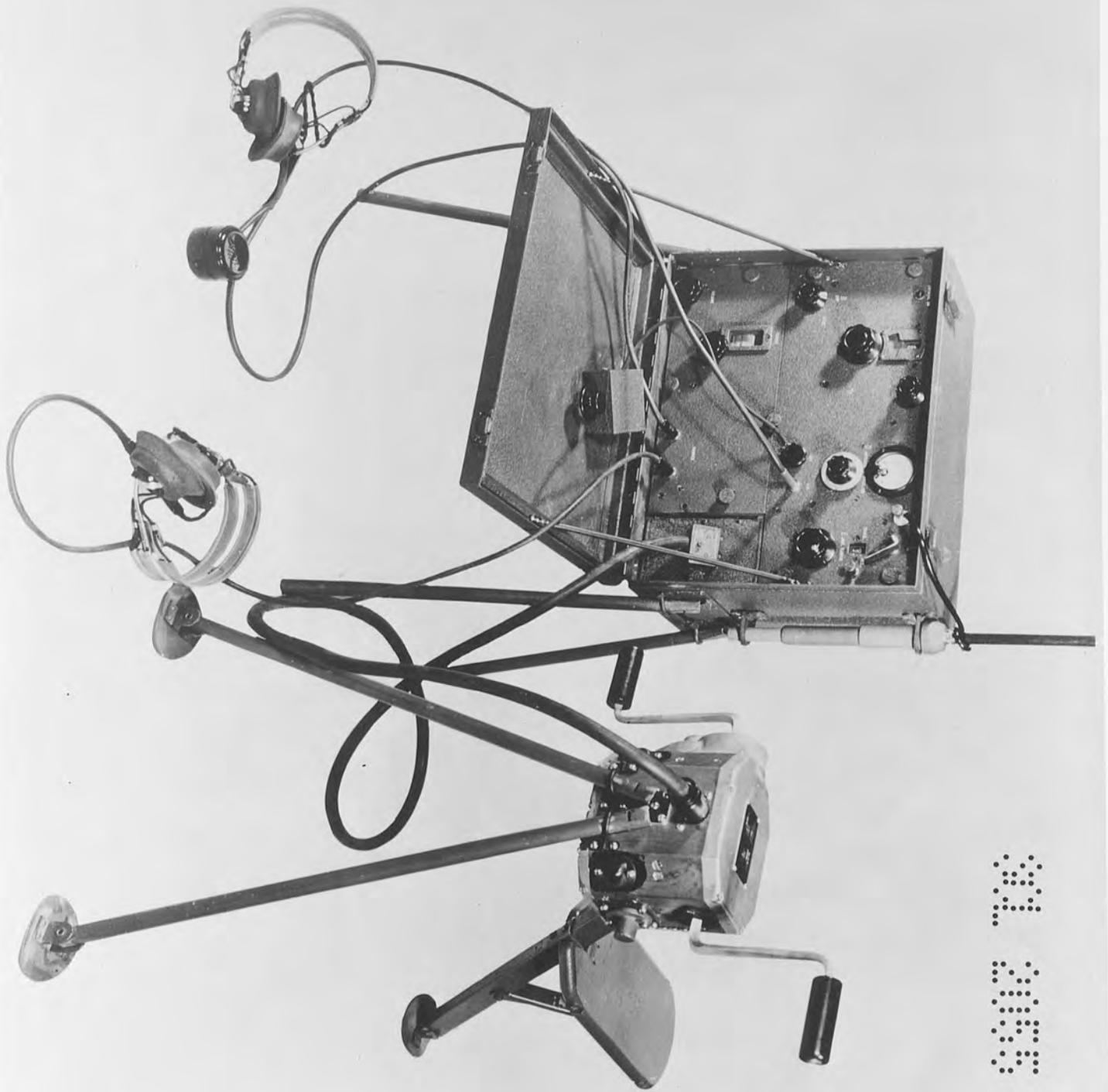
Method of Transportation: Two man pack or carried in vehicle

WEIGHT: 80 lbs. VOLUME:

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator vehicle battery & dynamotor	self contained batteries
Frequency Range (KC)	3,800 - 5,800	3,800 - 5,800
Type of Signal	CW and Voice	All
Range (Miles)	5 miles voice, 20 miles CW	

Major Components: Radio Receiver & Transmitter BC-654-A
Generator GN-45-A
Power Unit PE-103-A (12-volt)
Remote Control Unit RM-29

Remarks: This set which was designed as a replacement for the SCR-131 and SCR-171 will also replace SCR-161, used by the FA. Designed to operate from moving vehicle or on the ground.



1952

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RADIO SET SCR-287-A

RADIO SET SCR-287-A

General Purpose: Medium range liaison set used in most heavy bombers, medium bombers, and in many transport and observation planes.

Using Service(s): Air Corps

Communicates with: SCR-177-(), SCR-187-(), SCR-188-(), SCR-193-(),
SCR-238-(), SCR-245-(), SCR-287-()

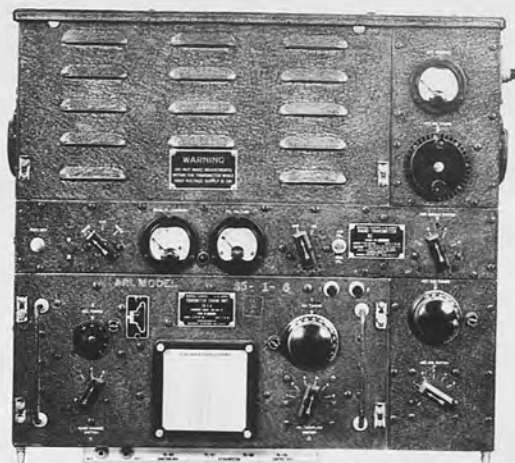
Method of Transportation: Aircraft

WEIGHT: 250 lbs.
VOLUME: 10 cu. ft.

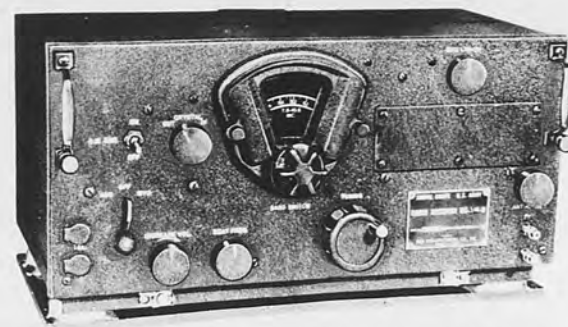
CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	24-volt plane battery	24-volt plane battery
Frequency Range (KC)	350 - 650 1,500 - 12,500	1,500 - 18,000
Type of Signal	CW, Tone, Voice	All
Range (Miles)	CW - 750, Tone -	500, Voice - 250

Major Components: Radio Transmitter BC-375-() Dynamotor Unit PE-73-()
Radio Receiver BC-348-()

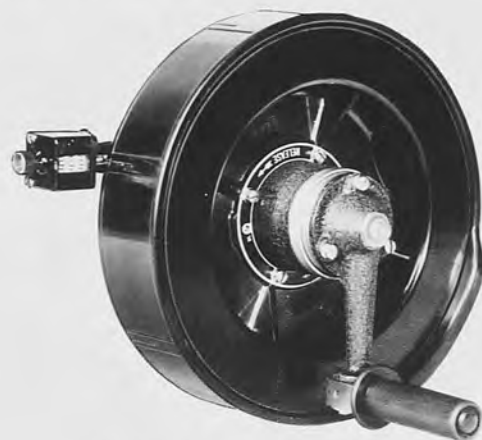
Remarks: 12-volt equivalent of this set is SCR-187-().



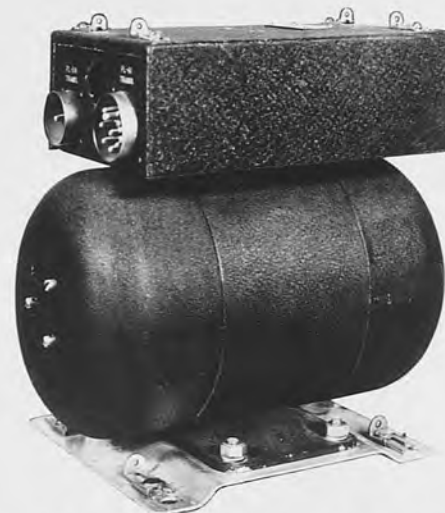
RADIO TRANSMITTER BC-375-C



RADIO RECEIVER BC-348-B



REEL RL-30-B



DYNAMOTOR UNIT PE-73-B

PRINCIPAL COMPONENTS OF RADIO SET SCR-287-A

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RADIO SET SCR-288



RADIO SET SCR-288

General Purpose: Command use from Division Headquarters down to include battalions.
Temporary replacement for SCR-131, SCR-161, SCR-171.

Using Service(s): Infantry, Field Artillery, Signal Corps

Communicates with: SCR-131, SCR-161, SCR-193-(), SCR-238-(), SCR-245-()

WEIGHT:

61.4 lbs.

VOLUME:

