

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

EXPERIMENTAL

(Nature of Service)

WR9XOP

(Call Sign)

XT MO

(Class of Station)

0020-EX-ST-2021

(File Number)

NAME Aerostar Technical Solutions

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:

The purpose of the operation is to conduct high-altitude balloon testing using the mobile networked MIMI(MN-MIMO) radios in the Camden, AL area. The ground station will be a land

Station Locations

- (1) MOBILE: MOEB - Lawrence, TN with 250 mile radius, within 400 km, centered around NL 35-14-03; WL 87-15-28
- (2) MOBILE: MOEA Lawrence, TN max alt of 70,000-ft msl, within 400 km, centered around NL 35-14-03; WL 87-15-28

Frequency Information

MOBILE: MOEB - Lawrence, TN with 250 mile radius, within 400 km, centered around NL 35-14-03; WL 87-15-28

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
2380 MHz	MO	20M0D7W	63 W (ERP)	0.002 %

This authorization effective February 22, 2021 and
will expire 3:00 A.M. EST May 01, 2021

**FEDERAL
COMMUNICATIONS
COMMISSION**



Frequency Information

MOBILE: MOEA Lawrence, TN max alt of 70,000-ft msl, within 400 km, centered around NL 35-14-03; WL 87-15-28

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
2380 MHz	MO	20MOD7W	25 W (ERP)	0.002 %

Special Conditions:

- (1) This frequency assignment in one of the bands 1435-1525, and 2360-2390 MHz was coordinated prior to authorization with the Air Force Spectrum Management Office, Fort Meade, MD, who also coordinated it, as appropriate, with the Aerospace and Flight Test Radio Coordinating Council. Use of this frequency under the authority of this assignment is subject to such further coordination with the Air Force Spectrum Management Office, Fort Meade, MD, as necessary to ensure compatibility with existing uses.
- (2) Licensee should be aware that other stations may be licensed on these frequencies and if any interference occurs, the licensee of this authorization will be subject to immediate shut down.
- (3) MIMO testing via high altitude balloon platform with associated ground station for monitoring and C&C of the airborne platform.
- (4) This request allows for an Eastern extension of flight path from Sulphur Springs, TX to Lawrence, TN. No eastward transmission of data or C&C permitted East of Lawrence, TN.
- (5) This coordination is approved on a strict non-interference basis to current flight test license holders within radio line of sight to the aerial vehicle or ground station.
- (6) AFTRCC further states that this coordination is approved for testing/demo purposes only and AFTRCC will not give favorable operational coordination for this device in the AMT band 2360-2395 MHz.