Robinson+Cole

KENNETH C. BALDWIN

280 Trumbull Street
Hartford, CT 06103-3597
Main (860) 275-8200
Fax (860) 275-8299
kbaldwin@rc.com
Direct (860) 275-8345

Also admitted in Massachusetts and New York

June 8, 2023

Via Electronic Mail and Hand Delivery

Melanie A. Bachman, Esq.
Executive Director/Staff Attorney
Connecticut Siting Council
10 Franklin Square
New Britain, CT 06051

Re: **Notice of Exempt Modification**
New Haven Fireworks Display – Temporary Telecommunications Facility
181 Mitchell Drive, New Haven, Connecticut

Dear Attorney Bachman:

Pursuant to R.C.S.A. Section 16-50j-72(d), this letter will serve as notice that Cellco Partnership d/b/a Verizon Wireless ("Cellco") intends to install a temporary wireless facility (a/k/a "Cell on Wheels" or "COW") for use during this year's New Haven Fireworks show scheduled for July 4, 2023. This filing is in response to a specific request made by the New Haven Police Department to provide improved wireless communication services during this event.

Cellco intends to install the COW in a parking lot adjacent to the Wilbur Cross High School tennis courts, 181 Mitchell Drive in New Haven (the "Property"). Included in Attachment 1 is a letter from the City of New Haven authorizing the filing of this notice. In accordance with R.C.S.A. Section 16-50j-73, a copy of this filing has been sent to Justin Elicker, Mayor for the City of New Haven, Laura Brown, New Haven's Executive Director of the City Plan Department and Rich Fontana, New Haven's Director of Emergency Operations.

The COW that Cellco intends to install at the Property is a trailer-mounted wireless facility with a retractable mast extending to a height of 39 feet above ground level ("AGL"). Cellco will attach six (6) panel antennas to the top of the mast, at centerline heights of 32 feet

AGL, 34 fee AGL and 39 feet AGL. The COW will be powered by an on-board generator located on the trailer. Included in Attachment 2 is a Lease Exhibit for the proposed COW and specifications for the antennas and radios that Cellco intends to use at the Property.

The proposed temporary telecommunications facility satisfies the criteria set forth in R.C.S.A. Section 16-50j-72(d), as a facility that will provide temporary wireless service for an event of State-wide significance. The COW will provide additional network capacity to accommodate increased wireless voice and data services needed during the event. Cellco expects that the COW will be brought to the site immediately prior to the start of the event and will be removed immediately after the event.

The operation of the COW will not result in a total radio frequency (RF) emissions levels that exceed the Federal Communications Commission (FCC) safety standard. Included in Attachment 3 are Far Field Approximation Tables for the frequencies Cellco intends to deploy at this temporary facility. These tables demonstrate that the temporary facility will operate well within the FCC standard.

Finally, in Attachment 4 is a copy of the Town Assessor's parcel map including owner information for the Property. In accordance with R.C.S.A. Section 16-50j-73, a copy of this filing has been sent to Mayor Justin Elicker and Rich Fontana, Director of Emergency Operations. (*See* Attachment 5).

Based on the foregoing, Cellco respectfully requests acknowledgement of this notice for the installation of a temporary wireless facility at the Property. Please feel free to contact me if you have any questions or need any additional information.

Sincerely,

Kenneth C. Baldwin

Attachments
Copy to:
Justin Elicker, Mayor
Laura Brown, Executive Director, City Plan Department
Rich Fontana, Director of Emergency Operations
Aleksey Tyurin, Verizon Wireless
Ziad Cheiban, RF Engineer

ATTACHMENT 1

CITY OF NEW HAVEN
165 Church Street
New Haven, Connecticut 06510

RE: Evidence of Agreement and Landowner's Consent to File for Permits/Approvals to be Granted to Cellco Partnership d/b/a Verizon Wireless

To Whom It May Concern:

The City of New Haven is the owner of certain real property located in the City of New Haven at 181 Mitchell Drive and identified as Map/Block/Lot 183/04433/00100 on the tax map of the City of New Haven ("Subject Property").

Please be advised that City of New Haven has entered into an agreement with Cellco Partnership d/b/a Verizon Wireless ("Applicant") to install a temporary wireless communications facility on a portion of the Subject Property, and permission is hereby granted to Applicant to make application for Building, Zoning, Planning, or any other Land Use or Regulatory Permit(s) required to effectuate the installation of said wireless facility.

The Applicant, or its agent, is hereby authorized to execute the required application(s) regarding this matter. Permission is also hereby granted for public officials and Board, Commission or Council members, as required, to enter upon the Subject Property for the limited purpose of inspecting the specific site and access that are the subject of Applicant's proposed installation.

Sincerely,

CITY OF NEW HAVEN

By Rick Fontana
Name: Rick Fontana
Title: Director Emergency Ops
Date: June 6, 2023

ATTACHMENT 2

PRELIM. SITE COORDINATES:	41° 19' 21.39"N 72° 54' 22.78"W
GROUND ELEVATION:	9'± A.M.S.L.

COORDINATES AND GROUND ELEVATION REFERENCED FROM GOOGLE EARTH PRO ON-LINE SOFTWARE.

LEASE EXHIBIT

THIS LEASE PLAN IS DIAGRAMMATIC IN NATURE AND IS INTENDED TO PROVIDE GENERAL INFORMATION REGARDING THE LOCATION AND SIZE OF THE PROPOSED LESSEE WIRELESS COMMUNICATION FACILITY. THE SITE LAYOUT WILL BE FINALIZED UPON COMPLETION OF SITE SURVEY AND FACILITY DESIGN.

1 / L-1 **SITE LOCATION MAP**
SCALE: 1" = 75'

REV.	DATE	DRAWN BY/CHK'D BY	DESCRIPTION
A	06/06/23	SSP / TJR	LEASE EXHIBIT - ISSUED FOR CLIENT REVIEW

PROFESSIONAL ENGINEER SEAL

CENTEK engineering
Centered on Solutions
www.CentekEng.com
(203) 488-0580
(203) 488-8587 Fax
63-2 North Branford Road, Branford, CT 06405

Cellco Partnership d/b/a Verizon Wireless

NEW HAVEN FIREWORKS CT 23
CELL ON WHEELS
181 MITCHELL DRIVE
NEW HAVEN, CT 06511

DATE:	06/06/23
SCALE:	AS SHOWN
JOB NO.	23010.12

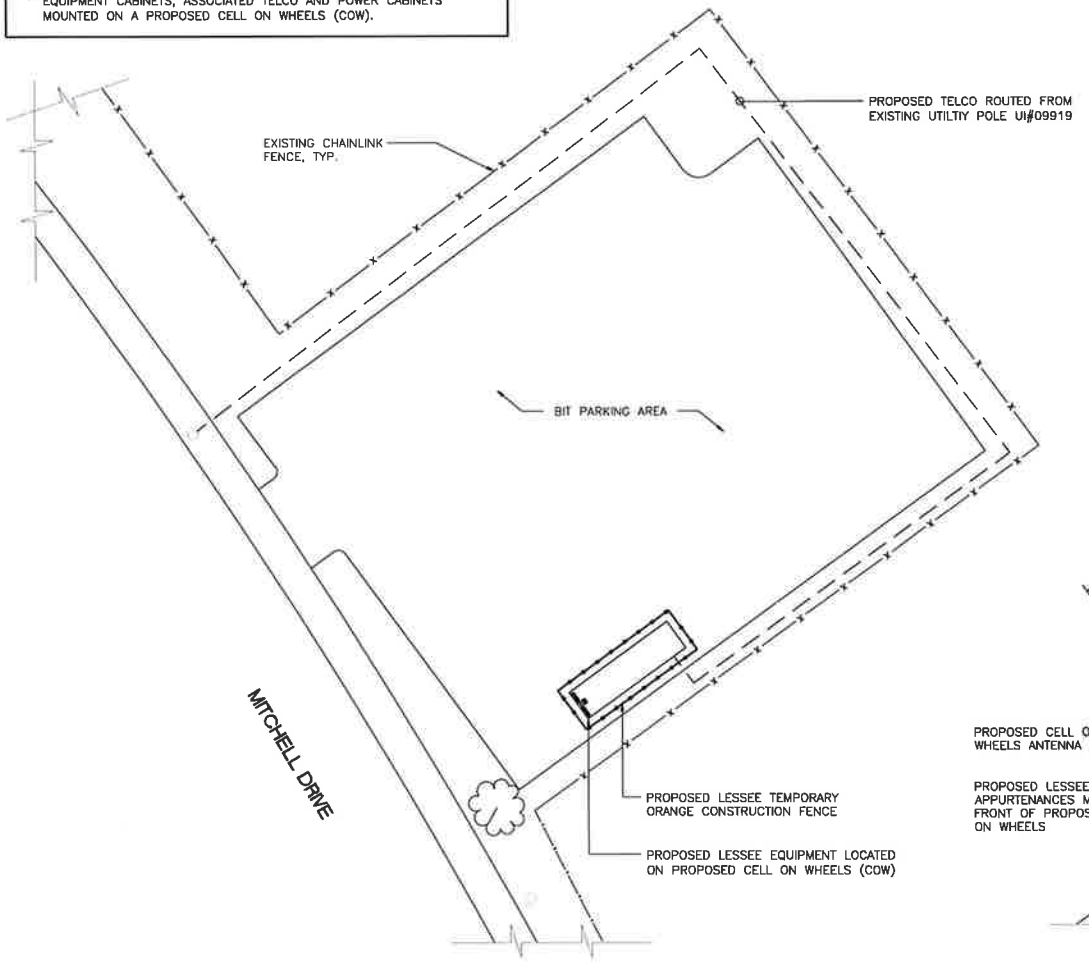
SHEET NO.
L-1

NOTES:

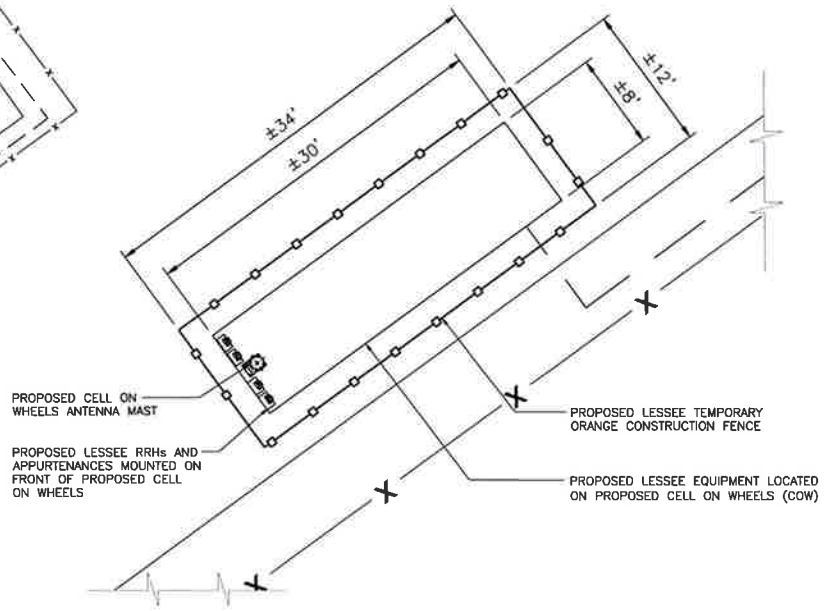
1. THE PROPOSED LESSEE ANTENNA INSTALLATION TO CONSIST OF A TOTAL OF (6) PANEL ANTENNAS, ASSOCIATED RRH APPURTENANCES & CABLING, CABLING TO FOLLOW EXISTING ROUTING PATH.
2. LESSEE POWER AND TELCO UTILITIES SHALL BE ROUTED FROM EXISTING DEMARCS LOCATED WITHIN OR ADJACENT TO THE PROPOSED COMMUNICATIONS FACILITY.
3. THE PROPOSED LESSEE GROUND INSTALLATION TO CONSIST OF EQUIPMENT CABINETS, ASSOCIATED TELCO AND POWER CABINETS MOUNTED ON A PROPOSED CELL ON WHEELS (COW).

LEASE EXHIBIT

THIS LEASE PLAN IS DIAGRAMMATIC IN NATURE AND IS INTENDED TO PROVIDE GENERAL INFORMATION REGARDING THE LOCATION AND SIZE OF THE PROPOSED LESSEE WIRELESS COMMUNICATION FACILITY. THE SITE LAYOUT WILL BE FINALIZED UPON COMPLETION OF SITE SURVEY AND FACILITY DESIGN.