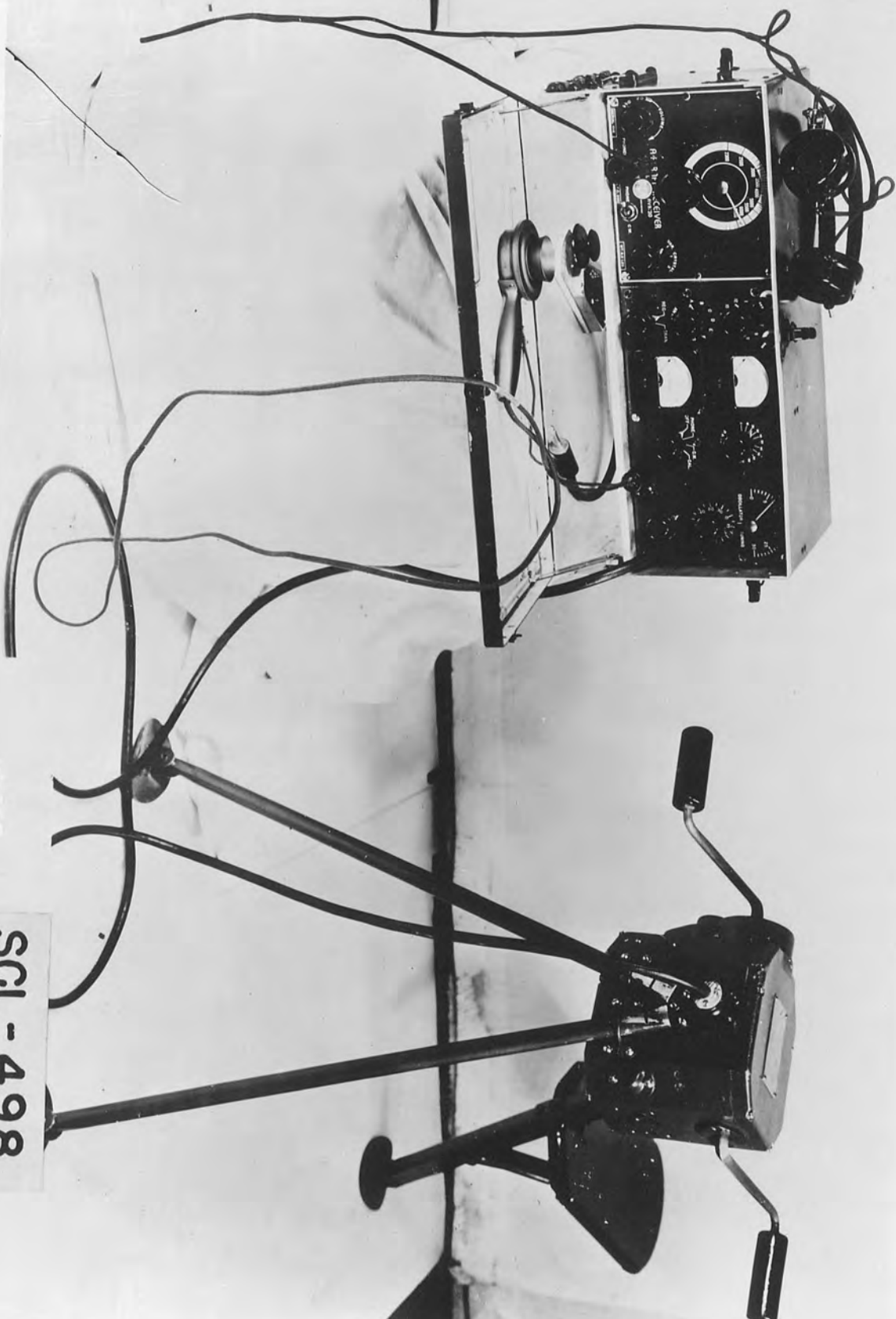
Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	hand generator	hand generator or dry batteries
Frequency Range (KC)	3,500 - 6,300	2,300 - 6,500
Type of Signal	CW and Voice	All
Range (Miles)	CW - 30 miles, Voice - 15 miles	

Major Components: Radio Receiver and Transmitter BC-474-A
Generator GN-44-A

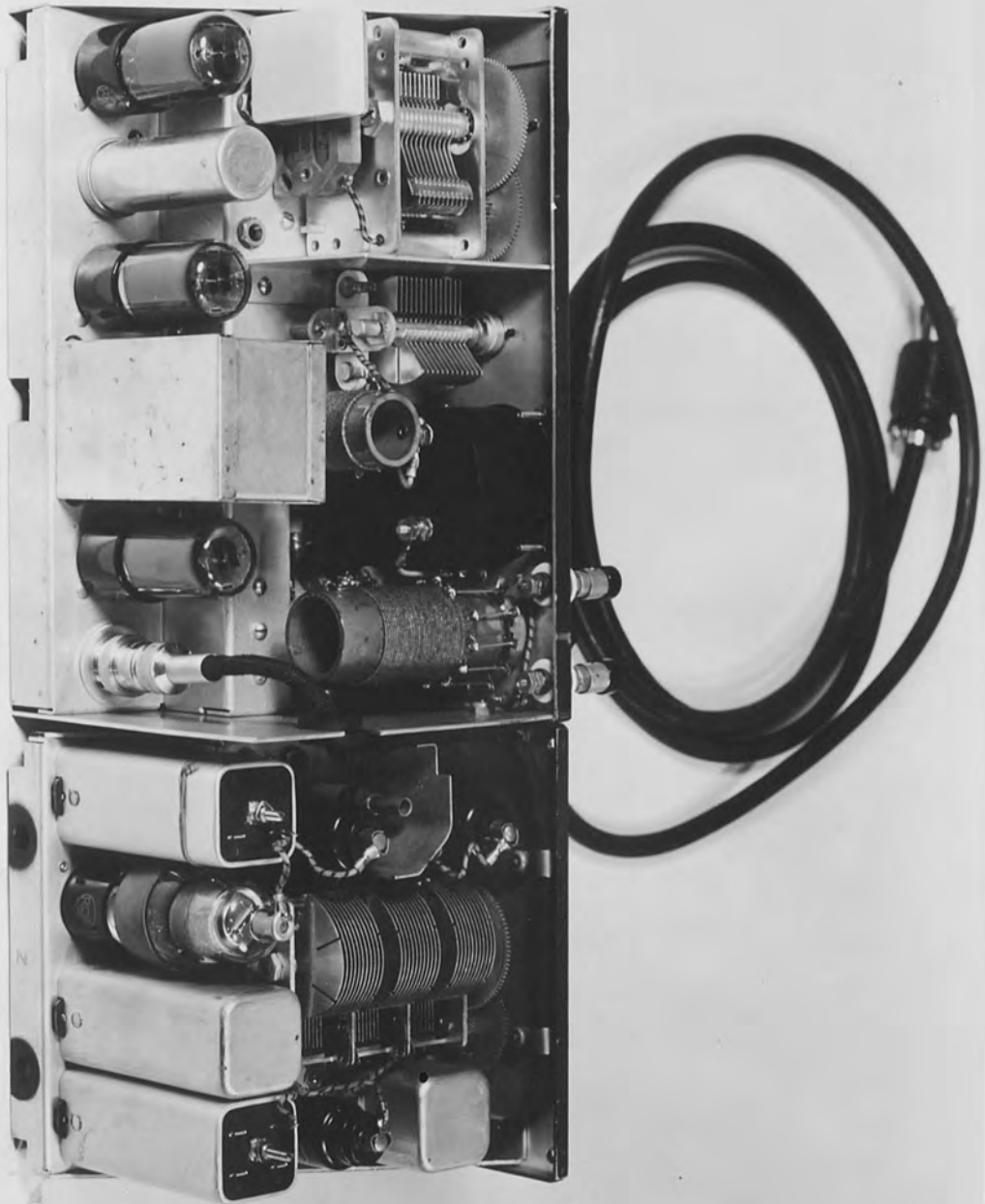
Remarks: This set was purchased as a stop gap for training purposes, pending procurement of a suitable replacement for SCR-131, SCR-161, SCR-171. The SCR-284, recently standardized, will be issued as the replacement set.

SCL - 498



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RADIO SET SCR-293-A

RADIO SET SCR-293-A

General Purpose: Installation in intermediate command tanks and vehicles of the Armored Force, GHQ, Corps and Division.

Using Service(s): Armored Force (1st Division only)

Communicates with: SCR-293-A, SCR-294-A, SCR-508-(), SCR-528-(), SCR-538-().

WEIGHT:

115 lbs.

VOLUME:

2.6 cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12 or 24-volt vehicular battery	12 or 24-volt vehicular battery
Frequency Range (KC)	20,000 - 28,000	20,000 - 28,000
Type of Signal	Voice only	Voice only
Range (Miles)	7 miles in motion	

Major Components: Radio Receiver and Transmitter BC-500-A
Radio Receiver BC-499-A

Remarks: Short Range FM transmitter and receiver replacing, in part, the SCR-193-() and SCR-245-() in the Armored Force. This set is being superseded by SCR-508-() and SCR-528-(), recently standardized, except in the 1st Armored Division.



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RADIO SET SCR-293
FRONT VIEW
PRINCIPAL COMPONENTS

APRIL 16, 1941

SCL-738

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RADIO SET SCR-294-A

RADIO SET SCR-294-A

General Purpose: For installation in vehicles and tanks of the 1st Armored Division where receivers only are required.

Using Service(s): Armored Force (1st Division only)

Communicates with: Receiver only - SCR-293-A, SCR-508-(), SCR-528-()

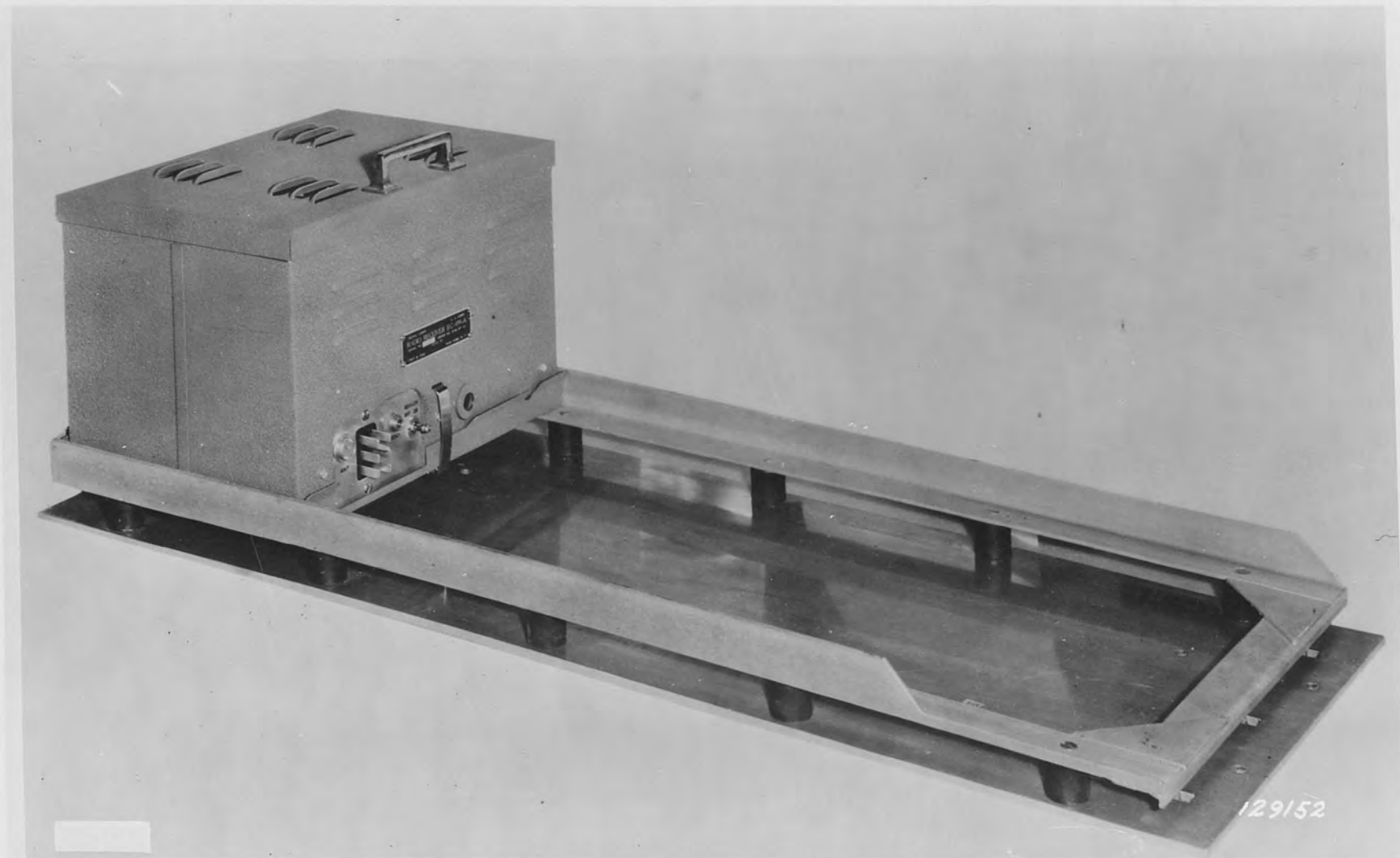
WEIGHT: 56 lbs.
VOLUME: 0.6 cu. ft.

