

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

EXPERIMENTAL

(Nature of Service)

WR9XBC

(Call Sign)

XT FX MO

(Class of Station)

1439-EX-ST-2020

(File Number)

NAME Software Defined Devices Group, LLC

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:

(U) The DoD Defense Advanced Research Projects Agency (DARPA) DyNAMO Program culminates as a field experiment in the October 2020 through March 2021 time frame.

Station Locations

- (1) DELAWARE (DELAWARE), OH - NL 40-16-52; WL 83-06-42
- (2) DELAWARE (DELAWARE), OH - NL 40-16-52; WL 83-06-42
- (3) DELAWARE, OH - NL 40-16-52; WL 83-06-42
- (4) MOBILE: North of Delaware town center bearing 325 40KM, within 50 km, centered around NL 40-34-38; WL 83-23-02
- (5) MOBILE: 50 KM Orbital Profile file 40 NW of Delaware, OH, within 50 km, centered around NL 40-34-38; WL 83-23-02

Frequency Information

DELAWARE (DELAWARE), OH - NL 40-16-52; WL 83-06-42

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
9400-9500 MHz	FX	LON	150 kW (ERP)	3 %

This authorization effective December 04, 2020 and
will expire 3:00 A.M. EST April 01, 2021

**FEDERAL
COMMUNICATIONS
COMMISSION**



Frequency Information

DELAWARE (DELAWARE), OH - NL 40-16-52; WL 83-06-42

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
9400-9450 MHz	FX	2M00L0N	150 kW (ERP)	3 %

DELAWARE, OH - NL 40-16-52; WL 83-06-42

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
1750-1950 MHz	FX	10M0L0N	3 kW (ERP)	1 %
3100-3800 MHz	FX	10M0L0N	3 kW (ERP)	1 %
5500-5900 MHz	FX	10M0L0N	3 kW (ERP)	1 %
9800-10500 MHz	FX	10M0L0N	3 kW (ERP)	1 %
14000-17000 MHz	FX	10M0L0N	3 kW (ERP)	1 %

MOBILE: North of Delaware town center bearing 325 40KM, within 50 km, centered around NL 40-34-38; WL 83-23-02

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
1750-1850 MHz	MO	10M0L0N	2 kW (ERP)	1 %

Frequency Information

MOBILE: North of Delaware town center bearing 325 40KM, within 50 km, centered around NL 40-34-38; WL 83-23-02

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
3100-3800 MHz	MO	10M0L0N	2 kW (ERP)	1 %
9400-9450 MHz	MO	10M0L0N	2 kW (ERP)	1 %
9800-10500 MHz	MO	10M0L0N	4 kW (ERP)	1 %
14000-17000 MHz	MO	10M0L0N 10M0H9D	4 kW (ERP)	1 %

MOBILE: 50 KM Orbital Profile file 40 NW of Delaware, OH, within 50 km, centered around NL 40-34-38; WL 83-23-02

Frequency	Station Class	Emission Designator	Authorized Power	Frequency Tolerance (+/-)
1780-1850 MHz	MO	14M0G1D	25 W (ERP)	1 %
4950-4955 MHz	MO	10M0G1D	20 W (ERP)	1 %

Special Conditions:

- (1) 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.
- (2) In lieu of frequency tolerance, the occupied bandwidth of the emission shall not extend beyond the band limits set forth above.
- (3) Prior to commencing any operations in the frequencies below, the applicant must obtain consent from the following within 100 miles of the contours of the testing area: Broadband PCS licensees (1850-1910 MHz/1930-1990 MHz)

Special Conditions:

- (4) Software Defined Devices Group, LLC should be aware that surface transportation collision avoidance technology uses the band 5850-5925 MHz for crash imminent safety functions. Please see <https://www.transportation.gov/content/safety-band> for more information.
- (5) Software Defined Devices Group, LLC must not transmit in the 15.35-15.4 GHz band on the basis of footnote US246.
- (6) Software Defined Devices Group, LLC must not transmit in the 5600-5650 MHz band or the 15.7-16.2 GHz band in order to avoid causing interference to Air Traffic operations.
- (7) Software Defined Devices Group, LLC shall secure consents from the Advanced Wireless Service licensees prior to accessing to the frequency range from 1750 MHz to 1780 MHz and 1915 MHz to 1920 MHz.
- (8) Software Defined Devices Group, LLC shall coordinate with the Fixed Microwave Service licensees in accordance with 47 C.F.R, Part 101.103(d) prior to operation in the frequency range from 3700 MHz to 3800 MHz.
- (9) Stop buzzer: Dan Hicks at 540-623-7175, danny@sddgllc.com
- (10) Prior to commencing any operations in the 3700-3800 MHz frequency band, the applicant must notify the licensees the test dates and provide a stop buzzer in case of interference.