1 / L-2 **PROPOSED PARTIAL SITE PLAN**
SCALE: 1" = 30'-0"
NORTH



2 / L-2 **PROPOSED EQUIPMENT PLAN**
SCALE: 1" = 10'-0"
NORTH

REV.	DATE	DRAWN BY	DESCRIPTION
A	06/08/23	BSP	TJR LEASE EXHIBIT - ISSUED FOR CLIENT REVIEW

PROFESSIONAL ENGINEER SEAL

CENTEK engineering
Centered on Solutions
www.CentekEng.com
(203) 488-0580
(203) 488-8587 Fax
63-2 North Branford Road, Branford, CT 06405

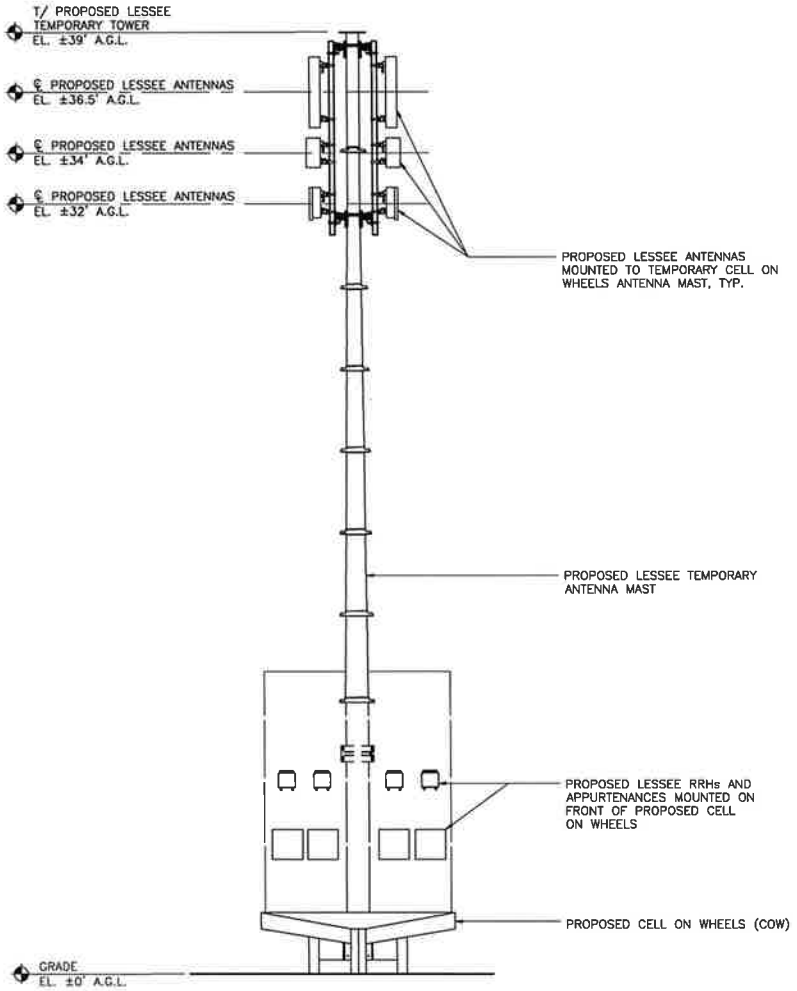
Cellco Partnership d/b/a Verizon Wireless
NEW HAVEN FIREWORKS CT 23
CELL ON WHEELS
181 MITCHELL DRIVE
NEW HAVEN, CT 06511

DATE:	06/08/23
SCALE:	AS SHOWN
JOB NO.	23010.12

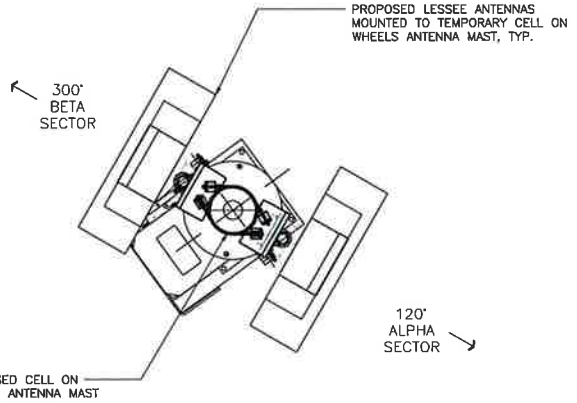
SHEET NO.
L-2

LEASE EXHIBIT

THIS LEASE PLAN IS DIAGRAMMATIC IN NATURE AND IS INTENDED TO PROVIDE GENERAL INFORMATION REGARDING THE LOCATION AND SIZE OF THE PROPOSED LESSEE WIRELESS COMMUNICATION FACILITY. THE SITE LAYOUT WILL BE FINALIZED UPON COMPLETION OF SITE SURVEY AND FACILITY DESIGN.



1 L-3 **PROPOSED ANTENNA MAST ELEVATION**
SCALE: 1" = 5'-0"



2 L-3 **PROPOSED ANTENNA PLAN** NORTH
SCALE: 3/4" = 1'-0"

REV.	DATE	DRAWN BY	CHK'D BY	ISSUE/DESCRIPTION
A	06/08/23	BSP	TJR	LEASE EXHIBIT - RSV/CO FOR CLIENT REVIEW

PROFESSIONAL ENGINEER SEAL

CENTEK engineering
Centered on Solutions
www.CentekEng.com
(203) 488-0580
(203) 488-8587 Fax
63-2 North Branford Road, Branford, CT 06405

Cellco Partnership d/b/a Verizon Wireless
NEW HAVEN FIREWORKS CT 23
CELL ON WHEELS
181 MITCHELL DRIVE
NEW HAVEN, CT 06511

DATE:	06/08/23
SCALE:	AS SHOWN
JOB NO.:	23010.12

SHEET NO.
L-3

SAMSUNG

SAMSUNG C-Band 64T64R Massive MIMO Radio

for High Capacity and Wide Coverage

Samsung C-Band 64T64R Massive MIMO Radio enables mobile operators to increase coverage range, boost data speeds and ultimately offer enriched 5G experiences to users in the U.S..

Model Code : MT6407-77A

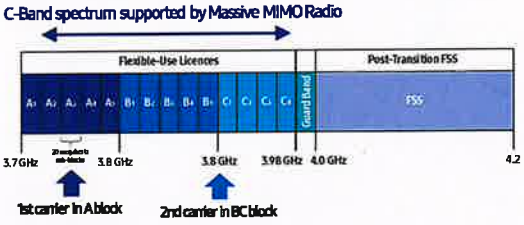
Points of Differentiation

Wide Bandwidth

With capability to support up to 2 CC carrier configuration, Samsung C-Band massive MIMO Radio supports 200 MHz bandwidth in the C-Band spectrum.

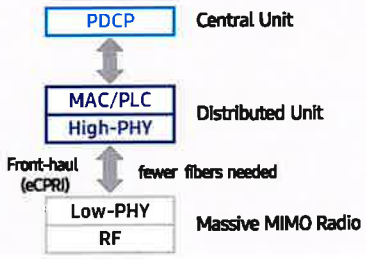
Samsung C-Band massive MIMO Radio covers the entire C-Band 280 MHz spectrum, so it can meet the operator's needs in current A block and future B/C blocks

C-Band spectrum supported by Massive MIMO Radio



Future Proof Product

Samsung C-Band 64T64R Massive MIMO radio supports not only CPRI but also eCPRI as front-haul interface.
It enables operators can cut down on OPEX/CAPEX by reducing front-haul bandwidth through low layer split and using ethernet based higher efficient line.



Enhanced Performance

C-Band massive MIMO Radio creates sharp beams and extends networks' coverage on the critical mid-band spectrum using a large number of antenna elements and high output power to boost data speeds.

This helps operators reduce their CAPEX as they now need less products to cover the same area than before.

Furthermore, as C-Band massive MIMO Radio supports MU-MIMO(Multi-user MIMO) , it enables to increase user throughput by minimizing interference.

Well Matched Design

Samsung C-Band Massive MIMO radio utilizes 64 antennas, supports up to 280MHz bandwidth, and delivers a 200W output power. despite the above advanced performance, the Radio has a compact size of 50.9L and 79.4lbs. This makes it easy to install the Radio.

It is designed to look solid and compact, with a low profile appearance so that, when installed, harmonizes well with the surrounding environment..

Technical Specifications

Item	Specification
Tech	NR
Band	n77
Frequency Band	3700 - 3980 MHz
EIRP	78.5dBm (53.0 dBm+25.5 dBi)
IBW/OBW	280 MHz / 200 MHz
Installation	Pole/Wall
Size/ Weight	16.06 x 35.06 x 5.51 inch (50.86L)/ 79.4 lbs

SAMSUNG

About Samsung Electronics Co., Ltd.

Samsung inspires the world and shapes the future with transformative ideas and technologies. The company is redefining the worlds of TVs, smartphones, wearable devices, tablets, digital appliances, network systems, and memory, system LSI, foundry and LED solutions.

129 Samsung-ro, Yeongtong-gu, Suwon-si Gyeonggi-do, Korea

© 2021 Samsung Electronics Co., Ltd.

All rights reserved. Information in this leaflet is proprietary to Samsung Electronics Co., Ltd. and is subject to change without notice. No information contained here may be copied, translated, transcribed or duplicated by any form without the prior written consent of Samsung Electronics.

SAMSUNG

700/850MHZ MACRO RADIO

DUAL-BAND AND HIGH POWER FOR MACRO COVERAGE

Samsung's future proof dual-band radio is designed to help effectively increase the coverage areas in wireless networks. This 700/850MHz 4T4R dual-band radio has 4Tx/4Rx to 2Tx/2Rx RF chains options and a total output power of 320W, making it ideal for macro sites.

Model Code	RF4440d-13A

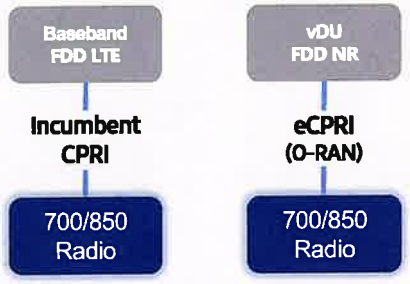
Homepage
samsungnetworks.com

Youtube
www.youtube.com/samsung5g

Points of Differentiation

Continuous Migration

Samsung's 700/850MHz macro radio can support each incumbent CPRI interface as well as an advanced eCPRI interface. This feature provides installable options for both legacy LTE networks and added NR networks.



O-RAN Compliant

A standardized O-RAN radio can help when implementing cost-effective networks because it is capable of sending more data without compromising additional investments.

Samsung's state-of-the-art O-RAN technology will help accelerate the effort toward constructing a solid O-RAN ecosystem.

Optimum Spectrum Utilization

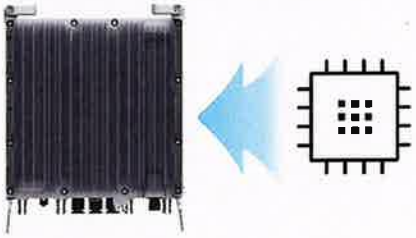
The number of required carriers varies according to site (region). The ability to support many carriers is essential for using all frequencies that the operator has available.

The new 700/850MHz dual-band radio can support up to 2 carriers in the B13 (700MHz) band and 3 carriers in the B5 (850MHz) band, respectively.

Secured Integrity

Access to sensitive data is allowed only to authorized software.

The Samsung radio's CPU can protect root of trust, which is credential information to verify SW integrity, and secure storage provides access control to sensitive data by using dedicated hardware (TPM).



Technical Specifications

Item	Specification
Tech	LTE / NR
Brand	B13(700MHz), B5(850MHz)
Frequency Band	DL: 746 – 756MHz, UL: 777 – 787MHz DL: 869 – 894MHz, UL: 824 – 849MHz
RF Power	(B13) 4 × 40W or 2 × 60W (B5) 4 × 40W or 2 × 60W
IBW/OBW	(B13) 10MHz / 10MHz (B5) 25MHz / 25MHz
Installation	Pole, Wall
Size/ Weight	14.96 x 14.96 x 9.05inch (33.2L) / 70.33 lb

SAMSUNG

AWS/PCS MACRO RADIO

DUAL-BAND AND HIGH POWER FOR MACRO COVERAGE

Samsung's future proof dual-band radio is designed to help effectively increase the coverage areas in wireless networks. This AWS/PCS 4T4R dual-band radio has 4Tx/4Rx to 2Tx/2Rx RF chains options and a total output power of 320W, making it ideal for macro sites.