Method of Transportation: Vehicle or tank

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	12 or 24-volt vehicular battery
Frequency Range (KC)	None	20,000 - 28,000
Type of Signal	None	Voice only
Range (Miles)	7 miles in motion	

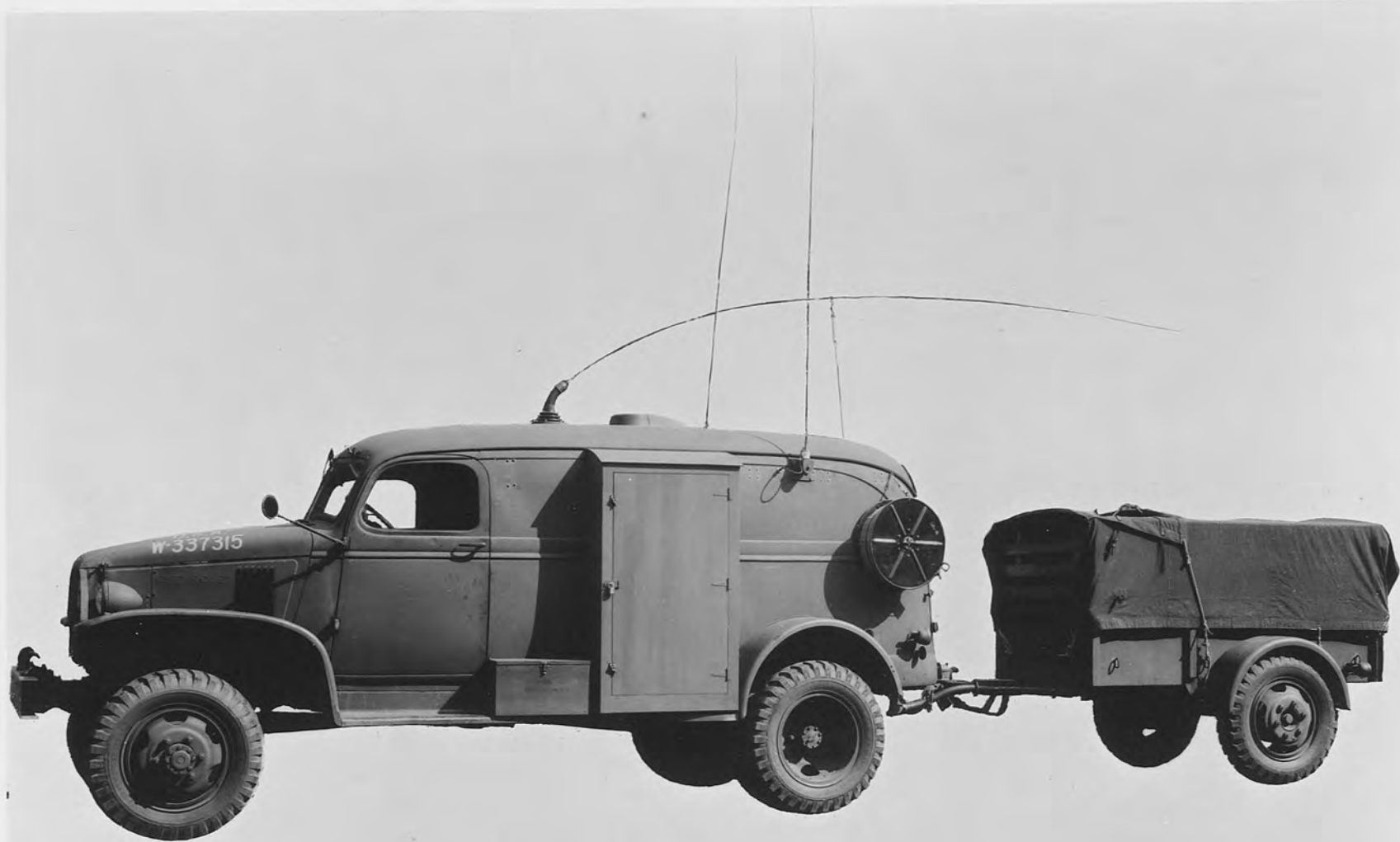
Major Components: Radio Receiver BC-499-A

Remarks: Frequency modulated receiver only. Replaces SCR-210-() in vehicles of the Armored Force. Will be replaced by SCR-538-() in all except the 1st Division of the Armored Force.



RADIO SET SCR-294
Radio Receiver BC-499 . 3/4 Front View

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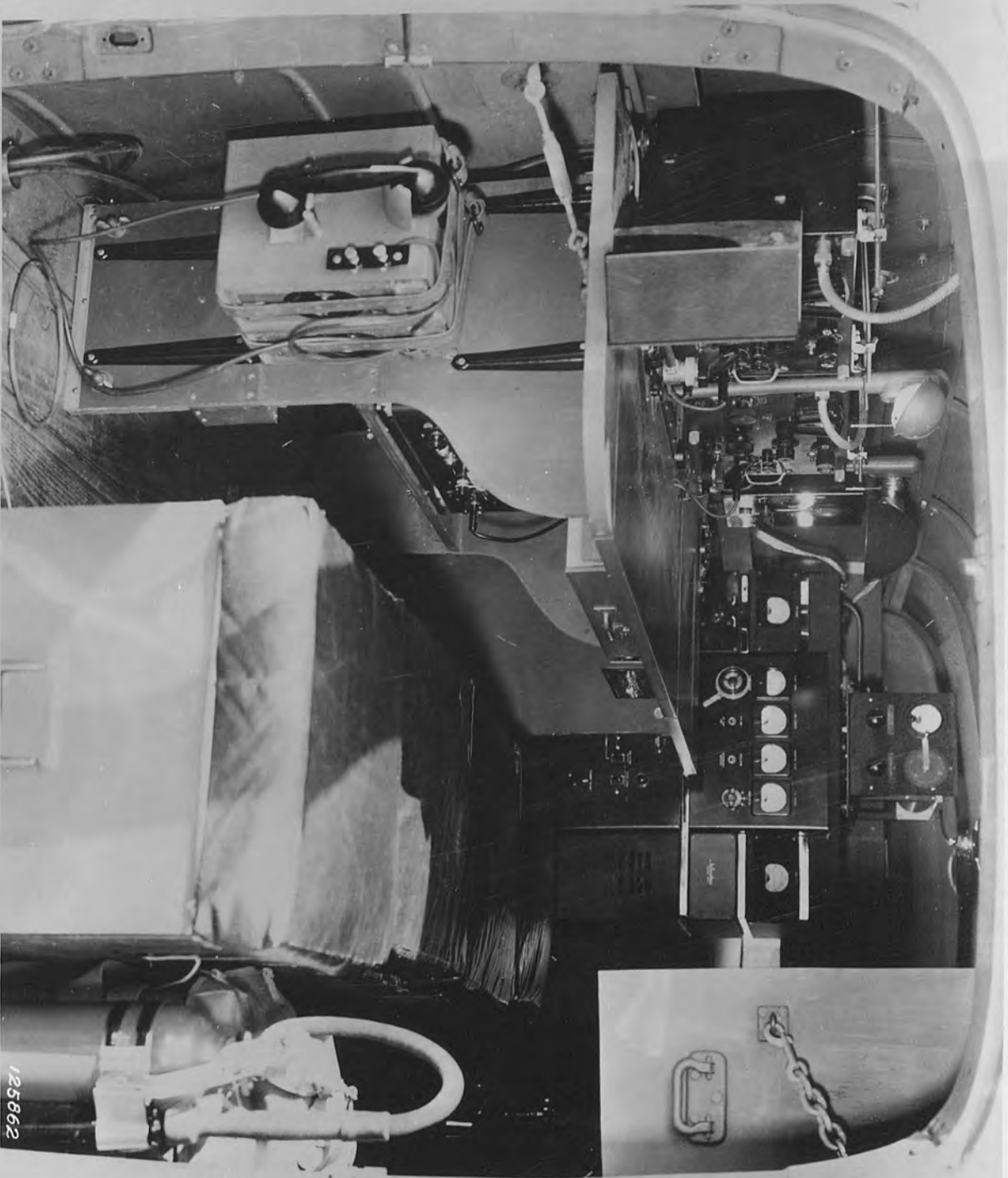


127261

RADIO SET SCR-299-T2
Operating Position

DATE- 10-15-41 SIGNAL CORPS LABORATORIES • FORT MONMOUTH • N. J. • Nº SCL- 179

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RADIO SET SCR-299-T2
Truck K51 . Operating Table

DATE: 10-15-47 . SIGNAL CORPS LABORATORIES . FORT MONMOUTH . N. J.

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RADIO SET SCR-299

General Purpose: Communication between Division Command elements of Division, Corps and Army Troops assigned special missions beyond range of 30 miles.

Using Service(s): Signal Corps

Communicates with: SCR-177, SCR-()-183, SCR-187-(), SCR-193-(), SCR-238-A, SCR-245-(), SCR-274-N, SCR-()-283, SCR-284, SCR-287-A

WEIGHT:

VOLUME:

Method of Transportation: Installed in 1-1/2 Ton Truck which tows 1-Ton Cargo Trailer mounting the gasoline generator.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	gasoline generator 110-volt AC 6 $\frac{1}{2}$ KVA	gasoline generator 110-volt AC
Frequency Range (KC)	1,600 - 6,000	1,500 - 18,000
Type of Signal	CW - Voice	All
Range (Miles)	100 miles - voice,	300 miles - CW

Major Components: Radio Transmitter BC-610-() Radio Receiver BC-342-()
Radio Receiver BC-312-() Power Unit PE-95

Remarks: A complete mobile radio station with all equipment necessary for maintenance and communication when in the field. Must be operated by trained signal personnel.

RADIO SET ✓ SCR-299

RADIO SET SCR-506-()

RADIO SET SCR-506-()

General Purpose: Medium power, medium frequency, command set for use in the Armored Force.

Using Service(s): Armored Force

Communicates with: SCR-131, SCR-171, SCR-177-(), SCR-178, SCR-187-(), SCR-193-(), SCR-203, SCR-210, SCR-238-(), SCR-245-(), SCR-287-(), SCR-506-().

