

**United States of America
FEDERAL COMMUNICATIONS COMMISSION
EXPERIMENTAL
SPECIAL TEMPORARY AUTHORIZATION**

EXPERIMENTAL

(Nature of Service)

WQ9XRB

(Call Sign)

XT MO

(Class of Station)

1213-EX-ST-2020

(File Number)

NAME Systems & Technology Research

This Special Temporary Authorization is granted upon the express condition that it may be terminated by the Commission at any time without advance notice or hearing if in its discretion the need for such action arises. Nothing contained herein shall be construed as a finding by the Commission that the authority herein granted is or will be in the public interest beyond the express terms hereof.

This Special Temporary Authorization shall not vest in the grantee any right to operate the station nor any right in the use of the frequencies designated in the authorization beyond the term hereof, nor in any other manner than authorized herein. Neither the authorization nor the right granted hereunder shall be assigned or otherwise transferred in violation of the Communications Act of 1934. This authorization is subject to the right of use of control the Government of the United States conferred by Section 706 of the Communications Act of 1934.

Special Temporary Authority is hereby granted to operate the apparatus described below:

Purpose Of Operation:

Series of technology maturation tests supporting the DARPA Mercury program.

Station Locations

- (1) MOBILE: Fort Devens, MA: R4102, airborne max altitude 4000 ft. MSL, within 2 km, centered around NL 42-29-36; WL 71-40-23
- (2) MOBILE: Mashpee, MA: R4101 Airborne max altitude 9000 ft. MSL, within 0.22 km, centered around NL 41-41-51; WL 70-31-06

Frequency Information

MOBILE: Fort Devens, MA: R4102, airborne max altitude 4000 ft. MSL, within 2 km, centered around NL 42-29-36; WL 71-40-23

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
2.4-2.485 GHz	MO	1M50F7D	17 mW (ERP)	2.1E-6 %

This authorization effective September 01, 2020 and
will expire 3:00 A.M. EST March 01, 2021

**FEDERAL
COMMUNICATIONS
COMMISSION**



Frequency Information

MOBILE: Mashpee, MA: R4101 Airborne max altitude 9000 ft. MSL, within 0.22 km, centered around NL 41-41-51; WL 70-31-06

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
2.4-2.485 GHz	MO	1M50F7D	17 mW (ERP)	2.1E-6 %

Special Conditions:

- (1) FAA concurrence is based upon the understanding that UAS operations will be autonomous, with the controller operating within 2385-2390 MHz as backup.
- (2) UAS must stay within R-4101 and R-4102 perimeters.
- (3) FAA concurrence to this STA shall not be construed as endorsement or approval of this operation. Further development may require a different frequency band as opposed to 2.4-2.485 GHz.