Model Code RF4439d-25A

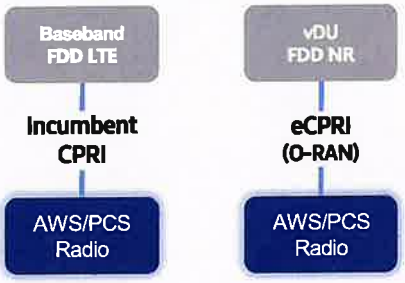
Homepage
samsungnetworks.com

Youtube
www.youtube.com/samsung5g

Points of Differentiation

Continuous Migration

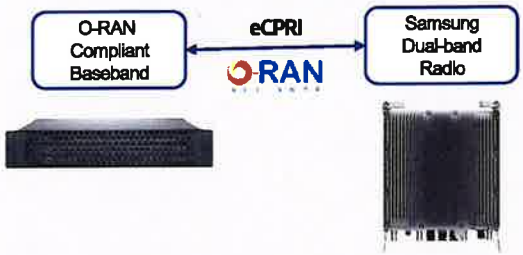
Samsung's AWS/PCS macro radio can support each incumbent CPRI interface as well as advanced eCPRI interfaces. This feature provides installable options for both legacy LTE networks and added NR networks.



O-RAN Compliant

A standardized O-RAN radio can help in implementing cost-effective networks, which are capable of sending more data without compromising additional investments.

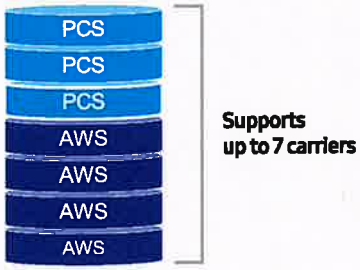
Samsung's state-of-the-art O-RAN technology will help accelerate the effort toward constructing a solid O-RAN ecosystem.



Optimum Spectrum Utilization

The number of required carriers varies according to site (region). Supporting many carriers is essential for using all frequencies that the operator has available.

The new AWS/PCS dual-band radio can support up to 3 carriers in the PCS (1.9GHz) band and 4 carriers in the AWS (2.1GHz) band, respectively.



Brand New Features in a Compact Size

Samsung's AWS/PCS macro radio offers several features, such as dual connectivity for baseband for both CDU and vDU, O-RAN capability, more carriers and an enlarged PCS spectrum, combined into an incumbent radio volume of 36.8L.

- **2 FH connectivity**
- **O-RAN capability**
- **More carriers and spectrum**

Same as an incumbent radio volume

Technical Specifications

Item	Specification
Tech	LTE / NR
Brand	B25(PCS), B66(AWS)
Frequency Band	DL: 1930 – 1995MHz, UL: 1850 – 1915MHz DL: 2110 – 2200MHz, UL: 1710 – 1780MHz
RF Power	(B25) 4 × 40W or 2 × 60W (B66) 4 × 60W or 2 × 80W
IBW/OBW	(B25) 65MHz / 30MHz (B66) DL 90MHz, UL 70MHz / 60MHz
Installation	Pole, Wall
Size/ Weight	14.96 x 14.96 x 10.04inch (36.8L) / 74.7lb

Product Specifications

XGU-MB-134

Antenna Systems Group

JMA WIRELESS

X-pol Dual Band Antenna, 698–960/1695–2700 MHz

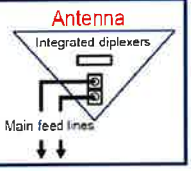
Split Beam 34° Horizontal Pattern

- Split beam, 2-sector MIMO Stadium Antenna reduces sector overlap
- Separate housing and reflector construction optimizes RF performance while maximizing mechanical strength
- Good passive intermodulation (PIM) performance reduces harmful interference
- Perfect for stadium/arena /special event coverage
- Includes flexible stadium bracket
- Suitable for WCS/LTE/CDMA/UMTS/GSM/WiMAX (Neutral Host)
- Optional internal diplexers reduce external cabling and improve aesthetics

Includes integrated diplexers

Reduces mainline cables

Eliminates external tower devices



Electrical specifications

Frequency band, MHz	698–824	824–960	1695–1920	1920–2200	2200–2360	2360–2700
Horizontal beamwidth, 3 dB points	36°	30°	40°	36°	31°	29°
Gain, dBi	9.2	10.6	10.7	10.5	11.2	11.7
Vertical beamwidth, 3dB points	65°	56°	65°	66°	57°	53°
Front-to-back at 180°, dB	> 20		> 28			
Polarization	+/-45°		+/-45°			
Electrical downtilt	0°		0°			
VSWR / return loss, dB, maximum	1.5:1/14		1.5:1/14			
Isolation between ports, dB, minimum	25		25			
Intermodulation (2 x 20 W), IM3, dBc, maximum	-153		-153			
Impedance, ohms	50		50			
Maximum power per connector, CW (W)	250 @ 800 MHz		125 @ 1900 MHz			

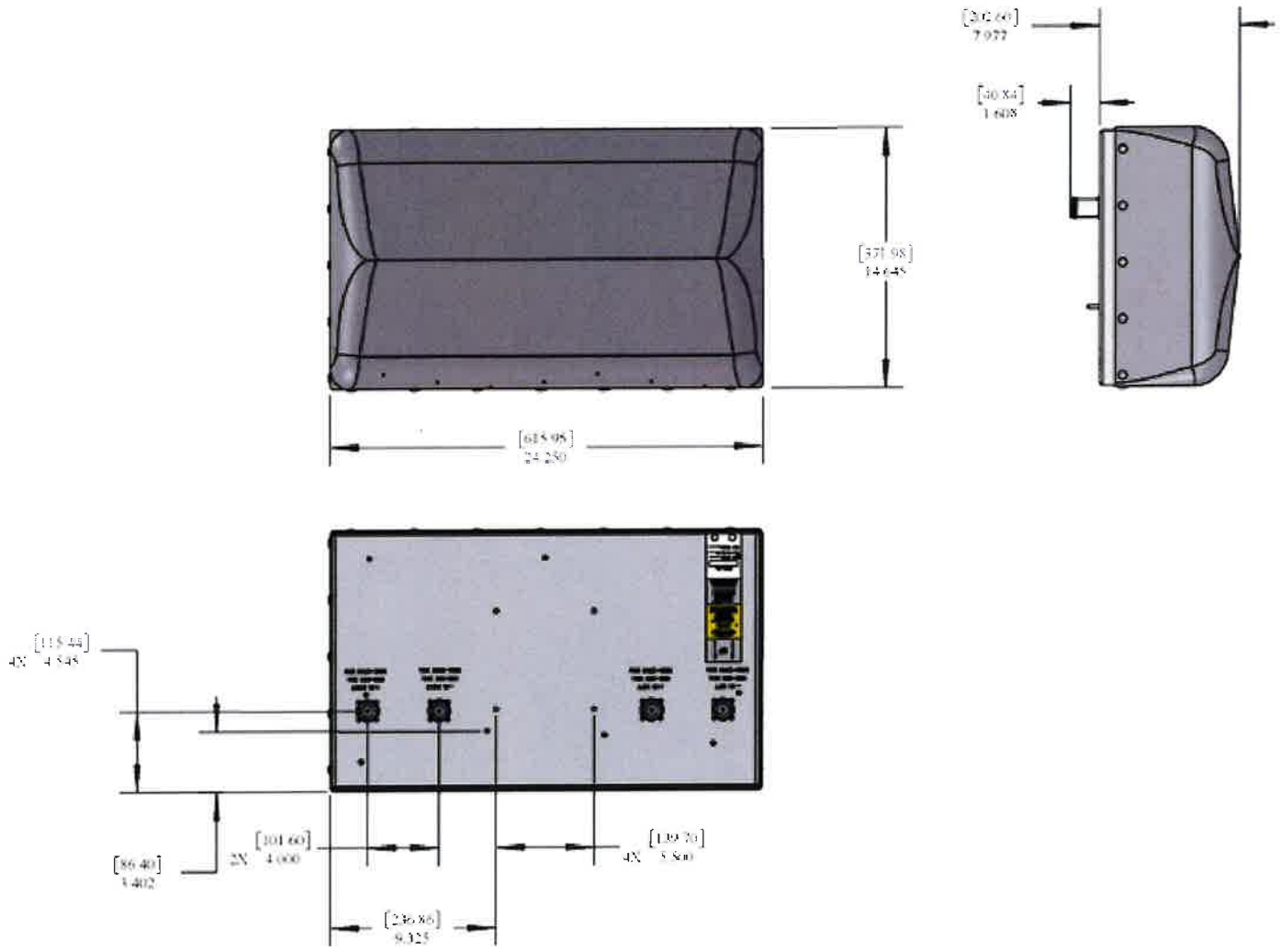
©2018 JMA Wireless. All rights reserved. This document contains proprietary information. All products, company names, brands, and logos are trademarks™ or registered® trademarks of their respective holders. All specifications are subject to change without notice. Revised: October 29, 2018 +1 315.431.7100 customerservice@jmawireless.com

Mechanical specifications	
Dimensions, length/width/depth	14.6/24.3/7.1 in (372.0/616.0/180.6 mm)
Connector (quantity) type	(4 or 8) 7-16 DIN Female
Connector torque	220-265 lbf·in (23-30 Nm)
Connector location	Back
Antenna weight	15.0 lb (6.8 kg)
Bracket weight	5.0 lb (2.3 kg)
Standard bracket kit	P/N 919050 (Included)
Mechanical down tilt range	+/- 35° Lateral & +/- 55° Vertical
Radome material	High Strength Luran, UV Stabilized, ASTM D1925
Wind survival	120 mph (193 km/h)
Front wind load @ 100 mph	59.4 lbf (264.3 N) @100 mph
Equivalent flat plate @ 100 mph	1.18 sq ft (c=2) @ 100 mph

Order information	
Model	**Description**
XGU-MB-134-I	X-Pol dual band, 0° electrical downtilt with four (4) DIN connectors, w/ internal duplexers
919055	Optional inverted mounting kit for 4.0-10.0 in. OD pole.
91900313	Optional bracket kit for extended horizontal and vertical tilt ranges.

©2018 JMA Wireless. All rights reserved. This document contains proprietary information. All products, company names, brands, and logos are trademarks™ or registered® trademarks of their respective holders. All specifications are subject to change without notice. Revised: October 29, 2018 +1 315.431.7100 customerservice@jmawireless.com

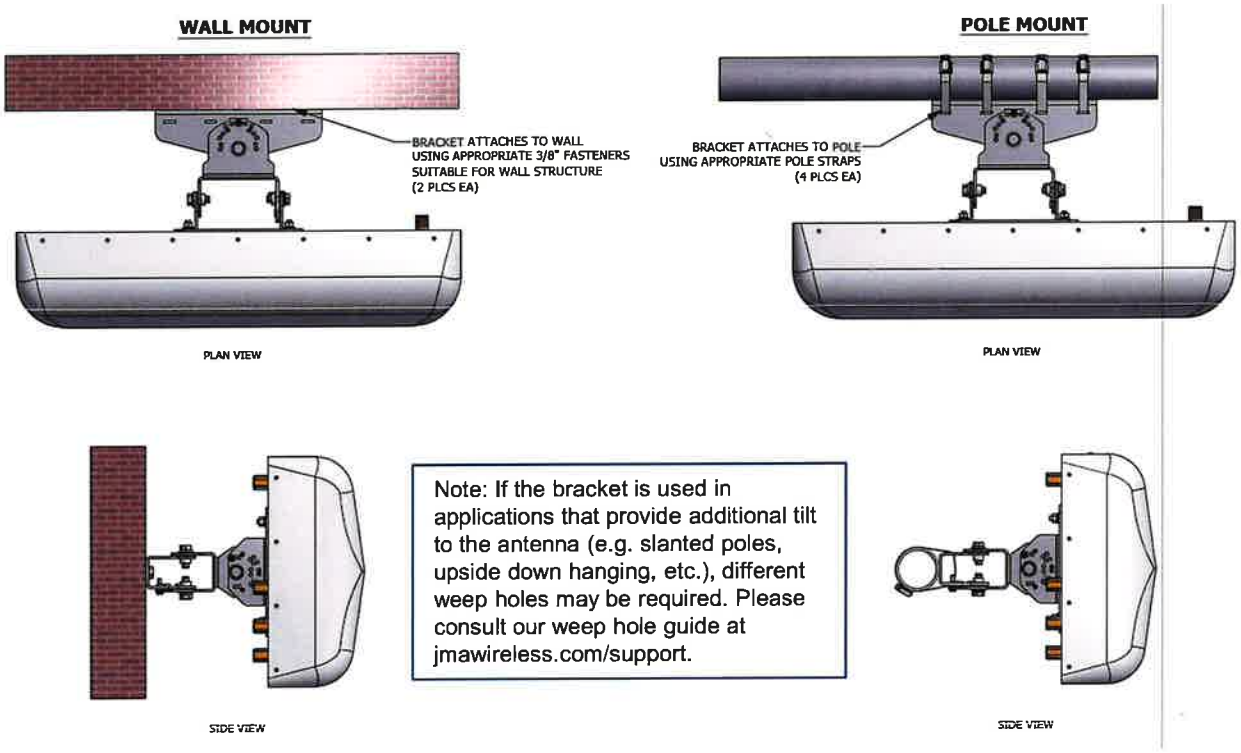
Mechanical Outline Drawing, XGU-MB-134-I (diplexed)



©2018 JMA Wireless. All rights reserved. This document contains proprietary information. All products, company names, brands, and logos are trademarks™ or registered® trademarks of their respective holders. All specifications are subject to change without notice. Revised: October 29, 2018 +1 315.431.7100 customerservice@jmawireless.com

Examples of standard stadium bracket kit 919050 installation

Note: For mounting details, refer to installation drawing, P/N 919050, on the JMA website Antenna Matrix.