WEIGHT: 181½ lbs.
VOLUME: 3.7 cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12 or 24-volt dynamotor & vehicular storage bty.	12 or 24-volt dynamotor & vehicular storage bty.
Frequency Range (KC)	2,000 - 4,500 in two Bands	2,000 - 6,000 in two Bands
Type of Signal	Voice, CW	All
Range (Miles)	75 miles - CW, 25	miles - voice

Major Components: Radio Transmitter BC-653-() Dynamotor DM-40 and DM-42-(), or DM-41-() and DM-43-()
Radio Receiver BC-652-() Switchbox BC-658-()

Remarks: Signal Corps Development of Armored Force Radio Set AF-II



ARMORED FORCE BOARD 1836 P-168 10/7/41

FORT KNOX. KENTUCKY

Installation of SCR-506 in right sponson, Light Tank, M3.

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128386

RADIO SET SCR-508-()

RADIO SET SCR-508-()

General Purpose: For installation in intermediate command tanks and vehicles of Armored Force, General Headquarters, Corps and Divisions where it is necessary to monitor 2 frequencies simultaneously.

Using Service(s): Armored Force

Communicates with: SCR-508-(), SCR-509-(), SCR-510-(), SCR-528-(), SCR-538-()

WEIGHT:

210 lbs.

VOLUME:

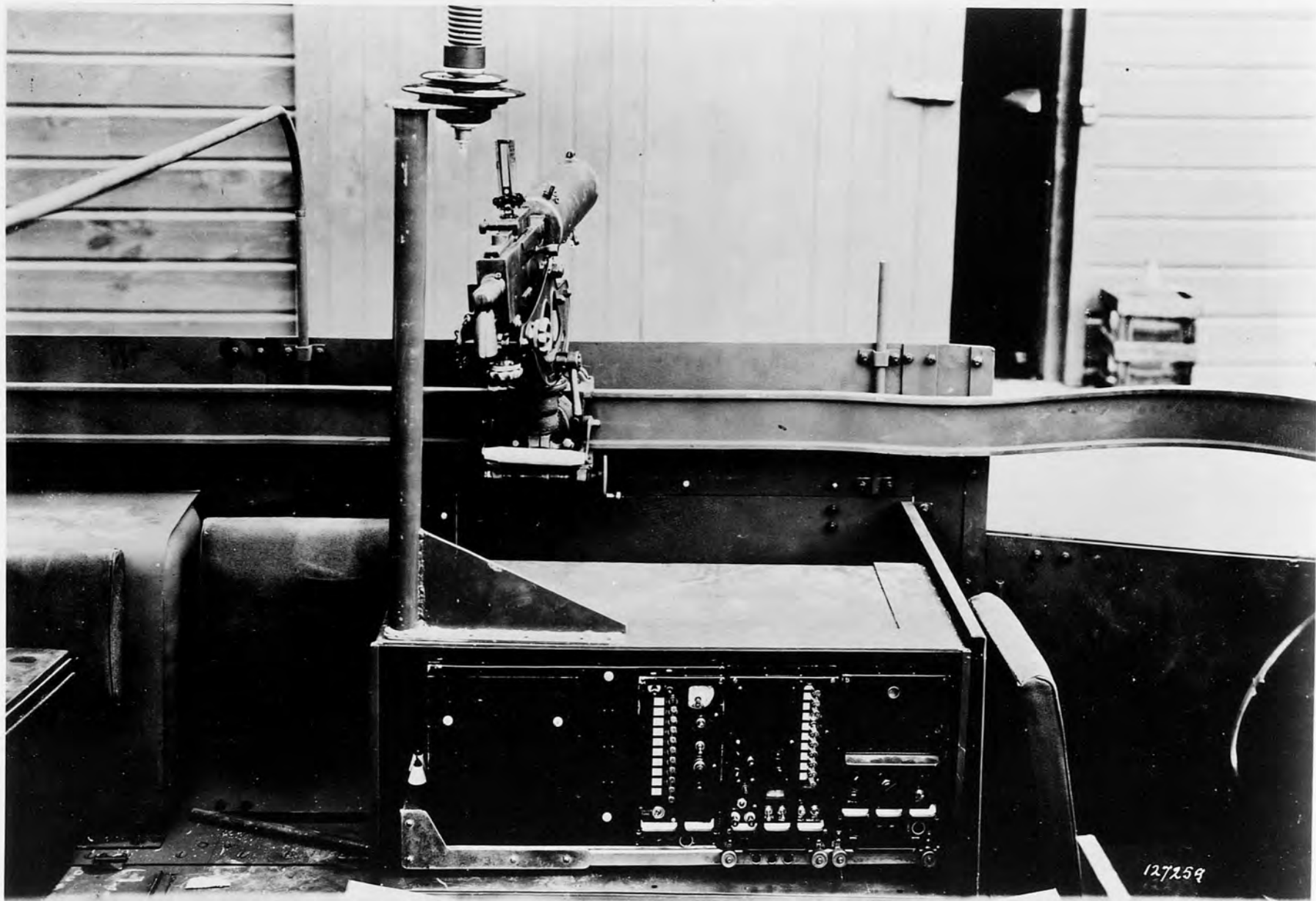
2.9 cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12 or 24-volt vehicular battery	12 or 24-volt vehicular battery
Frequency Range (KC)	20,000 - 28,000	20,000 - 28,000
Type of Signal	Voice only	Voice only
Range (Miles)	7 miles in motion	

Major Components: Radio Transmitter BC-604-() 2 Radio Receivers BC-603-()

Remarks: Short Range FM Transmitter with two receivers replacing, in part the SCR-193-(), and SCR-245-() in the Armored Force.



ARMORED FORCE BOARD

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FORT KNOX. KENTUCKY

Location of SCR-508 in Halftrack M2.

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RADIO SET SCR-509-()

RADIO SET SCR-509-()

General Purpose: Radio set used by forward (foot) observers and liaison purposes. May also be used for Command purposes where short range ground set is needed.

Using Service(s): Field Artillery, Signal Corps, Ordnance, Corps of Engineers
(All of Armored Force)

Communicates with: SCR-293-A, SCR-294-A, SCR-508-(), SCR-509-(),
SCR-510-(), SCR-528-(), SCR-538-()

WEIGHT:

50 lbs.

VOLUME:

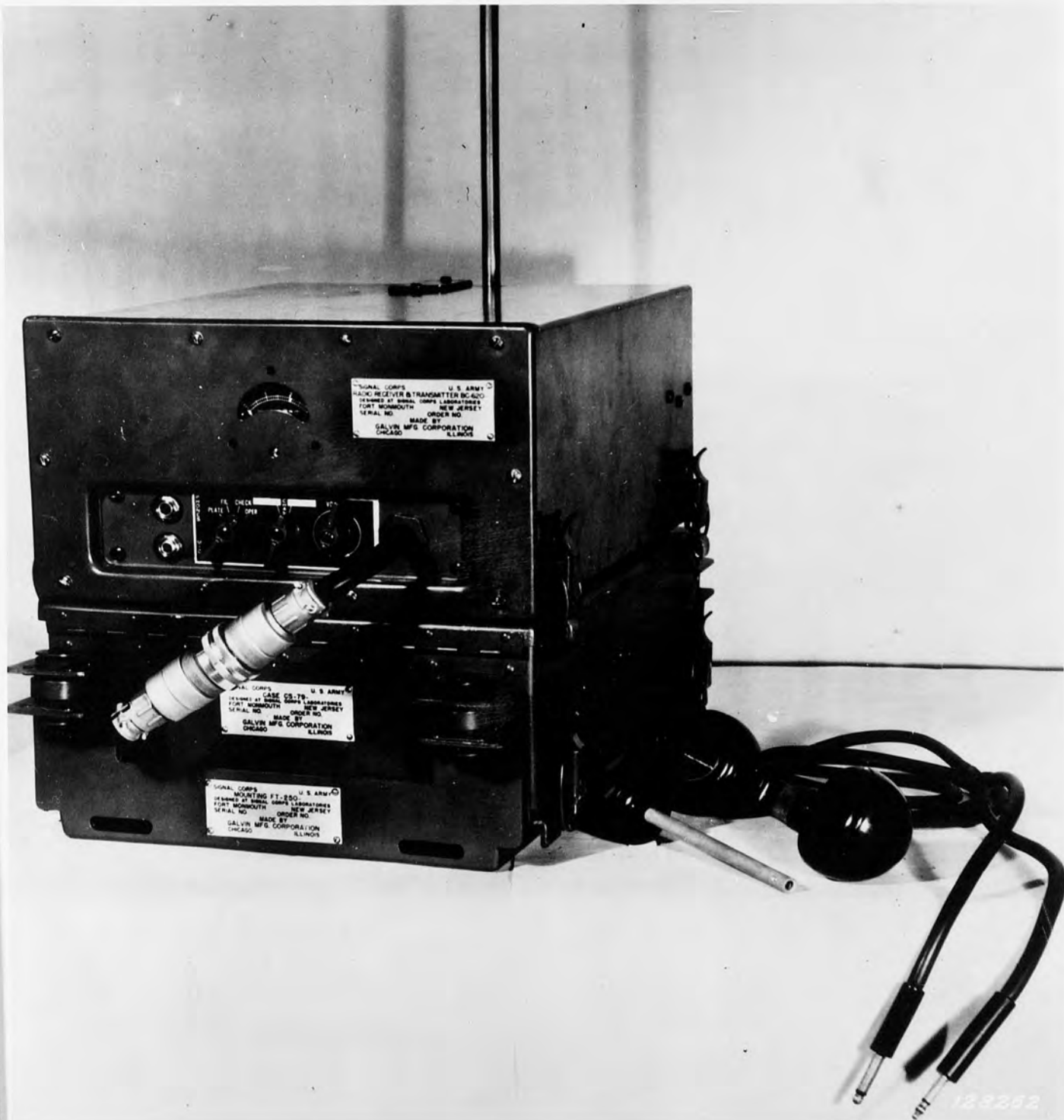
1.3 cu. ft.

Method of Transportation: Vehicle (operated on ground)

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry batteries	dry batteries
Frequency Range (KC)	20 - 28 MC Frequency Modulated	20 - 28 MC Frequency Modulated
Type of Signal	Voice only	Voice only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-620-()
Antenna AN-45-()
Handset TS-13-()

Remarks: Partially replaces SCR-194 and SCR-195 in the Armored Force. For operation with other FM sets only.



RADIO SET SCR-509
Setup for Operation . 3/4 View

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RADIO SET SCR-510-()



RADIO SET SCR-510-()

General Purpose: Radio set used by forward observers for liaison purposes, operating either from a vehicle or on the ground. May also be used as a short range Mobile Command Set.

Using Service(s): Field Artillery, Signal Corps, Ordnance, Quartermaster Corps, Corps of Engineers, Medical Corps (All of Armored Force)

Communicates with: SCR-293-A, SCR-294-A, SCR-508-(), SCR-509-(), SCR-510-(), SCR-528-(), SCR-538-()

WEIGHT:

65 lbs.

