ARC-210 Ancillaries

The AM-7642/ARC and the MX-12366/ARC will enhance the proven performance of the ARC-210 communication system family – compatible with the newly emerging MUOS waveforms as well as legacy UHF SATCOM waveforms.

RADIO FREQUENCY AMPLIFIER - AM-7642/ARC

The Rockwell Collins Radio Frequency Amplifier AM-7642/ARC is part of the most current offering in the ARC-210 Beyond Line of Sight Communication System. The Mobile User Objective System (MUOS) capable AM-7642/ARC provides superior performance for amplification of voice, data and satellite communications (SATCOM) in the Ultra High Frequency (UHF) band.

The AM-7642/ARC retains the same mounting footprint and interfaces as the legacy AM-7526/ARC HPA allowing for ease of integration to existing platforms. Additionally, the new AM-7642/ARC combines the proven performance of legacy equipment with the additional capability of MUOS into one advanced package

LOW NOISE AMPLIFIER AND TRIPLEXER - MX-12366/ARC

The Rockwell Collins Low Noise Amplifier and Triplexer MX-12366/ARC is part of the most current offering in the ARC-210 Beyond Line of Sight Communication System. The Mobile User Objective System (MUOS) capable MX-12366/ARC provides superior performance for transmit to receive isolation and low noise amplification of voice, data, and satellite communications (SATCOM) in the Ultra High Frequency (UHF) band. Additionally, a selectable integrated switch is provided for use with high/low angle antennas.

The MX-12366/ARC retains the same mounting footprint as the legacy MX-11745/ARC and MX-11641/ARC LNA/Diplexer. Furthermore, the MX-12366/ARC operates with legacy UHF and MUOS SATCOM.

Rockwell Collins
Building trust every day

FEATURES

AM-7642/ARC

- Modes of operation
  - Legacy UHF SATCOM, MUOS using WCDMA modulation AM, Have Quick, SATURN, STANAG
- Frequency range (transmit)
  - 280-320 MHz
  - 243-270 MHz
  - 225-400 MHz
- Frequency range (receive)
  - 30-512 MHz
- Full duplex MUOS continuous full-power transmit duty cycle to 55°C
- Same footprint and functional replacement for AM-7526
- Supports MUOS spectrum adaptation

MX-12366/ARC

- Modes of operation
  - Legacy UHF SATCOM (half duplex) MUOS (full duplex when used with AM-7642)
- Frequency range (transmit)
  - 280-320 MHz
- Frequency range (receive)
  - 243-270 MHz
  - 340-380 MHz
  - 280-320 MHz
- Full duplex operation
- Same footprint and functional replacement for MX-11745/ARC
- Integrated hi/lo angle antenna selection

SPECIFICATIONS

AM-7642/ARC

RF output power	125 W FM 125 W average legacy SATCOM 100 W average MUOS SATCOM 40 W AM @ 90% mod
Operating temperature range	-40°C to +71°C
Size max	10.0" x 5.0" x 6.5"
Weight	15.0 lbs max
Power interface	+28 VDC
Qualification testing	MIL-STD 461F, MIL-STD-704F (no isolated DC return) MIL-STD-810F

MX-12366/ARC

Operating temperature range	-40°C to +71°C
Size max	7.38" x 5.55" x 3.15"
Weight	3.0 lbs max
Power interface	+28 VDC
TX insertion loss	1.2 dB max
TX VSWR	<1.5
RX noise figure	3.0 dB max
Full qualification testing	MIL-STD 461F, MIL-STD-704F (no isolated DC return) MIL-STD-810F
RX gain	30 dB min (MUOS) 23.5 dB min (legacy)
RX VSWR	<1.5 (legacy) <1.6 (MUOS)

SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.

Building trust every day.

Rockwell Collins delivers smart communication and aviation electronic solutions to customers worldwide. Backed by a global network of service and support, we stand committed to putting technology and practical innovation to work for you whenever and wherever you need us. In this way, working together, we build trust. Every day.

For more information contact:

Rockwell Collins
400 Collins Road NE
Cedar Rapids, Iowa 52498
800.321.2223
319.295.5100
Fax: 319.378.1172
E-mail: learnmore@rockwellcollins.com
www.rockwellcollins.com/gs

Rockwell Collins
Building trust every day

147-1011-000-GS 06/09 .2M BUS © Copyright 2009, Rockwell Collins, Inc.
All rights reserved. Printed in the USA.