Note: If the bracket is used in applications that provide additional tilt to the antenna (e.g. slanted poles, upside down hanging, etc.), different weep holes may be required. Please consult our weep hole guide at jmawireless.com/support.

©2018 JMA Wireless. All rights reserved. This document contains proprietary information. All products, company names, brands, and logos are trademarks™ or registered® trademarks of their respective holders. All specifications are subject to change without notice. Revised: October 29, 2018 +1 315.431.7100 customerservice@jmawireless.com

[CBRS] Clip-on Antenna Specifications

VzW accepted IP45 in FLD, but IP55 is Samsung Spec.

Items	Clip-on Antenna, BASTA**
Antenna Gain	12.5 ± 0.5 dBi (Max 13 dBi)
Horizontal BW (-3dB)	65° ± 5°
Vertical BW (-3dB)	17° ±3°
Electrical Tilt	8° (fixed) ±2°
Front-to-Back Ratio	> 25 dB
Port-to-Port Tracking	< 3 dB
VSWR	< 1.5
Isolation	> 25 dB
Ingress Protection	**IP55**
Size	220(W)×313(H)×34.3(D) mm (*) (8.7 x 12.3 x 1.4 inch.)
Weight	< **2.0** kg [Typ. 1.3 kg]
It is required that the radio should be weatherproofed properly with JMA WPS Boot with external antenna or with Weatherproof Boot for clip-on antennas.	

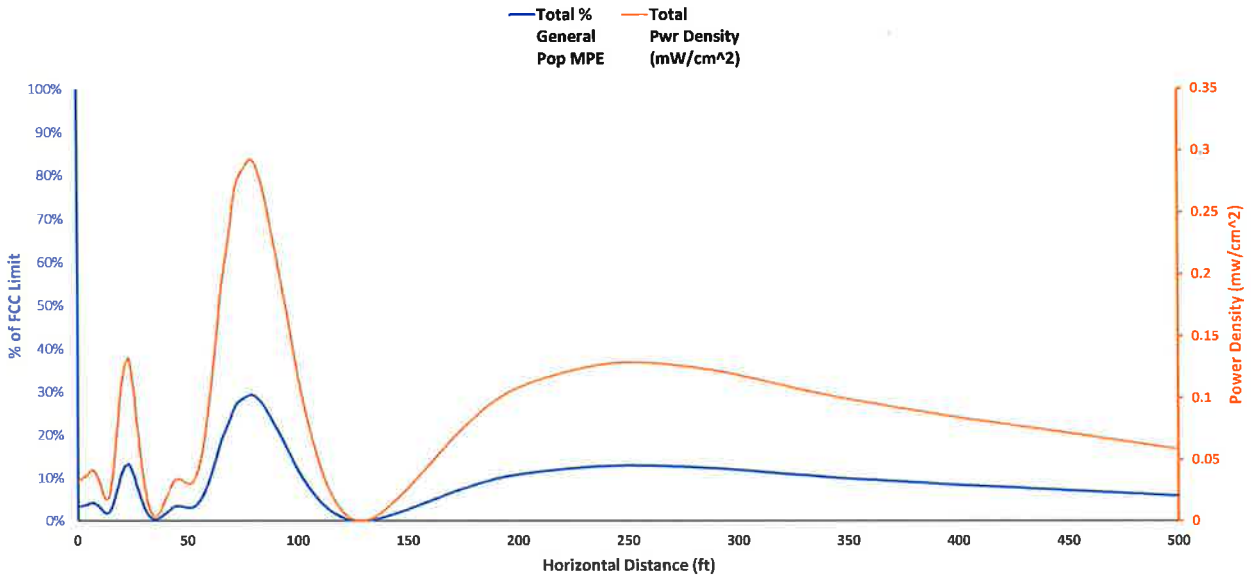
Antenna includes integrated cable with connector
* Design is subject to minor change

** Ant. spec. follows NGMN recommendations on Base Station Antenna Standards (BASTA). For example, 'mean ± tolerance of 86.6%' is applied to double-sided specification of statistical RF parameters.

ATTACHMENT 3

Location	New Haven Fireworks CT - Part 1 of 3
Date	6/7/2023
Band	C-Band
Operating Frequency (MHz)	3,700
General Population MPE (mW/cm^2)	1
ERP Per Transmitter (Watts)	21,878
Number of Transmitters	2
Antenna Centerline (feet)	36.5
Total ERP (Watts)	43,755
Total ERP (dBm)	76
Maximum % of General Population Limit	29.3%

RF Exposure 6ft Above Ground Level
Far Field Formula (per FCC OET65)

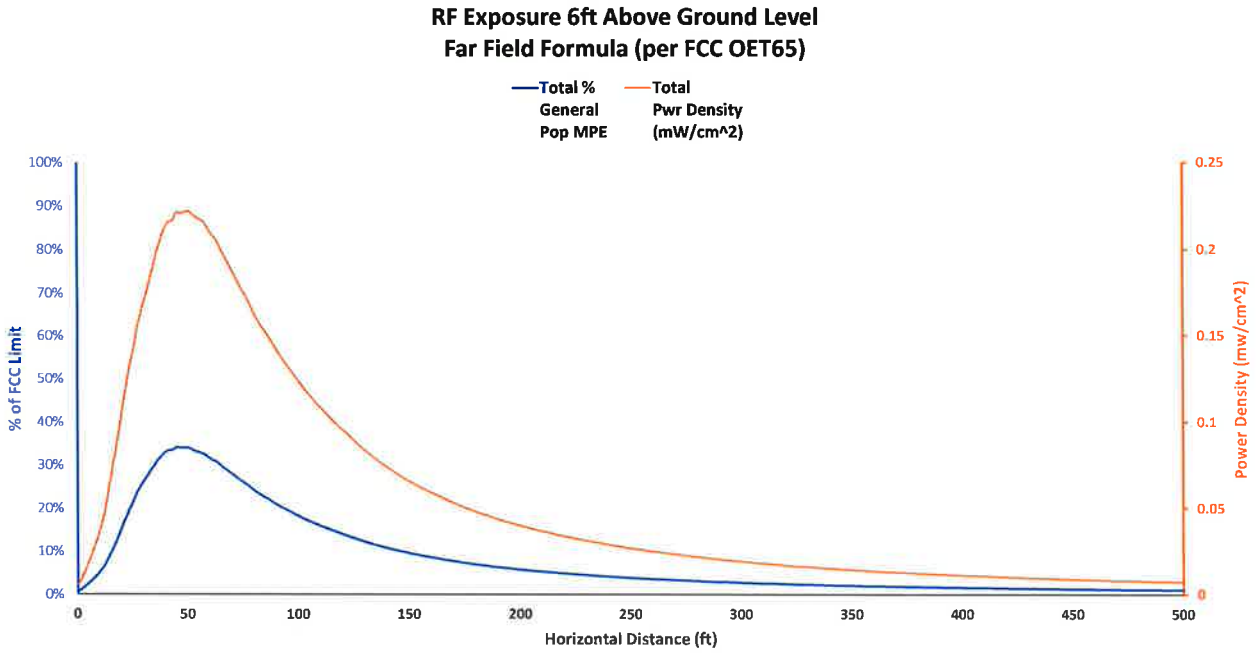


Angle Below Horizon	Power Density (mW/cm^2) C-Band	Percent of General Population MPE 39GHz	28GHz	C-Band	CBRS	AWS	PCS	Cellular	CDMA	700 MHz	Distance	Total Pwr Density (mW/cm^2)	Total % General Pop MPE
90	0.03298179	0.00%	0.00%	3.30%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0	0.03298179	3.30%
89	0.032971745	0.00%	0.00%	3.30%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.53237948	0.032971745	3.30%
88	0.033708928	0.00%	0.00%	3.37%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	1.065083469	0.033708928	3.37%
87	0.034441578	0.00%	0.00%	3.44%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	1.598437268	0.034441578	3.44%
86	0.035168659	0.00%	0.00%	3.52%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	2.132767764	0.035168659	3.52%
85	0.035889109	0.00%	0.00%	3.59%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	2.668404238	0.035889109	3.59%
84	0.036601841	0.00%	0.00%	3.66%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	3.205679176	0.036601841	3.66%

83	0.036456557	0.00%	0.00%	3.65%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	3.744929108	0.036456557	3.65%
82	0.037999666	0.00%	0.00%	3.80%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	4.286495458	0.037999666	3.80%
81	0.03958349	0.00%	0.00%	3.96%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	4.83072543	0.03958349	3.96%
80	0.040269584	0.00%	0.00%	4.03%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	5.377972912	0.040269584	4.03%
79	0.040941842	0.00%	0.00%	4.09%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	5.928599429	0.040941842	4.09%
78	0.041599012	0.00%	0.00%	4.16%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	6.482975131	0.041599012	4.16%
77	0.041278328	0.00%	0.00%	4.13%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	7.041479829	0.041278328	4.13%
76	0.04000207	0.00%	0.00%	4.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	7.604504087	0.04000207	4.00%
75	0.037858359	0.00%	0.00%	3.79%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	8.172450369	0.037858359	3.79%
74	0.036640172	0.00%	0.00%	3.66%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	8.745734266	0.036640172	3.66%
73	0.033842845	0.00%	0.00%	3.38%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	9.324785784	0.033842845	3.38%
72	0.031238263	0.00%	0.00%	3.12%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	9.910050735	0.031238263	3.12%
71	0.027517841	0.00%	0.00%	2.75%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	10.50199221	0.027517841	2.75%
70	0.023672595	0.00%	0.00%	2.37%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	11.10109215	0.023672595	2.37%
69	0.020350623	0.00%	0.00%	2.04%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	11.70785307	0.020350623	2.04%
68	0.018306527	0.00%	0.00%	1.83%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	12.32279989	0.018306527	1.83%
67	0.017633008	0.00%	0.00%	1.76%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	12.94648189	0.017633008	1.76%
66	0.01818589	0.00%	0.00%	1.82%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	13.5794749	0.01818589	1.82%
65	0.020550654	0.00%	0.00%	2.06%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	14.22238357	0.020550654	2.06%
64	0.026643704	0.00%	0.00%	2.66%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	14.87584395	0.026643704	2.66%
63	0.034517235	0.00%	0.00%	3.45%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	15.54052621	0.034517235	3.45%
62	0.044683181	0.00%	0.00%	4.47%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	16.21713767	0.044683181	4.47%
61	0.057797991	0.00%	0.00%	5.78%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	16.90642607	0.057797991	5.78%
60	0.071340392	0.00%	0.00%	7.13%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	17.60918321	0.071340392	7.13%
59	0.082111771	0.00%	0.00%	8.21%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	18.32624888	0.082111771	8.21%
58	0.098881534	0.00%	0.00%	9.89%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	19.05851523	0.098881534	9.89%
57	0.111034268	0.00%	0.00%	11.10%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	19.80693159	0.111034268	11.10%
56	0.118965944	0.00%	0.00%	11.90%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	20.57250976	0.118965944	11.90%
55	0.127351266	0.00%	0.00%	12.74%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	21.35632992	0.127351266	12.74%
54	0.130073707	0.00%	0.00%	13.01%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	22.1595471	0.130073707	13.01%
53	0.132730723	0.00%	0.00%	13.27%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	22.98339853	0.132730723	13.27%
52	0.126281147	0.00%	0.00%	12.63%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	23.82921161	0.126281147	12.63%
51	0.114625018	0.00%	0.00%	11.46%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	24.69841301	0.114625018	11.46%
50	0.103939868	0.00%	0.00%	10.39%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	25.59253875	0.103939868	10.39%
49	0.083913909	0.00%	0.00%	8.39%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	26.5132455	0.083913909	8.39%
48	0.070863263	0.00%	0.00%	7.09%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	27.46232335	0.070863263	7.09%
47	0.053275699	0.00%	0.00%	5.33%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	28.44171013	0.053275699	5.33%
46	0.039096908	0.00%	0.00%	3.91%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	29.45350763	0.039096908	3.91%
45	0.026136308	0.00%	0.00%	2.61%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	30.5	0.026136308	2.61%
44	0.016286088	0.00%	0.00%	1.63%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	31.58367457	0.016286088	1.63%
43	0.009033185	0.00%	0.00%	0.90%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	32.70724566	0.009033185	0.90%
42	0.004889855	0.00%	0.00%	0.49%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	33.8736817	0.004889855	0.49%
41	0.003178045	0.00%	0.00%	0.32%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	35.08623642	0.003178045	0.32%
40	0.004725081	0.00%	0.00%	0.47%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	36.34848457	0.004725081	0.47%
39	0.00863014	0.00%	0.00%	0.86%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	37.66436327	0.00863014	0.86%
38	0.014687849	0.00%	0.00%	1.47%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	39.03821978	0.014687849	1.47%
37	0.020758706	0.00%	0.00%	2.08%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	40.47486706	0.020758706	2.08%
36	0.026712319	0.00%	0.00%	2.67%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	41.97964857	0.026712319	2.67%
35	0.03276852	0.00%	0.00%	3.28%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	43.55851421	0.03276852	3.28%
34	0.034150537	0.00%	0.00%	3.42%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	45.21810954	0.034150537	3.42%
33	0.033922805	0.00%	0.00%	3.39%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	46.9658814	0.033922805	3.39%
32	0.031382941	0.00%	0.00%	3.14%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	48.81020314	0.031382941	3.14%
31	0.030335622	0.00%	0.00%	3.03%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	50.76052421	0.030335622	3.03%
30	0.033590327	0.00%	0.00%	3.36%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	52.82754963	0.033590327	3.36%
29	0.044608404	0.00%	0.00%	4.46%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	55.02345654	0.044608404	4.46%
28	0.064787737	0.00%	0.00%	6.48%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	57.36215719	0.064787737	6.48%
27	0.098257963	0.00%	0.00%	9.83%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	59.85962042	0.098257963	9.83%
26	0.141892079	0.00%	0.00%	14.19%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	62.53426717	0.141892079	14.19%
25	0.190621002	0.00%	0.00%	19.06%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	65.40746108	0.190621002	19.06%
24	0.227457797	0.00%	0.00%	22.75%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	68.5041216	0.227457797	22.75%
23	0.270414672	0.00%	0.00%	27.04%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	71.85349716	0.270414672	27.04%
22	0.285381005	0.00%	0.00%	28.54%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	75.49014903	0.285381005	28.54%
21	0.29304381	0.00%	0.00%	29.30%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	79.45521647	0.29304381	29.30%
20	0.273135153	0.00%	0.00%	27.31%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	83.79806129	0.273135153	27.31%
19	0.230971324	0.00%	0.00%	23.10%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	88.57843177	0.230971324	23.10%
18	0.1812337	0.00%	0.00%	18.12%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	93.86934788	0.1812337	18.12%
17	0.120266565	0.00%	0.00%	12.03%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	99.76100486	0.120266565	12.03%