VOLUME:

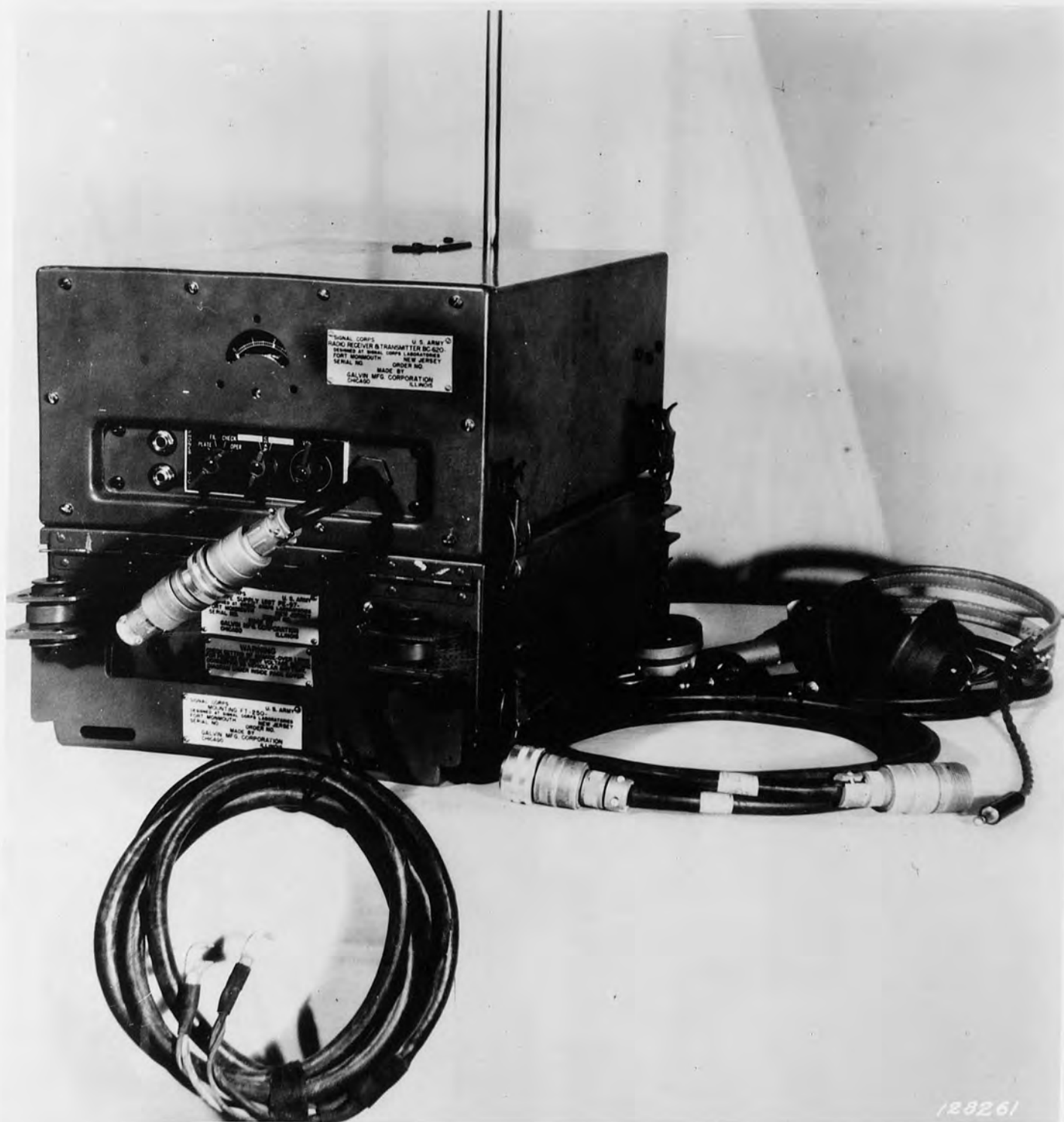
1.3 cu. ft.

Method of Transportation: Vehicle or motorcycle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	6 or 12-volt car or dry battery	6 or 12-volt car or dry battery
Frequency Range (KC)	20 - 28 MC Frequency Modulated	20 - 28 MC Frequency Modulated
Type of Signal	Voice only	Voice only
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-620-()
Case CS-79-()
Antenna AN-45-()

Remarks: This set differs from Radio Set SCR-509-() in that it is capable of operation from a 6 or 12-volt car battery while in motion. May be used on motorcycle as a battery operated set. For operation with other FM sets only.

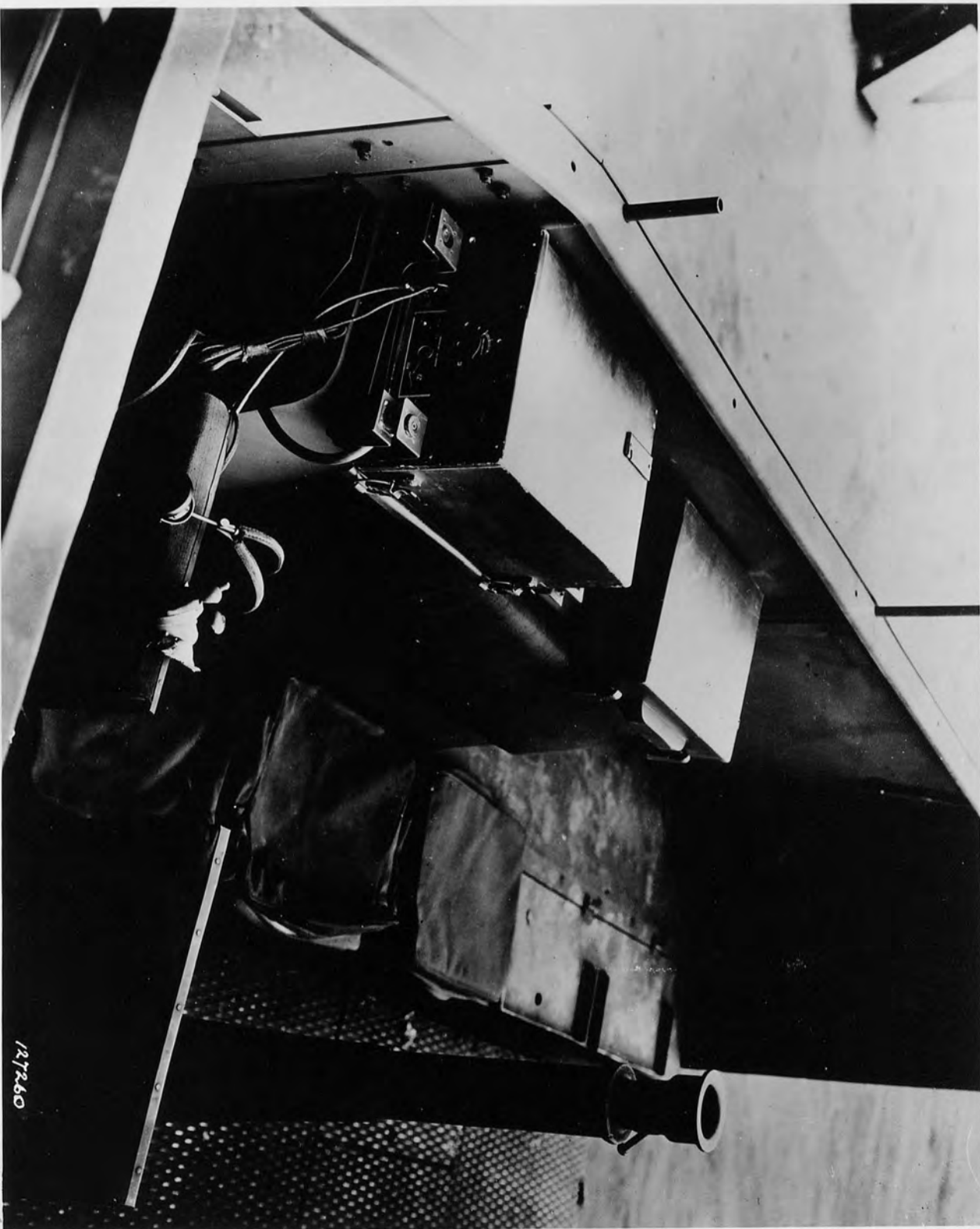


RADIO SET SCR-510
Setup for Operation

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ARMORED FORCE BOARD

P-157

FORT KNOX, KENTUCKY

Location of SCR-510 in Halftrack M3.

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RADIO SET SCR 511-()



RADIO SET SCR-511-()

General Purpose: Short range communication between small cavalry units.

Using Service(s): Cavalry

Communicates with: SCR-131, SCR-161, SCR-193-(), SCR-245-(),
SCR-511-(), SCR-536-()

WEIGHT:

14.5 lbs.

VOLUME:

0.5 cu. ft.

Method of Transportation: Man on foot, man on horse, vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry batteries	dry batteries
Frequency Range (KC)	3,000 - 6,000	3,000 - 6,000
Type of Signal	Voice only	Voice only
Range (Miles)	5 miles	

Major Components: Guidon staff 6 Tuning Units
Chest Unit Radio Receiver and Transmitter BC-745-()

Remarks: Set is turned on by extension of antenna. Single control used, that being "push to talk" switch. Transmitter receiver and antenna mounted on guidon staff, this is cabled to batteries and microphone - speaker unit.



RADIO SET SCR-511
In Operating Position

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RADIO SET SCR 528-()

RADIO SET SCR-528-()

General Purpose: Used in intermediate command tanks and vehicles of Armored Force, GHQ, Corps and Divisions where it is necessary to monitor but one frequency.

Using Service(s): Armored Force.

Communicates with: SCR-508-(), SCR-509-(), SCR-510-(), SCR-528-(), SCR-538-().