16	0.067445096	0.00%	0.00%	6.74%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	106.3661405	0.067445096	6.74%
15	0.026562362	0.00%	0.00%	2.66%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	113.8275496	0.026562362	2.66%
14	0.003941165	0.00%	0.00%	0.39%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	122.3288185	0.003941165	0.39%
13	0.001128367	0.00%	0.00%	0.11%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	132.1100142	0.001128367	0.11%
12	0.01563263	0.00%	0.00%	1.56%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	143.4912183	0.01563263	1.56%
11	0.040688522	0.00%	0.00%	4.07%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	156.9088975	0.040688522	4.07%
10	0.072046799	0.00%	0.00%	7.20%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	172.9740955	0.072046799	7.20%
9	0.101610622	0.00%	0.00%	10.16%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	192.5694212	0.101610622	10.16%
8	0.118955585	0.00%	0.00%	11.90%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	217.0187765	0.118955585	11.90%
7	0.128843695	0.00%	0.00%	12.88%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	248.4025661	0.128843695	12.88%
6	0.122107787	0.00%	0.00%	12.21%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	290.1881159	0.122107787	12.21%
5	0.099739284	0.00%	0.00%	9.97%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	348.6165952	0.099739284	9.97%
4	0.075065998	0.00%	0.00%	7.51%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	436.1703208	0.075065998	7.51%
3	0.044246055	0.00%	0.00%	4.42%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	581.974669	0.044246055	4.42%
2	0.020133188	0.00%	0.00%	2.01%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	873.4057251	0.020133188	2.01%
1	0.005152107	0.00%	0.00%	0.52%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	1747.34383	0.005152107	0.52%

Location	New Haven Fireworks CT - Part 2 of 3			
Date	6/7/2023			
Band	AWS	PCS	850-LTE	700
Operating Frequency (MHz)	2,145	1,970	880	746
General Population MPE (mW/cm^2)	1	1	0.586666667	0.497333333
ERP Per Transmitter (Watts)	335	338	351	305
Number of Transmitters	4	4	4	4
Antenna Centerline (feet)	34	34	34	34
Total ERP (Watts)	1,340	1,353	1,403	1,222
Total ERP (dBm)	61	61	61	61
Maximum % of General Population Limit	34.1%			



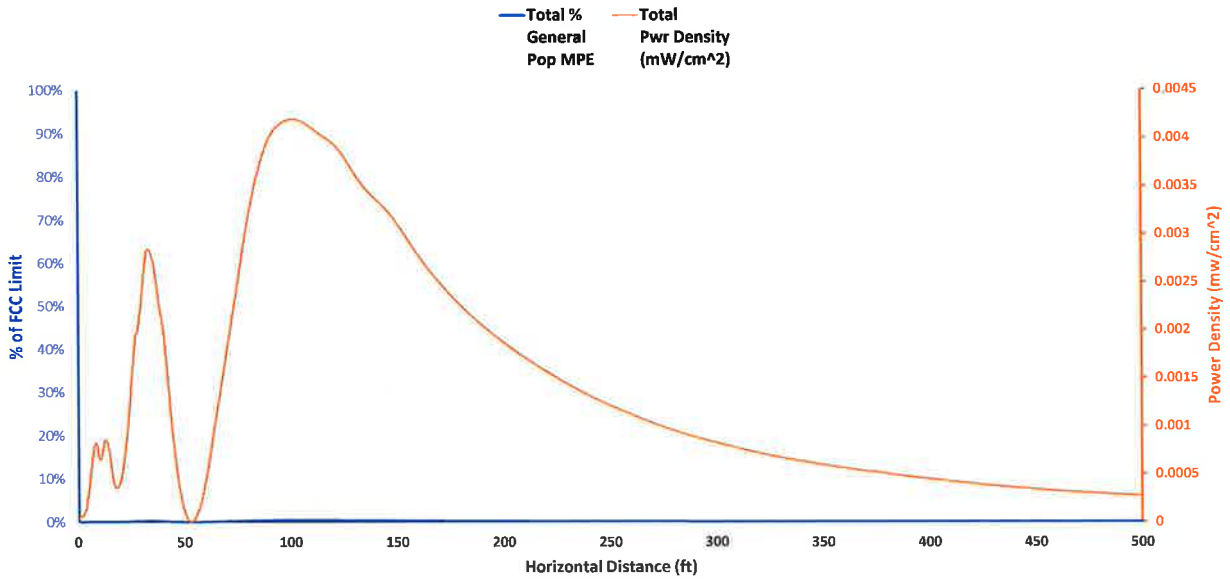
Angle Below Horizon	Power Density (mW/cm^2)				Percent of General Population MPE									Distance	Total Pwr Density (mW/cm^2)	Total % General Pop MPE
	AWS	PCS	850-LTE	700 MHz	39GHz	28GHz	C-Band	CBRS	AWS	PCS	Cellular	CDMA	700 MHz			
90	0.000523111	0.003739493	0.00072208	0.000573568	0.00%	0.00%	0.00%	0.00%	0.05%	0.37%	0.12%	0.00%	0.12%	0	0.005558252	0.66%
89	0.000773502	0.003825432	0.000996445	0.000721859	0.00%	0.00%	0.00%	0.00%	0.08%	0.38%	0.17%	0.00%	0.15%	0.488741818	0.006317237	0.77%
88	0.001117029	0.003910961	0.00131237	0.000907937	0.00%	0.00%	0.00%	0.00%	0.11%	0.39%	0.22%	0.00%	0.18%	0.977781546	0.007248296	0.91%
87	0.001612139	0.003905005	0.001727405	0.001115305	0.00%	0.00%	0.00%	0.00%	0.16%	0.39%	0.29%	0.00%	0.22%	1.46741782	0.008359854	1.07%
86	0.002170078	0.003896676	0.002170036	0.001369198	0.00%	0.00%	0.00%	0.00%	0.22%	0.39%	0.37%	0.00%	0.28%	1.957950734	0.009605988	1.25%
85	0.002787932	0.003885986	0.002662404	0.001641622	0.00%	0.00%	0.00%	0.00%	0.28%	0.39%	0.45%	0.00%	0.33%	2.449682579	0.010977943	1.45%
84	0.003498021	0.003784787	0.003117555	0.001967041	0.00%	0.00%	0.00%	0.00%	0.35%	0.38%	0.53%	0.00%	0.40%	2.942918587	0.012367404	1.66%

83	0.004286424	0.003683954	0.003565224	0.002301899	0.00%	0.00%	0.00%	0.00%	0.43%	0.37%	0.61%	0.00%	0.46%	3.437967705	0.0138375	1.87%
82	0.005129786	0.00358359	0.004074656	0.002692095	0.00%	0.00%	0.00%	0.00%	0.51%	0.36%	0.69%	0.00%	0.54%	3.935143372	0.015480127	2.11%
81	0.005995612	0.003483795	0.004548051	0.003074855	0.00%	0.00%	0.00%	0.00%	0.60%	0.35%	0.78%	0.00%	0.62%	4.434764329	0.017102313	2.34%
80	0.006843789	0.003384665	0.005073275	0.003509843	0.00%	0.00%	0.00%	0.00%	0.68%	0.34%	0.86%	0.00%	0.71%	4.93715546	0.018811571	2.59%
79	0.007807048	0.003138383	0.005526862	0.004003851	0.00%	0.00%	0.00%	0.00%	0.78%	0.31%	0.94%	0.00%	0.81%	5.442648656	0.020476143	2.84%
78	0.008697661	0.002908182	0.005880229	0.004460603	0.00%	0.00%	0.00%	0.00%	0.87%	0.29%	1.00%	0.00%	0.90%	5.951583727	0.021946674	3.06%
77	0.009683705	0.002820075	0.006252206	0.004966296	0.00%	0.00%	0.00%	0.00%	0.97%	0.28%	1.07%	0.00%	1.00%	6.464309352	0.023722282	3.31%
76	0.010529359	0.002609883	0.006798196	0.005399991	0.00%	0.00%	0.00%	0.00%	1.05%	0.26%	1.16%	0.00%	1.09%	6.98118408	0.025337428	3.56%
75	0.011441454	0.002586427	0.007218933	0.006004437	0.00%	0.00%	0.00%	0.00%	1.14%	0.26%	1.23%	0.00%	1.21%	7.502577388	0.027251252	3.84%
74	0.012424444	0.002744707	0.007660705	0.006520307	0.00%	0.00%	0.00%	0.00%	1.24%	0.27%	1.31%	0.00%	1.31%	8.028870801	0.029350162	4.13%
73	0.013176083	0.002910753	0.007758506	0.007240647	0.00%	0.00%	0.00%	0.00%	1.32%	0.29%	1.32%	0.00%	1.46%	8.560459081	0.031085989	4.39%
72	0.013963887	0.00330541	0.008035226	0.00785231	0.00%	0.00%	0.00%	0.00%	1.40%	0.33%	1.37%	0.00%	1.58%	9.097751495	0.033156833	4.68%
71	0.01478883	0.003838423	0.008509922	0.008509909	0.00%	0.00%	0.00%	0.00%	1.48%	0.38%	1.45%	0.00%	1.71%	9.641173172	0.035647084	5.02%
70	0.015295558	0.004253871	0.008801508	0.009430971	0.00%	0.00%	0.00%	0.00%	1.53%	0.43%	1.50%	0.00%	1.90%	10.19116656	0.037781908	5.35%
69	0.016176969	0.004933058	0.009096806	0.010206768	0.00%	0.00%	0.00%	0.00%	1.62%	0.49%	1.55%	0.00%	2.05%	10.74819298	0.0404136	5.71%
68	0.016708036	0.005459394	0.009614289	0.011295787	0.00%	0.00%	0.00%	0.00%	1.67%	0.55%	1.64%	0.00%	2.27%	11.31273432	0.043077506	6.13%
67	0.017645982	0.006037608	0.009697005	0.012207787	0.00%	0.00%	0.00%	0.00%	1.76%	0.60%	1.65%	0.00%	2.45%	11.88529485	0.045588382	6.48%
66	0.019056977	0.006827678	0.010234008	0.013491029	0.00%	0.00%	0.00%	0.00%	1.91%	0.68%	1.74%	0.00%	2.71%	12.46640319	0.049609693	7.05%
65	0.020565776	0.007539875	0.010792868	0.014559156	0.00%	0.00%	0.00%	0.00%	2.06%	0.75%	1.84%	0.00%	2.93%	13.05661443	0.053457675	7.58%
64	0.022177575	0.008320187	0.011373806	0.016065903	0.00%	0.00%	0.00%	0.00%	2.22%	0.83%	1.94%	0.00%	3.23%	13.65651248	0.057937471	8.22%
63	0.024454312	0.009388031	0.011976977	0.017311972	0.00%	0.00%	0.00%	0.00%	2.45%	0.94%	2.04%	0.00%	3.48%	14.26671259	0.063131291	8.91%
62	0.025731407	0.009878308	0.012602459	0.018640374	0.00%	0.00%	0.00%	0.00%	2.57%	0.99%	2.15%	0.00%	3.75%	14.88786409	0.066852548	9.46%
61	0.027054044	0.01087555	0.013558885	0.02052217	0.00%	0.00%	0.00%	0.00%	2.71%	1.09%	2.31%	0.00%	4.13%	15.52065344	0.072010649	10.23%
60	0.02842202	0.011963934	0.01457628	0.022062058	0.00%	0.00%	0.00%	0.00%	2.84%	1.20%	2.48%	0.00%	4.44%	16.16580754	0.077024292	10.96%
59	0.028492127	0.012851207	0.015657291	0.023698232	0.00%	0.00%	0.00%	0.00%	2.85%	1.29%	2.67%	0.00%	4.77%	16.82409733	0.080698858	11.57%
58	0.029203483	0.014114117	0.017195959	0.025434648	0.00%	0.00%	0.00%	0.00%	2.92%	1.41%	2.93%	0.00%	5.11%	17.49634185	0.085948207	12.38%
57	0.02990725	0.015848769	0.018440311	0.027275176	0.00%	0.00%	0.00%	0.00%	2.99%	1.58%	3.14%	0.00%	5.48%	18.18341261	0.091471507	13.20%
56	0.029904883	0.017376454	0.020217799	0.029223565	0.00%	0.00%	0.00%	0.00%	2.99%	1.74%	3.45%	0.00%	5.88%	18.88623847	0.096722701	14.05%
55	0.03057192	0.019034513	0.021642852	0.03128339	0.00%	0.00%	0.00%	0.00%	3.06%	1.90%	3.69%	0.00%	6.29%	19.60581107	0.102532674	14.94%
54	0.031225469	0.020831859	0.023686491	0.033458006	0.00%	0.00%	0.00%	0.00%	3.12%	2.08%	4.04%	0.00%	6.73%	20.34319078	0.109201825	15.97%
53	0.031138014	0.022259221	0.025898981	0.03575049	0.00%	0.00%	0.00%	0.00%	3.11%	2.23%	4.41%	0.00%	7.19%	21.0995134	0.115046706	16.94%
52	0.031021155	0.023761673	0.028291093	0.037294866	0.00%	0.00%	0.00%	0.00%	3.10%	2.38%	4.82%	0.00%	7.50%	21.87599754	0.120368788	17.80%
51	0.030874424	0.02534066	0.030171065	0.039773147	0.00%	0.00%	0.00%	0.00%	3.09%	2.53%	5.14%	0.00%	8.00%	22.67395293	0.126159295	18.76%
50	0.030697401	0.026382787	0.032892235	0.04237334	0.00%	0.00%	0.00%	0.00%	3.07%	2.64%	5.61%	0.00%	8.52%	23.49478967	0.132345762	19.83%
49	0.030489718	0.027439264	0.035006216	0.044070146	0.00%	0.00%	0.00%	0.00%	3.05%	2.74%	5.97%	0.00%	8.86%	24.34002866	0.137005344	20.62%
48	0.03025106	0.028507534	0.038083106	0.045785892	0.00%	0.00%	0.00%	0.00%	3.03%	2.85%	6.49%	0.00%	9.21%	25.21131324	0.142627592	21.57%
47	0.029981172	0.029584733	0.040442721	0.048622769	0.00%	0.00%	0.00%	0.00%	3.00%	2.96%	6.89%	0.00%	9.78%	26.11042241	0.148631396	22.63%
46	0.031078629	0.030667679	0.043898899	0.0504026	0.00%	0.00%	0.00%	0.00%	3.11%	3.07%	7.48%	0.00%	10.13%	27.03928569	0.156047808	23.79%
45	0.030730079	0.031030069	0.046510976	0.052186091	0.00%	0.00%	0.00%	0.00%	3.07%	3.10%	7.93%	0.00%	10.49%	28	0.160457215	24.60%
44	0.031055335	0.0313585	0.049218457	0.05396688	0.00%	0.00%	0.00%	0.00%	3.11%	3.14%	8.39%	0.00%	10.85%	28.99484879	0.165599172	25.48%
43	0.031344427	0.031650414	0.052017815	0.055738006	0.00%	0.00%	0.00%	0.00%	3.13%	3.17%	8.87%	0.00%	11.21%	30.02632388	0.170750662	26.37%
42	0.03159479	0.03190322	0.053654634	0.057491886	0.00%	0.00%	0.00%	0.00%	3.16%	3.19%	9.15%	0.00%	11.56%	31.09715042	0.17464453	27.06%
41	0.032544643	0.032114308	0.056555035	0.059220299	0.00%	0.00%	0.00%	0.00%	3.25%	3.21%	9.64%	0.00%	11.91%	32.2103154	0.180434285	28.01%
40	0.033475623	0.032281055	0.059527883	0.06091437	0.00%	0.00%	0.00%	0.00%	3.35%	3.23%	10.15%	0.00%	12.25%	33.36910059	0.186198932	28.97%
39	0.035183358	0.032400845	0.061140509	0.062564557	0.00%	0.00%	0.00%	0.00%	3.52%	3.24%	10.42%	0.00%	12.58%	34.57712038	0.191289269	29.76%
38	0.036921355	0.033227425	0.064160746	0.064160645	0.00%	0.00%	0.00%	0.00%	3.69%	3.32%	10.94%	0.00%	12.90%	35.8383657	0.198470171	30.85%
37	0.038682963	0.033245953	0.06569185	0.065691747	0.00%	0.00%	0.00%	0.00%	3.87%	3.32%	11.20%	0.00%	13.21%	37.15725501	0.203312513	31.60%
36	0.041402927	0.033208564	0.068710454	0.065617871	0.00%	0.00%	0.00%	0.00%	4.14%	3.32%	11.71%	0.00%	13.19%	38.53869377	0.208939816	32.37%
35	0.043229109	0.033112756	0.070108076	0.066952588	0.00%	0.00%	0.00%	0.00%	4.32%	3.31%	11.95%	0.00%	13.46%	39.98814419	0.213402529	33.05%
34	0.045052301	0.032956117	0.071401732	0.066635869	0.00%	0.00%	0.00%	0.00%	4.51%	3.30%	12.17%	0.00%	13.40%	41.51170712	0.21604602	33.37%
33	0.045794277	0.03199118	0.072577662	0.066191511	0.00%	0.00%	0.00%	0.00%	4.58%	3.20%	12.37%	0.00%	13.31%	43.11621899	0.21655463	33.46%
32	0.048642187	0.031712622	0.073621534	0.067143531	0.00%	0.00%	0.00%	0.00%	4.86%	3.17%	12.55%	0.00%	13.50%	44.80936681	0.221119874	34.09%
31	0.04923482	0.0306543	0.074518502	0.066414581	0.00%	0.00%	0.00%	0.00%	4.92%	3.07%	12.70%	0.00%	13.35%	46.59982551	0.220822203	34.05%
30	0.052063539	0.030251906	0.07354031	0.065542767	0.00%	0.00%	0.00%	0.00%	5.21%	3.03%	12.54%	0.00%	13.18%	48.49742261	0.221398522	33.95%
29	0.053670561	0.029782091	0.074084594	0.064524882	0.00%	0.00%	0.00%	0.00%	5.37%	2.98%	12.63%	0.00%	12.97%	50.51333715	0.222062129	33.95%
28	0.055183884	0.029924804	0.072745147	0.061916065	0.00%	0.00%	0.00%	0.00%	5.52%	2.99%	12.40%	0.00%	12.45%	52.66034103	0.219769899	33.36%
27	0.056583161	0.029302607	0.071232629	0.060628705	0.00%	0.00%	0.00%	0.00%	5.66%	2.93%	12.14%	0.00%	12.19%	54.95309415	0.217747103	32.92%
26	0.057846569	0.029274983	0.069545554	0.059192773	0.00%	0.00%	0.00%	0.00%	5.78%	2.93%	11.85%	0.00%	11.90%	57.40850756	0.215859878	32.47%
25	0.057608982	0.028491102	0.067683368	0.056296485	0.00%	0.00%	0.00%	0.00%	5.76%	2.85%	11.54%	0.00%	11.32%	60.04619377	0.210079937	31.47%
24	0.057176857	0.028277391	0.065646571	0.054602354	0.00%	0.00%	0.00%	0.00%	5.72%	2.83%	11.19%	0.00%	10.98%	62.88902967	0.205703172	30.71%
23	0.055252216	0.02732554	0.063436829	0.05156331	0.00%	0.00%	0.00%	0.00%	5.53%	2.73%	10.81%	0.00%	10.37%	65.96386624	0.197577895	29.44%
22	0.053179532	0.02691309	0.061057115	0.048499314	0.00%	0.00%	0.00%	0.00%	5.32%	2.69%	10.41%	0.00%	9.75%	69.3024319	0.189649051	28.17%
21	0.05096265	0.025791171	0.05717995	0.046477535	0.00%	0.00%	0.00%	0.00%	5.10%	2.58%	9.75%	0.00%	9.35%	72.94249381	0.180411305	26.77%
20	0.048606802	0.024598923	0.054536695	0.043319969	0.00%	0.00%	0.00%	0.00%	4.86%	2.46%	9.30%	0.00%	8.71%	76.92936774	0.171062389	25.33%
19	0.045068958	0.02333977	0.050567244	0.040166926	0.00%	0.00%	0.00%	0.00%	4.51%	2.33%	8.62%	0.00%	8.08%	81.31790457	0.159142897	23.54%
18	0.042516588	0.022530844	0.047703492	0.03702964	0.00%	0.00%	0.00%	0.00%	4.25%	2.25%	8.13%	0.00%	7.45%	86.17513904	0.149780564	22.08%
17	0.039853306	0.021119489	0.043697453	0.033919969	0.00%	0.00%	0.00%	0.00%	3.99%	2.11%	7.45%	0.00%	6.82%	91.58387332	0.138590218	20.37%