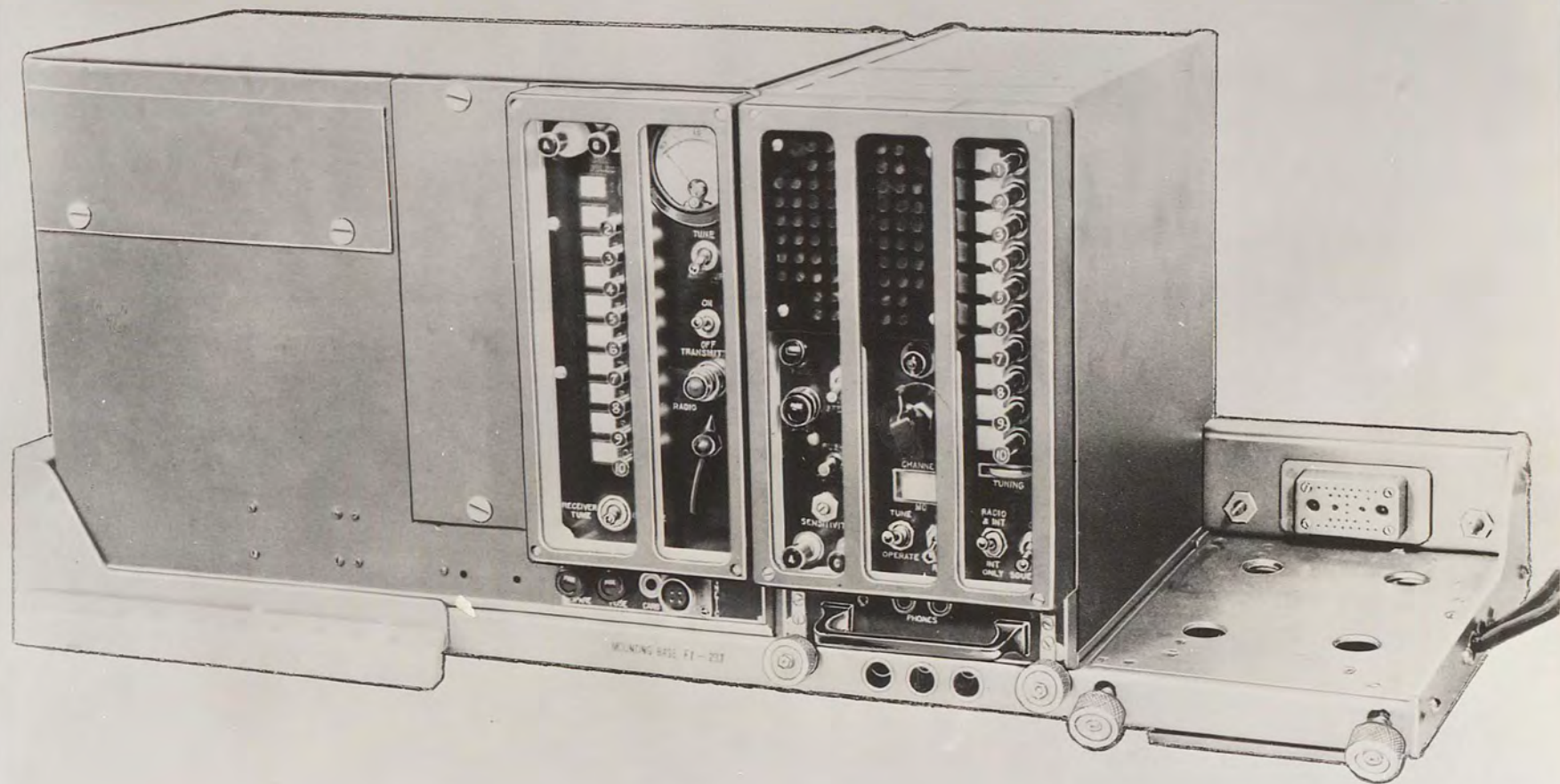
WEIGHT: 175 lbs.
VOLUME: 2 cu. ft.

Method of Transportation: Vehicle or tank

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	12 or 24-volt storage battery	12 or 24-volt storage battery
Frequency Range (KC)	20,000 - 28,000 FM	20,000 - 28,000 FM
Type of Signal	Voice only	Voice only
Range (Miles)	7 miles in motion	

Major Components: Radio Transmitter BC-604-()
Radio Receiver BC-603-()

Remarks: Short Range FM Transmitter and Receiver replacing, in part the SCR-193-A, and SCR-245-() in the Armored Force.



127262

RADIO SET SCR-528-()
12V & 24V Model AF-111b



RADIO SET SCR-536-()

General Purpose: Ultra-short range set for Parachute Troops, Airborne Troops, and Antitank Units of the Infantry.

Using Service(s): Infantry

Communicates with: SCR-()-183, SCR-187-(), SCR-188-(), SCR-193-(), SCR-245-(), SCR-274-N, SCR-()-283, SCR-287-(), SCR-288

Method of Transportation: Man-pack (Carried in pocket or pouch)

WEIGHT:

6 lbs.

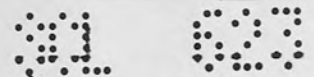
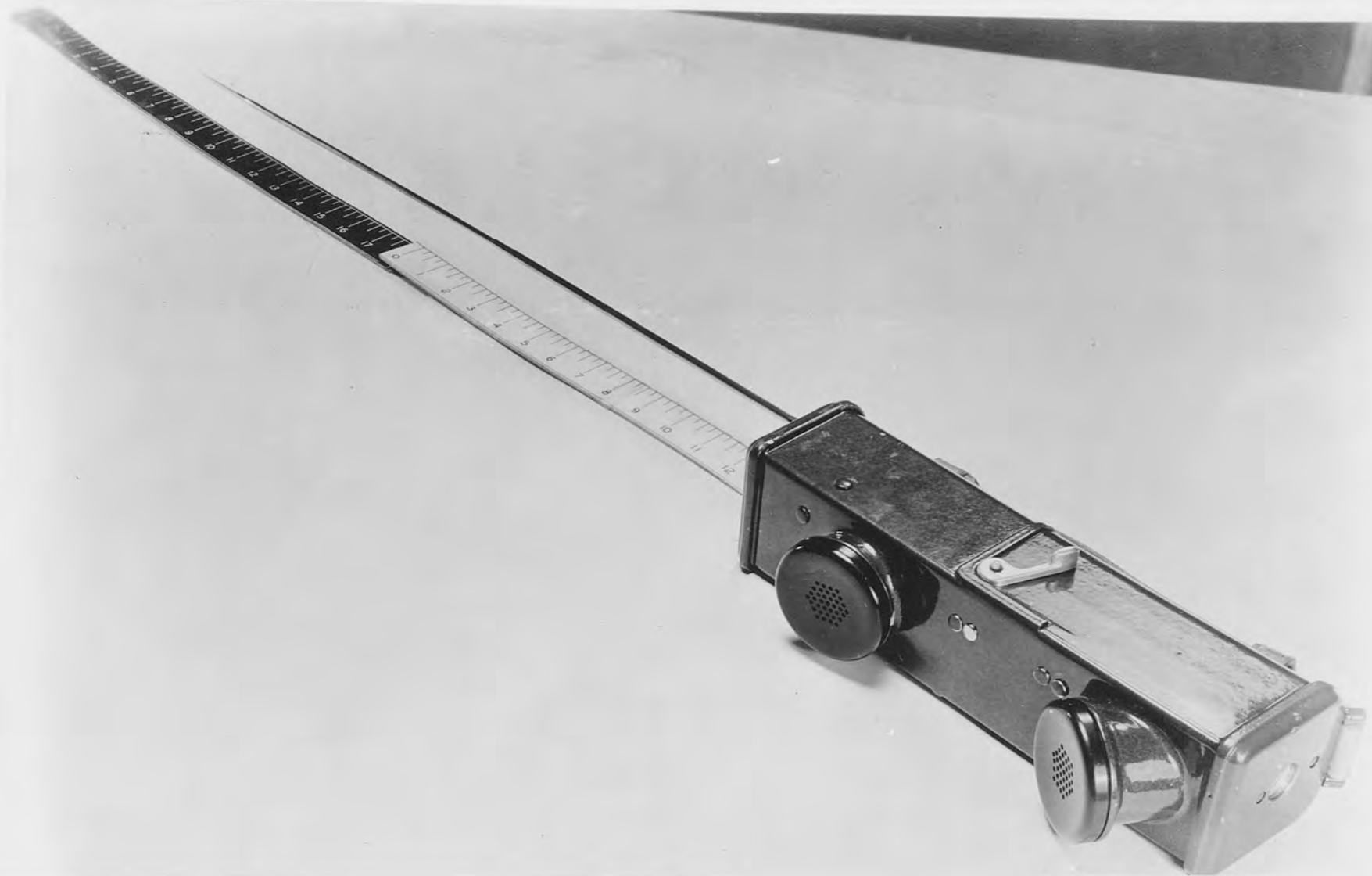
VOLUME:

0.07 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry batteries	dry batteries
Frequency Range (KC)	designed for single crystal operation within the band 3,500 - 6,000 KC	designed for single crystal operation within the band 3,500 - 6,000 KC
Type of Signal	Voice only	Voice only
Range (Miles)	1 mile	

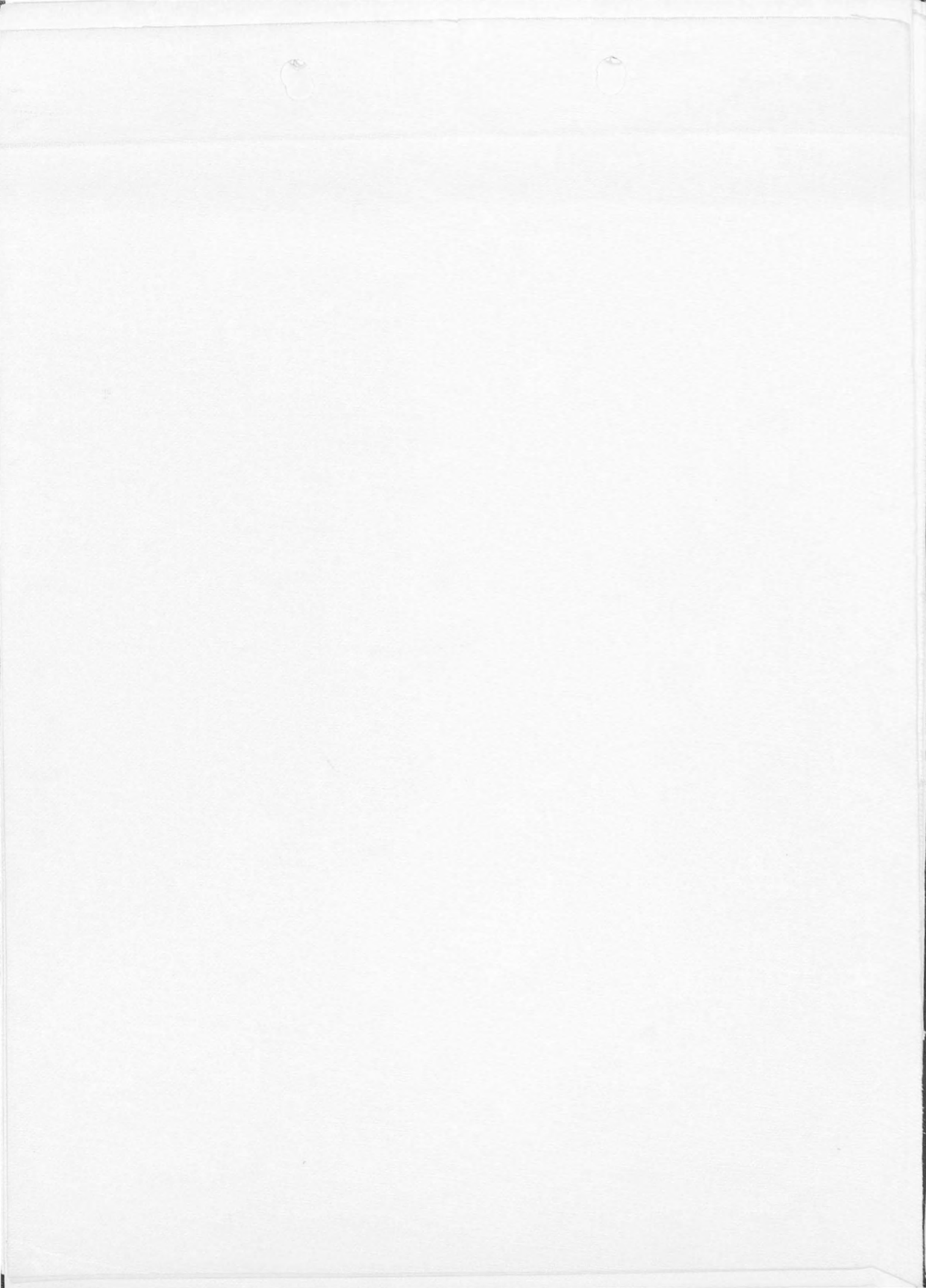
Major Components: Radio receiver and transmitter BC-611-()

Remarks: Handset and Antenna are built into the set box. Three crystals complete with coil units are furnished with each set but can be used only one at a time.