16	0.036246813	0.020113557	0.039743087	0.031569006	0.00%	0.00%	0.00%	0.00%	3.62%	2.01%	6.77%	0.00%	6.35%	97.64760443	0.127672463	18.76%
15	0.03270289	0.019002257	0.035857327	0.028482442	0.00%	0.00%	0.00%	0.00%	3.27%	1.90%	6.11%	0.00%	5.73%	104.4974226	0.116044916	17.01%
14	0.029237756	0.017384535	0.032804679	0.025464498	0.00%	0.00%	0.00%	0.00%	2.92%	1.74%	5.59%	0.00%	5.12%	112.3018661	0.104891468	15.37%
13	0.025868411	0.016106041	0.029024284	0.022529981	0.00%	0.00%	0.00%	0.00%	2.59%	1.61%	4.95%	0.00%	4.53%	121.2813245	0.093528716	13.67%
12	0.022612652	0.0144069	0.02479381	0.019694392	0.00%	0.00%	0.00%	0.00%	2.26%	1.44%	4.23%	0.00%	3.96%	131.7296431	0.081507754	11.89%
11	0.019045456	0.012706046	0.021368948	0.016973932	0.00%	0.00%	0.00%	0.00%	1.90%	1.27%	3.64%	0.00%	3.41%	144.0475124	0.070094381	10.23%
10	0.016141138	0.011275951	0.018110311	0.014058055	0.00%	0.00%	0.00%	0.00%	1.61%	1.13%	3.09%	0.00%	2.83%	158.7958909	0.059585454	8.66%
9	0.013099616	0.009582473	0.015040086	0.011674805	0.00%	0.00%	0.00%	0.00%	1.31%	0.96%	2.56%	0.00%	2.35%	176.7850424	0.049396981	7.18%
8	0.010609729	0.00812687	0.011904086	0.009455737	0.00%	0.00%	0.00%	0.00%	1.06%	0.81%	2.03%	0.00%	1.90%	199.2303522	0.040096422	5.80%
7	0.008324969	0.006525318	0.009340592	0.007419484	0.00%	0.00%	0.00%	0.00%	0.83%	0.65%	1.59%	0.00%	1.49%	228.0417	0.031610363	4.57%
6	0.006267045	0.005143774	0.006871548	0.005585395	0.00%	0.00%	0.00%	0.00%	0.63%	0.51%	1.17%	0.00%	1.12%	266.4022047	0.023867762	3.44%
5	0.004458468	0.003831817	0.004777244	0.003883084	0.00%	0.00%	0.00%	0.00%	0.45%	0.38%	0.81%	0.00%	0.78%	320.0414645	0.016950614	2.42%
4	0.002922555	0.002570288	0.003131515	0.002545387	0.00%	0.00%	0.00%	0.00%	0.29%	0.26%	0.53%	0.00%	0.51%	400.4186552	0.011169745	1.59%
3	0.001645106	0.001515001	0.00176273	0.001432798	0.00%	0.00%	0.00%	0.00%	0.16%	0.15%	0.30%	0.00%	0.29%	534.2718273	0.006355636	0.90%
2	0.000748569	0.000705425	0.000783833	0.000651963	0.00%	0.00%	0.00%	0.00%	0.07%	0.07%	0.13%	0.00%	0.13%	801.8150919	0.002889791	0.41%
1	0.000187199	0.000180519	0.000196018	0.00016304	0.00%	0.00%	0.00%	0.00%	0.02%	0.02%	0.03%	0.00%	0.03%	1604.118926	0.000726777	0.10%

Location	New Haven Fireworks CT - Part 3 of 3
Date	6/7/2023
Band	CBRS
Operating Frequency (MHz)	3,550
General Population MPE (mW/cm^2)	1
ERP Per Transmitter (Watts)	53
Number of Transmitters	4
Antenna Centerline (feet)	32
Total ERP (Watts)	213
Total ERP (dBm)	53
Maximum % of General Population Limit	0.4%

RF Exposure 6ft Above Ground Level
Far Field Formula (per FCC OET65)



Angle Below Horizon	Power Density (mW/cm^2) CBRS	Percent of General Population MPE 39GHz	28GHz	C-Band	CBRS	AWS	PCS	Cellular	CDMA	700 MHz	Distance	Total Pwr Density (mW/cm^2)	Total % General Pop MPE
90	4.11953E-05	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0	4.11953E-05	0.00%
89	4.95125E-05	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.453831688	4.95125E-05	0.00%
88	5.30051E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	0.907940007	5.30051E-05	0.01%
87	5.80305E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	1.362602261	5.80305E-05	0.01%
86	6.34934E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	1.818097111	6.34934E-05	0.01%
85	7.27002E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	2.274705252	7.27002E-05	0.01%
84	8.71116E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	2.732710117	8.71116E-05	0.01%

83	0.00011977	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	3.192398583	0.00011977	0.01%
82	0.000168404	0.00%	0.00%	0.00%	0.02%	0.00%	0.00%	0.00%	0.00%	0.00%	3.654061702	0.000168404	0.02%
81	0.000231253	0.00%	0.00%	0.00%	0.02%	0.00%	0.00%	0.00%	0.00%	0.00%	4.117995448	0.000231253	0.02%
80	0.000303075	0.00%	0.00%	0.00%	0.03%	0.00%	0.00%	0.00%	0.00%	0.00%	4.584501498	0.000303075	0.03%
79	0.000387918	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	5.053888038	0.000387918	0.04%
78	0.000484904	0.00%	0.00%	0.00%	0.05%	0.00%	0.00%	0.00%	0.00%	0.00%	5.526470603	0.000484904	0.05%
77	0.000565321	0.00%	0.00%	0.00%	0.06%	0.00%	0.00%	0.00%	0.00%	0.00%	6.002572969	0.000565321	0.06%
76	0.000658651	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	6.482528074	0.000658651	0.07%
75	0.000732377	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	6.966679003	0.000732377	0.07%
74	0.000795299	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	7.45538003	0.000795299	0.08%
73	0.000824214	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	7.948997718	0.000824214	0.08%
72	0.000815192	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	8.447912102	0.000815192	0.08%
71	0.000769462	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	8.952517946	0.000769462	0.08%
70	0.000693137	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	9.463226091	0.000693137	0.07%
69	0.000653357	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	9.980464911	0.000653357	0.07%
68	0.000659446	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	10.50468187	0.000659446	0.07%
67	0.000712688	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	11.03634522	0.000712688	0.07%
66	0.000769675	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	11.57594582	0.000769675	0.08%
65	0.000830613	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	12.12399911	0.000830613	0.08%
64	0.000855397	0.00%	0.00%	0.00%	0.09%	0.00%	0.00%	0.00%	0.00%	0.00%	12.6810473	0.000855397	0.09%
63	0.000840638	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	13.24766169	0.000840638	0.08%
62	0.000788346	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	13.82444522	0.000788346	0.08%
61	0.00073873	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	14.41203534	0.00073873	0.07%
60	0.000645518	0.00%	0.00%	0.00%	0.06%	0.00%	0.00%	0.00%	0.00%	0.00%	15.011107	0.000645518	0.06%
59	0.000538243	0.00%	0.00%	0.00%	0.05%	0.00%	0.00%	0.00%	0.00%	0.00%	15.62237609	0.000538243	0.05%
58	0.000438216	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	16.24660315	0.000438216	0.04%
57	0.000373276	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	16.88459742	0.000373276	0.04%
56	0.000356448	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	17.53722144	0.000356448	0.04%
55	0.000356104	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	18.20539599	0.000356104	0.04%
54	0.000380858	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	18.89010573	0.000380858	0.04%
53	0.000416432	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	19.5924053	0.000416432	0.04%
52	0.000487429	0.00%	0.00%	0.00%	0.05%	0.00%	0.00%	0.00%	0.00%	0.00%	20.31342629	0.000487429	0.05%
51	0.000583247	0.00%	0.00%	0.00%	0.06%	0.00%	0.00%	0.00%	0.00%	0.00%	21.05438486	0.000583247	0.06%
50	0.000713436	0.00%	0.00%	0.00%	0.07%	0.00%	0.00%	0.00%	0.00%	0.00%	21.81659041	0.000713436	0.07%
49	0.00087178	0.00%	0.00%	0.00%	0.09%	0.00%	0.00%	0.00%	0.00%	0.00%	22.60145518	0.00087178	0.09%
48	0.001039906	0.00%	0.00%	0.00%	0.10%	0.00%	0.00%	0.00%	0.00%	0.00%	23.41050515	0.001039906	0.10%
47	0.00126795	0.00%	0.00%	0.00%	0.13%	0.00%	0.00%	0.00%	0.00%	0.00%	24.24539224	0.00126795	0.13%
46	0.001509091	0.00%	0.00%	0.00%	0.15%	0.00%	0.00%	0.00%	0.00%	0.00%	25.10790814	0.001509091	0.15%
45	0.001753143	0.00%	0.00%	0.00%	0.18%	0.00%	0.00%	0.00%	0.00%	0.00%	26	0.001753143	0.18%
44	0.001942629	0.00%	0.00%	0.00%	0.19%	0.00%	0.00%	0.00%	0.00%	0.00%	26.92378816	0.001942629	0.19%
43	0.002006383	0.00%	0.00%	0.00%	0.20%	0.00%	0.00%	0.00%	0.00%	0.00%	27.88158646	0.002006383	0.20%
42	0.002167051	0.00%	0.00%	0.00%	0.22%	0.00%	0.00%	0.00%	0.00%	0.00%	28.87592539	0.002167051	0.22%
41	0.002391845	0.00%	0.00%	0.00%	0.24%	0.00%	0.00%	0.00%	0.00%	0.00%	29.90957859	0.002391845	0.24%
40	0.002636224	0.00%	0.00%	0.00%	0.26%	0.00%	0.00%	0.00%	0.00%	0.00%	30.98559341	0.002636224	0.26%
39	0.002835247	0.00%	0.00%	0.00%	0.28%	0.00%	0.00%	0.00%	0.00%	0.00%	32.10732607	0.002835247	0.28%
38	0.002841393	0.00%	0.00%	0.00%	0.28%	0.00%	0.00%	0.00%	0.00%	0.00%	33.27848244	0.002841393	0.28%
37	0.002778263	0.00%	0.00%	0.00%	0.28%	0.00%	0.00%	0.00%	0.00%	0.00%	34.50316536	0.002778263	0.28%
36	0.002650237	0.00%	0.00%	0.00%	0.27%	0.00%	0.00%	0.00%	0.00%	0.00%	35.78592993	0.002650237	0.27%
35	0.002410071	0.00%	0.00%	0.00%	0.24%	0.00%	0.00%	0.00%	0.00%	0.00%	37.13184818	0.002410071	0.24%
34	0.002187613	0.00%	0.00%	0.00%	0.22%	0.00%	0.00%	0.00%	0.00%	0.00%	38.54658518	0.002187613	0.22%
33	0.001981823	0.00%	0.00%	0.00%	0.20%	0.00%	0.00%	0.00%	0.00%	0.00%	40.03648906	0.001981823	0.20%
32	0.001596859	0.00%	0.00%	0.00%	0.16%	0.00%	0.00%	0.00%	0.00%	0.00%	41.60869776	0.001596859	0.16%
31	0.001170917	0.00%	0.00%	0.00%	0.12%	0.00%	0.00%	0.00%	0.00%	0.00%	43.27126654	0.001170917	0.12%
30	0.000763462	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	45.033321	0.000763462	0.08%
29	0.000422659	0.00%	0.00%	0.00%	0.04%	0.00%	0.00%	0.00%	0.00%	0.00%	46.90524164	0.000422659	0.04%
28	0.000177038	0.00%	0.00%	0.00%	0.02%	0.00%	0.00%	0.00%	0.00%	0.00%	48.8988881	0.000177038	0.02%
27	3.97137E-05	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	51.02787314	3.97137E-05	0.00%
26	8.88242E-06	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	53.30789988	8.88242E-06	0.00%
25	8.4478E-05	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	55.75717993	8.4478E-05	0.01%
24	0.000284102	0.00%	0.00%	0.00%	0.03%	0.00%	0.00%	0.00%	0.00%	0.00%	58.39695612	0.000284102	0.03%
23	0.000614615	0.00%	0.00%	0.00%	0.06%	0.00%	0.00%	0.00%	0.00%	0.00%	61.25216151	0.000614615	0.06%
22	0.001051957	0.00%	0.00%	0.00%	0.11%	0.00%	0.00%	0.00%	0.00%	0.00%	64.35225819	0.001051957	0.11%
21	0.001491096	0.00%	0.00%	0.00%	0.15%	0.00%	0.00%	0.00%	0.00%	0.00%	67.73231568	0.001491096	0.15%
20	0.002008864	0.00%	0.00%	0.00%	0.20%	0.00%	0.00%	0.00%	0.00%	0.00%	71.43441291	0.002008864	0.20%
19	0.002571172	0.00%	0.00%	0.00%	0.26%	0.00%	0.00%	0.00%	0.00%	0.00%	75.50948282	0.002571172	0.26%
18	0.003197511	0.00%	0.00%	0.00%	0.32%	0.00%	0.00%	0.00%	0.00%	0.00%	80.01977197	0.003197511	0.32%
17	0.00368738	0.00%	0.00%	0.00%	0.37%	0.00%	0.00%	0.00%	0.00%	0.00%	85.04216808	0.00368738	0.37%