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MOTOROLA 5 LB. TRANSMITTER-RECEIVER
VIEW WITH ANTENNA EXTENDED



RADIO SET SCR 538-()

RADIO SET SCR-538-()

General Purpose: For use in vehicles or tanks of the Armored Force where receivers only are required.

Using Service(s): Armored Force

Communicates with: (Receiver only) SCR-293-A, SCR-508-(), SCR-509-(),
SCR-510-(), SCR-528-()

Method of Transportation: Vehicle

WEIGHT:

135 lbs.

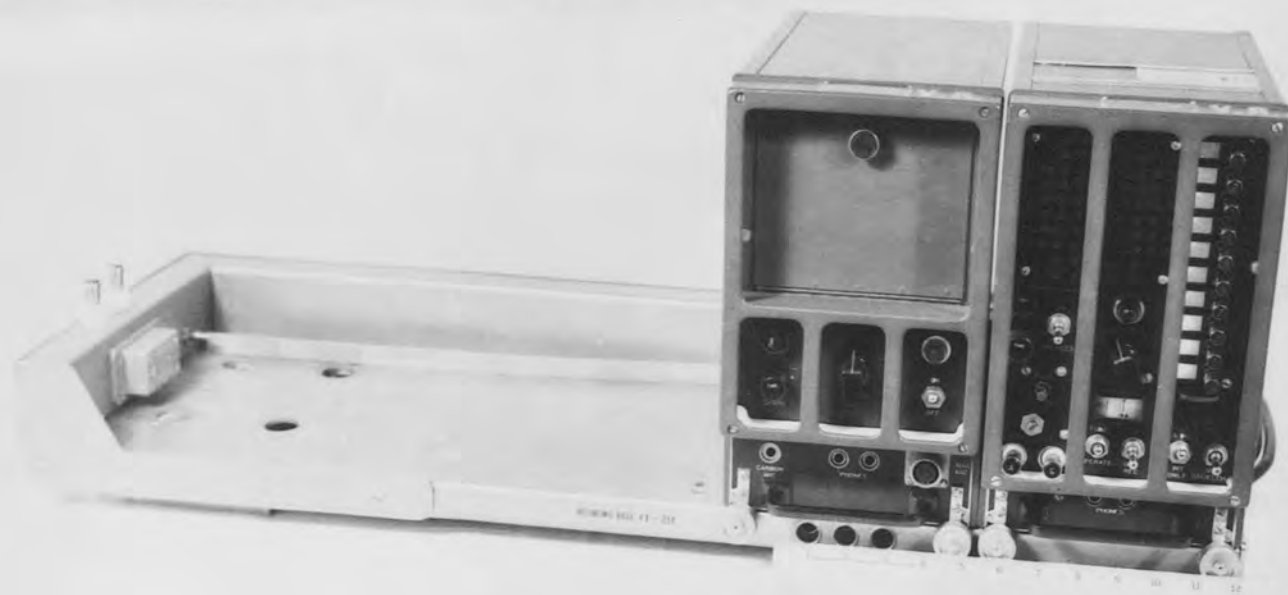
VOLUME:

0.6 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	None	12 or 24-volt car battery
Frequency Range (KC)	None	20,000 - 28,000 FM
Type of Signal	None	Voice only
Range (Miles)	7 miles in motion	

Major Components: Radio Receiver BC-603-()

Remarks: FM Receiver only replacing SCR-210-() in the Armored Force. Also partially replaces SCR-294-A in 1st Armored Division.



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RADIO SET SCR-538-()
12V & 24V Model AF-111C
Front View

April 23, 1941

SCL-751

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RADIO SET SCR 543-()

RADIO SET SCR-543-()

General Purpose: Medium power voice set for Coast Artillery use in Antiaircraft Regiments capable of operating in a moving vehicle and which can be dismounted quickly and operated with increased range as a field station.

Using Service(s): Coast Artillery

Communicates with: SCR-543-()

WEIGHT:

VOLUME:

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	PE-108-() gas-engine-generator	PE-110-() (vibrator) 12-volt storage battery
Frequency Range (KC)	1,700 - 2,750 2,750 - 4,400	1,700 - 2,750 2,750 - 4,400
Type of Signal	Voice	Voice
Range (Miles)	35 fixed, 20 moving	

Major Components: Radio Receiver and Transmitter BC-669-() Power Unit PE-108-()
Power Supply Unit PE-110-() Remote Control Unit RM-21-()
Chest CH-73-()

Remarks: Consists of a commercial (Hallicrafter HT-12-A) set with certain minor modifications.



RADIO SET SCR-543-() (Service Test Model)

Front View

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RADIO SET SCR 578-()



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RADIO SET SCR 608-()



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RADIO SET SCR 578-()



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RADIO SET SCR 608-()



RADIO SET SCR-608-()

General Purpose: Vehicular Set for Field Artillery similar to Radio Set SCR-508-() but different frequency range. Operated on voice by persons who are not radio specialists.

Using Service(s): Field Artillery

Communicates with: SCR-608-(), SCR-609-(), SCR-610-(), SCR-628-()

WEIGHT: Approx.
75 lbs.

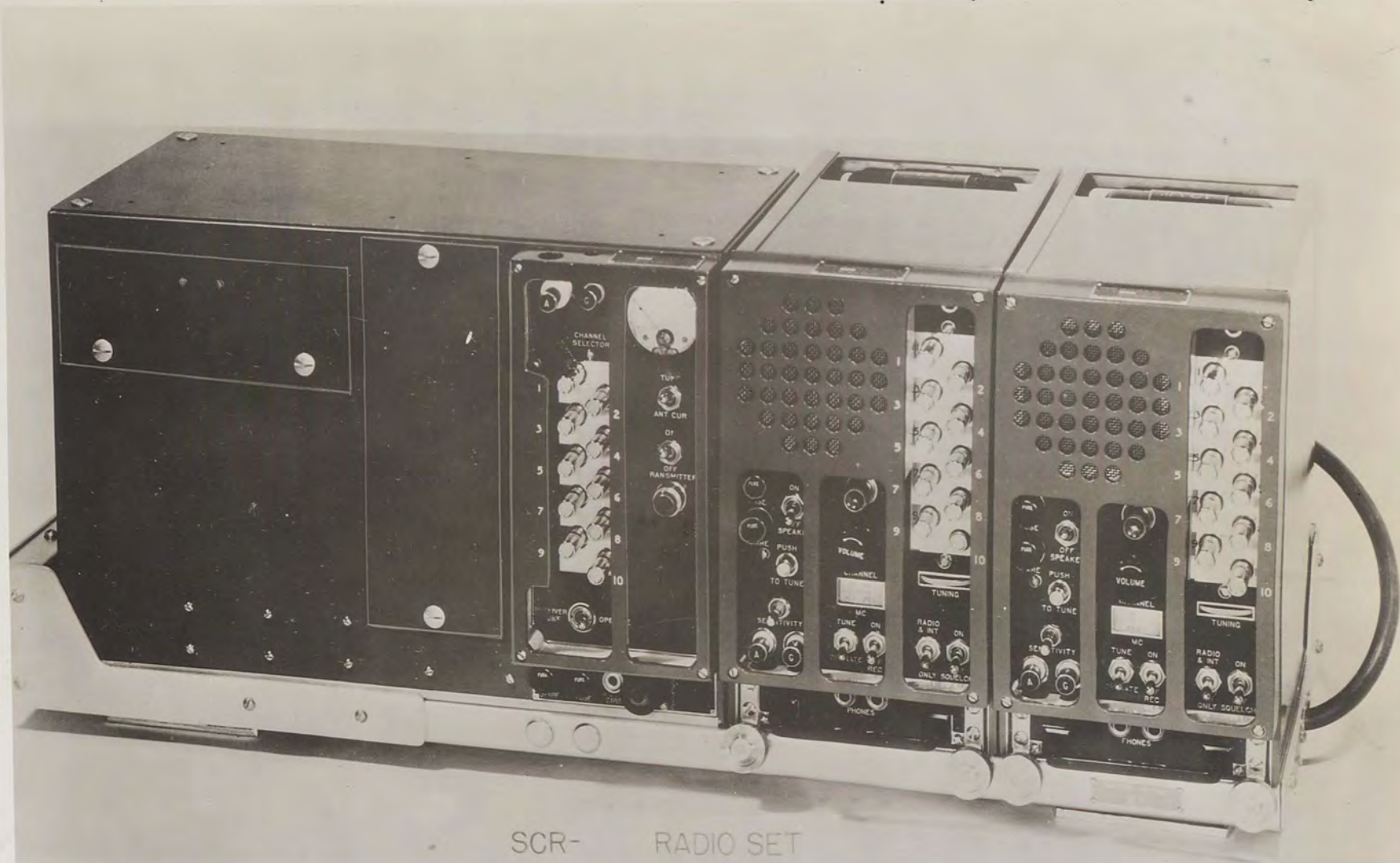
VOLUME: Approx.
3 cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	6 or 12-volt battery	6 or 12-volt battery
Frequency Range (KC)	27.0 - 38.9 MC	27.0 - 38.9 MC
Type of Signal	Voice (FM)	Voice (FM)
Range (Miles)	10 moving, 15 stationary	

Major Components: Radio Transmitter BC-684-() includes 120 quartz crystal units
 2 Radio Receivers BC-683-()
 Dynamotor DM-55-())
 2 Dynamotors DM-54-()) 6-volt operation

Remarks: One transmitter }
 Two receivers } on common mounting
 When operating from a 12-volt supply, 2 Dynamotors DM-34-() and 1 Dynamotor DM-35-()
 are used in lieu of DM-54-() and DM-55-() respectively.



SCR- RADIO SET

129155

RADIO SET SCR-608 (Preliminary Model)
Front View

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RADIO SET SCR 609-()

RADIO SET SCR-609-()

General Purpose: Portable Set for Field Artillery use, similar to Armored Force Radio Set SCR-509-() but different frequency range.

WEIGHT: 50 lbs.
VOLUME: 2 cu. ft.

Using Service(s): Field Artillery

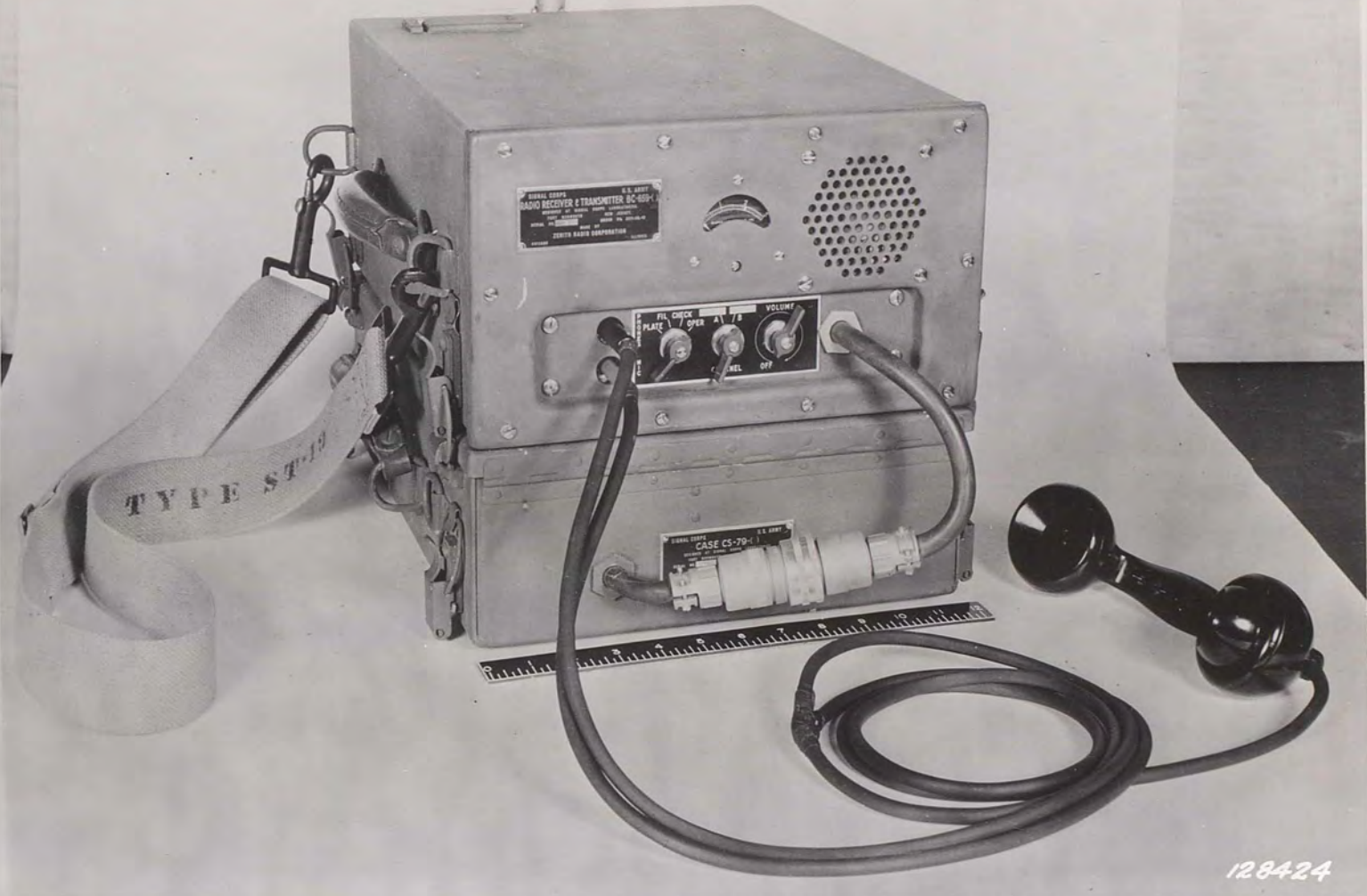
Communicates with: SCR-608-(), SCR-609-(), SCR-610-(), SCR-628-()

Method of Transportation: 1 man, any vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	dry battery, operated	dry batteries
Frequency Range (KC)	27.0 - 38.9	27.0 - 38.9
Type of Signal	Voice (FM)	Voice (FM)
Range (Miles)	5 miles	

Major Components: Radio Receiver and Transmitter BC-659-() including 120 quartz crystals in Crystal Holders FT-243.

Remarks: Replaces Radio Set SCR-194.



RADIO SET SCR-609-()
Set Up for Operation

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RADIO SET SCR 610-()

RADIO SET SCR-610-()

General Purpose: Is a vehicular set for FA use covering same frequency range and same number of channels as Radio Set SCR-609-().

Using Service(s): Field Artillery

Communicates with: SCR-608-(), SCR-609-(), SCR-610-(), SCR-628-()

Method of Transportation: 1 man, any vehicle.

WEIGHT: 50 lbs.
VOLUME: Approx. 2 cu. ft.

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	Vibrator 6 or 12-volt battery or dry battery	6 or 12-volt battery or dry battery
Frequency Range (KC)	27.0 - 38.9 MC	27.0 - 38.9 MC
Type of Signal	Voice (FM)	Voice (FM)
Range (Miles)	5 miles	

Major Components: Power Unit PE-117-()
Radio Receiver and Transmitter BC-659-(), including 120 quartz crystals in Crystal Holders FT-243



RADIO SET SCR-610-()
Set Up for Operation

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RADIO SET SCR 628-()

RADIO SET SCR-628-()

General Purpose: Same as SCR-608-() but with only one receiver.

Using Service(s): Field Artillery

Communicates with: SCR-608-(), SCR-609-(), SCR-610-(), SCR-628-().

WEIGHT: Approx.
65 lbs.

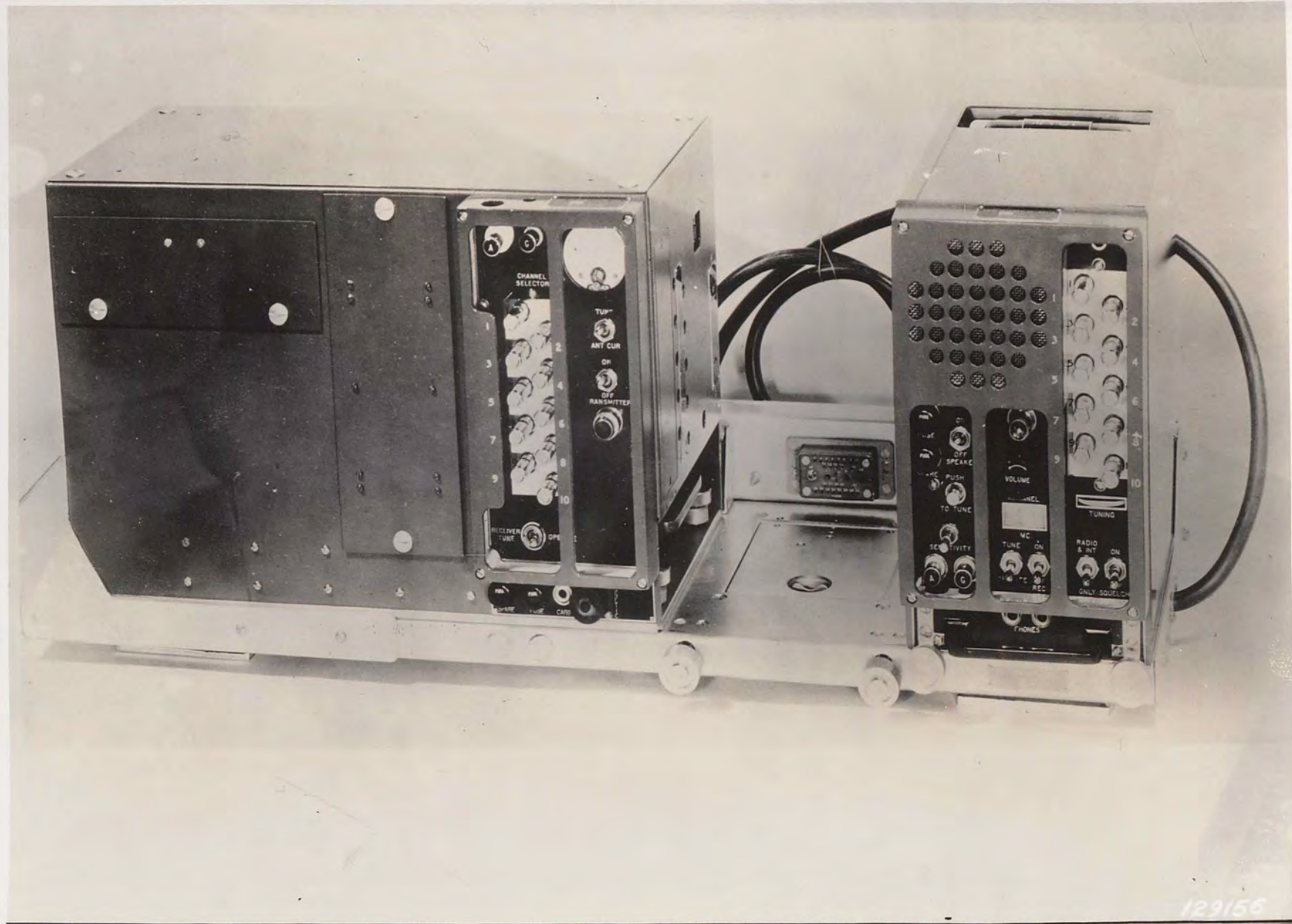
VOLUME: Approx.
2½ cu. ft.

Method of Transportation: Vehicle

CHARACTERISTICS		
	Transmitter	Receiver
Power Supply	6 or 12-volt storage battery	6 or 12-volt storage battery
Frequency Range (KC)	27.0 - 38.9 MC	27.0 - 38.9 MC
Type of Signal	Voice (FM)	Voice (FM)
Range (Miles)	10 moving , 15 stationary	

Major Components: Radio Transmitter BC-684-(), including 120 quartz crystal units Radio Receiver BC-683-() Dynamotor DM-55-() Dynamotor DM-54-() 6-volt operation

Remarks: When operating from a 12-volt supply, Dynamotors DM-34-() and DM-35-() are used in lieu of Dynamotors DM-54-() and DM-55-() respectively.



RADIO SET SCR-628 (Preliminary Model)

Front View