16	0.004032027	0.00%	0.00%	0.00%	0.40%	0.00%	0.00%	0.00%	0.00%	0.00%	90.67277554	0.004032027	0.40%
15	0.004176762	0.00%	0.00%	0.00%	0.42%	0.00%	0.00%	0.00%	0.00%	0.00%	97.033321	0.004176762	0.42%
14	0.004189842	0.00%	0.00%	0.00%	0.42%	0.00%	0.00%	0.00%	0.00%	0.00%	104.2803043	0.004189842	0.42%
13	0.004064652	0.00%	0.00%	0.00%	0.41%	0.00%	0.00%	0.00%	0.00%	0.00%	112.6183727	0.004064652	0.41%
12	0.003895876	0.00%	0.00%	0.00%	0.39%	0.00%	0.00%	0.00%	0.00%	0.00%	122.3203828	0.003895876	0.39%
11	0.003515968	0.00%	0.00%	0.00%	0.35%	0.00%	0.00%	0.00%	0.00%	0.00%	133.7584044	0.003515968	0.35%
10	0.003192918	0.00%	0.00%	0.00%	0.32%	0.00%	0.00%	0.00%	0.00%	0.00%	147.4533273	0.003192918	0.32%
9	0.002651625	0.00%	0.00%	0.00%	0.27%	0.00%	0.00%	0.00%	0.00%	0.00%	164.1575394	0.002651625	0.27%
8	0.002147622	0.00%	0.00%	0.00%	0.21%	0.00%	0.00%	0.00%	0.00%	0.00%	184.9996128	0.002147622	0.21%
7	0.001685141	0.00%	0.00%	0.00%	0.17%	0.00%	0.00%	0.00%	0.00%	0.00%	211.7530071	0.001685141	0.17%
6	0.001239699	0.00%	0.00%	0.00%	0.12%	0.00%	0.00%	0.00%	0.00%	0.00%	247.3734758	0.001239699	0.12%
5	0.000842247	0.00%	0.00%	0.00%	0.08%	0.00%	0.00%	0.00%	0.00%	0.00%	297.1813599	0.000842247	0.08%
4	0.00052725	0.00%	0.00%	0.00%	0.05%	0.00%	0.00%	0.00%	0.00%	0.00%	371.8173227	0.00052725	0.05%
3	0.000276979	0.00%	0.00%	0.00%	0.03%	0.00%	0.00%	0.00%	0.00%	0.00%	496.1095539	0.000276979	0.03%
2	0.000114944	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%	744.5425854	0.000114944	0.01%
1	2.56187E-05	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	1489.539002	2.56187E-05	0.00%

ATTACHMENT 4

181 MITCHELL DR

Location	181 MITCHELL DR	**Mblu**	183/ 0443/ 00100/ /
Acct#	183 0443 00100	**Owner**	CITY OF NEW HAVEN SCHOOL
Assessment	$57,832,320	**Appraisal**	$82,617,600
PID	10043	**Building Count**	1

Current Value

Appraisal			
Valuation Year	**Improvements**	**Land**	**Total**
2022	$79,306,200	$3,311,400	$82,617,600
Assessment			
Valuation Year	**Improvements**	**Land**	**Total**
2022	$55,514,340	$2,317,980	$57,832,320

Owner of Record

Owner	CITY OF NEW HAVEN SCHOOL
Co-Owner	CITY OF NEW HAVEN
Address	165 CHURCH ST NEW HAVEN, CT 06510

Sale Price	$0
Certificate	
Book & Page	0/0
Sale Date	
Instrument	

Ownership History

Ownership History					
Owner	**Sale Price**	**Certificate**	**Book & Page**	**Instrument**	**Sale Date**
CITY OF NEW HAVEN SCHOOL	$0		0/0		

Building Information

Building 1 : Section 1

Year Built:	1952
Living Area:	258,313
Replacement Cost:	$120,362,573
Building Percent Good:	65

Replacement Cost
Less Depreciation: $78,235,700

Building Attributes	
Field	**Description**
Style:	Schools-Mid Hi
Model	Commercial
Grade	Excellent
Stories:	3
Occupancy	1.00
Exterior Wall 1	Brick
Exterior Wall 2	
Roof Structure	Flat
Roof Cover	T&G/Rubber
Interior Wall 1	Drywall/Plaste
Interior Wall 2	
Interior Floor 1	Concr-Finished
Interior Floor 2	Vinyl/Asphalt
Heating Fuel	Oil/Gas
Heating Type	Hot Water
AC Type	None
Struct Class	
Bldg Use	MUN SCHOOL MDL-94
Total Rooms	
Total Bedrms	00
Total Baths	0
NBHD Code	
1st Floor Use:	9033
Heat/AC	NONE
Frame Type	MASONRY
Baths/Plumbing	AVERAGE
Ceiling/Wall	SUS-CEIL & WL
Rooms/Prtns	AVERAGE
Wall Height	10.00
% Comn Wall	

Building Photo

(https://images.vgsi.com/photos/NewHavenCTPhotos/\00\04\47\96.JPG)

Building Layout

(ParcelSketch.ashx?pid=10043&bid=18831)

Building Sub-Areas (sq ft)			Legend
Code	**Description**	**Gross Area**	**Living Area**
BAS	First Floor	160,399	160,399
FUS	Finished Upper Story	103,067	97,914
CLP	Covered Loading Platform	500	0
		263,966	258,313

Extra Features

Extra Features					Legend
Code	**Description**	**Size**	**Value**	**Assessed Value**	**Bldg #**
SPR1	SPRINKLERS-WET	263966.00 S.F.	$446,100	$312,270	1
ELV1	FREIGHT ELEV	3.00 STOPS	$33,200	$23,240	1

Land

Land Use

Use Code	9033
Description	MUN SCHOOL MDL-94
Zone	PDU 34
Neighborhood	0900
Alt Land Appr	No
Category	

Land Line Valuation

Size (Acres)	23.5
Frontage	0
Depth	0
Assessed Value	$2,317,980
Appraised Value	$3,311,400

Outbuildings

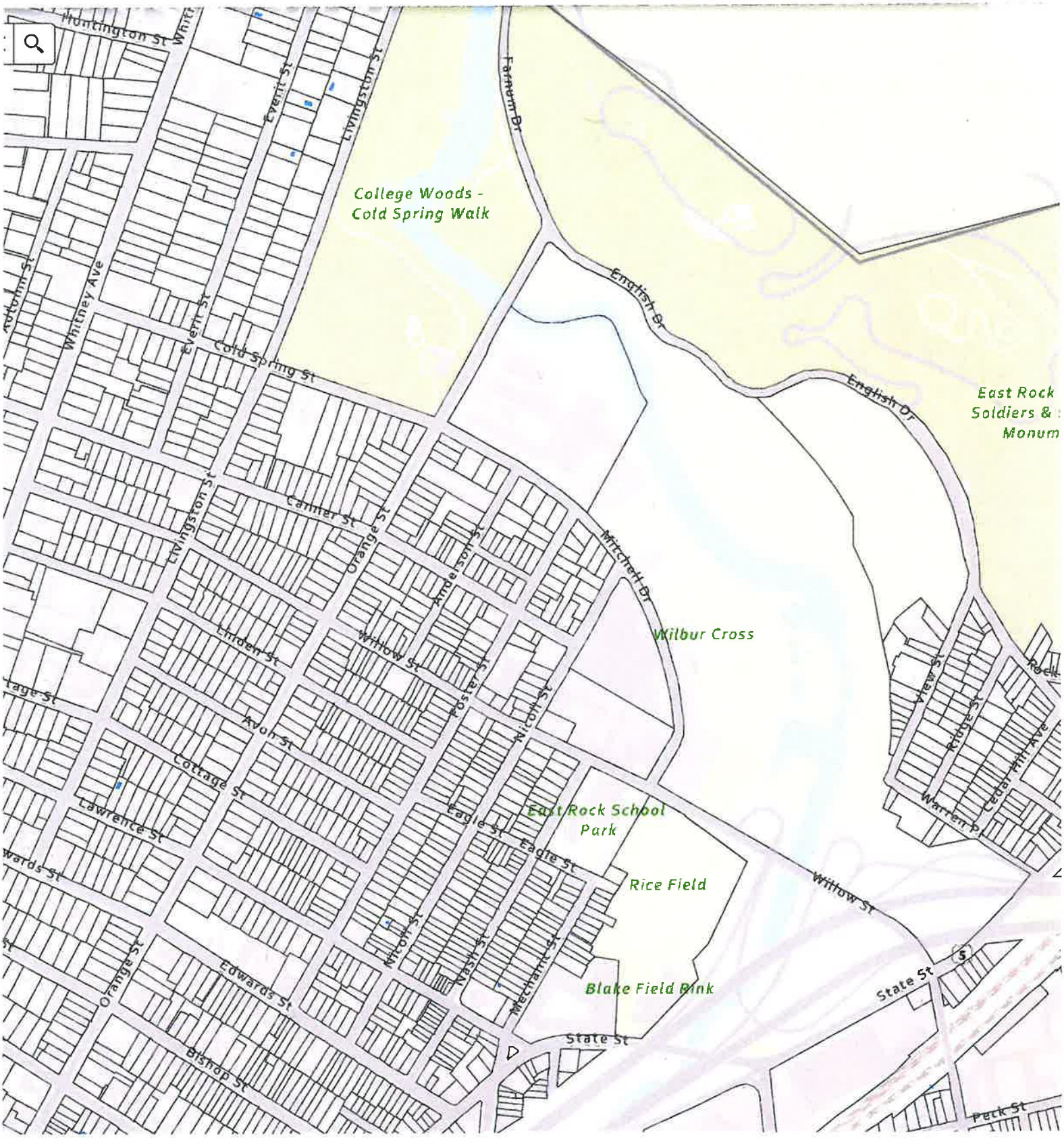
Outbuildings							Legend
Code	**Description**	**Sub Code**	**Sub Description**	**Size**	**Value**	**Assessed Value**	**Bldg #**
FN1	FENCE-4' CHAIN			960.00 L.F.	$4,000	$2,800	1
TEN1	TENNIS COURT			4.00 UNITS	$42,000	$29,400	1
PAV1	PAVING-ASPHALT			50000.00 S.F.	$102,500	$71,750	1
SPL1	POOL-INGR CONC			10000.00 S.F.	$105,000	$73,500	1
PAV1	PAVING-ASPHALT			130600.00 S.F.	$267,700	$187,390	1
EQMT	EQUIP SHED			3384.00 S.F.	$44,000	$30,800	1
LT1	LIGHTS-IN W/PL			12.00 UNITS	$6,300	$4,410	1
LT2	W/DOUBLE LIGHT			6.00 UNITS	$4,800	$3,360	1
LT3	W/TRIPLE LIGHT			3.00 UNITS	$3,200	$2,240	1
LT7	W/TRIPLE LIGHT			3.00 UNITS	$3,900	$2,730	1
LT4	W/FOUR LIGHTS			4.00 UNITS	$5,200	$3,640	1
FN3	FENCE-6' CHAIN			120.00 L.F.	$800	$560	1
FN4	FENCE-8' CHAIN			250.00 L.F.	$1,800	$1,260	1

Valuation History

Appraisal			
Valuation Year	**Improvements**	**Land**	**Total**
2022	$79,306,200	$3,311,400	$82,617,600
2021	$79,306,200	$3,311,400	$82,617,600
2020	$75,522,200	$2,645,200	$78,167,400

Assessment			
Valuation Year	**Improvements**	**Land**	**Total**
2022	$55,514,340	$2,317,980	$57,832,320
2021	$55,514,340	$2,317,980	$57,832,320
2020	$52,865,540	$1,851,640	$54,717,180

nformation Viewer



ATTACHMENT 5

VW/New Haven Fireworks COW

UNITED STATES POSTAL SERVICE®

Certificate of Mailing — Firm

Name and Address of Sender	TOTAL NO. of Pieces Listed by Sender	TOTAL NO. of Pieces Received at Post Office™	Affix Stamp Here *Postmark with Date of Receipt.*
Kenneth C. Baldwin, Esq. Robinson & Cole LLP 280 Trumbull Street Hartford, CT 06103	3	3	neopost 06/08/2023 US POSTAGE $003.19⁰ ZIP 06103 041L12203937
	Postmaster, per *(name of receiving employee)*		

USPS® Tracking Number / Firm-specific Identifier	Address (Name, Street, City, State, and ZIP Code™)	Postage	Fee	Special Handling	Parcel Airlift
1.	Justin Elicker, Mayor City of New Haven 165 Church Street New Haven, CT 06510				
2.	Laura Brown, Executive Director, City Plan Department City of New Haven 165 Church Street New Haven, CT 06510				
3.	Rich Fontana, Director of Emergency Operations City of New Haven 165 Church Street New Haven, CT 06510				
4.					
5.					
6.					

CHURCH STREET STATION
JUN - 8 2023
06103 USPS

See Reverse for Instructions