

**STATE OF VERMONT
PUBLIC UTILITY COMMISSION**

Case No. 21 - _____ - PET

De Minimis Application of Bell Atlantic Mobile Systems,)
LLC d/b/a Verizon Wireless, for a Certificate of Public Good,))
pursuant to 30 V.S.A. § 248a, authorizing the co-location)
of telecommunications equipment on an existing silo)
in East Montpelier, Vermont)

**PREFILED DIRECT TESTIMONY OF MARIA MONTROSE
ON BEHALF OF BELL ATLANTIC MOBILE SYSTEMS, LLC,
D/B/A VERIZON WIRELESS**

February 4, 2021

Summary:

Ms. Montrose's testimony will address the proposed installation and how the Project will promote the general good of the State of Vermont.

1 **Q1. Please state your name, employer and current position.**

2 A1. My name is Maria Montrose, and I am a Senior Radio Frequency ("RF") Engineer
3 currently working for Bell Atlantic Mobile Systems, LLC d/b/a Verizon Wireless
4 ("Verizon").

5 **Q2. Please state briefly your educational and professional background.**

6 A2. I have worked as an RF engineer for Verizon since September 1995. My credentials as an
7 RF engineer include the following:

- 8 • Responsible for the design and implementation of cellular, AWS, PCS and LTE
9 base stations in Connecticut and Vermont. This entails site selection, antenna
10 selection, propagation analysis, cell site layout/design, frequency planning, and
11 coordination with neighbors and carriers in Canada for sites near the international
12 border.
- 13 • Responsible for filings with the Federal Aviation Administration and the Federal
14 Communications Commission ("FCC").
- 15 • Responsible for RF exposure and safety compliance checks and overall system
16 optimization.
- 17 • Responsible to provide engineering support for the deployment of all services
18 offered by Verizon including voice, high speed data, E-911, SMS (text
19 messaging) and mobile instant messaging.

20 In addition, I am a certified instructor/training facilitator for OSHA RF safety and
21 compliance.

22 **Q3. Have you ever testified before the Public Service Board or Public Utility
23 Commission?**

1 A3. Yes. I have submitted prefiled testimony in Case No. 19-0248-PET (Burlington) among
2 others. In addition, I have testified before Act 250 District Commissions and Vermont
3 Zoning and Development Review Boards when those Commissions and Boards were
4 processing Verizon's applications. I have testified on many occasions before the
5 Connecticut Siting Council, which has jurisdiction over telecommunications facilities.

6 **Q4. Please identify the location of the Project that is the subject to this § 248a filing.**

7 A4. Verizon proposes to co-locate wireless telecommunications equipment on an existing
8 Harvestore farm silo ("Silo") at 141 Lyle Haven Road in East Montpelier. Verizon's
9 ground-mounted equipment will be housed on an equipment platform ("Platform")
10 located between the north and south wings of the barn ("Barn") to which the Silo is
11 attached. As shown on Sheet C-2 of the permit plans attached as Exhibit LH-1, the
12 Platform will be located within the footprint of the Barn. Verizon has received the Silo
13 owner's permission to file this application. Verizon refers to this project as "Montpelier
14 East", and its location is described as follows:

- 15 • **Montpelier East** is located on the Silo at the farm located at 141 Lyle Haven
16 Road in East Montpelier. The coordinates of Montpelier East are latitude
17 44°15'37.94" North and longitude 72°29'25.91" West.

18 **Q5. From a Radio Frequency Engineer's prospective, please describe what site
19 improvements will be necessary for the proposed Project.**

20 A5. Verizon proposes to mount a total of nine (9) panel antennas ("Antennas"), nine (9)
21 Remote Radio Heads ("RRHs") and one (1) OVP Distribution Box ("Distribution Box"),
22 with supporting equipment and cabling, on the exterior of the 90.9' above ground level
23 ("AGL") Silo. The Antennas and RRHs will be mounted in three (3) sectors of three (3)

1 each. The centerline of the Antennas, RRHs and Distribution Box will be approximately
2 83' AGL, and the Antennas will extend to approximately 86' AGL, which is below the
3 top of the Silo. The RRHs and Distribution Box will be mounted beside the Antennas.
4 *See* Exhibit LH-1, Sheet C-3. The aggregate visible surface area of that equipment is
5 53.69 square feet as detailed in the chart on Sheet C-6 of Exhibit LH-1. Full and accurate
6 specifications of the proposed Antennas, RRHs and Distribution Box are detailed in
7 Exhibit MM-1.¹ The Prefiled Testimony of Louis Hodgetts, P.E. discusses the location
8 of the other equipment at the Site.

9 **Q6. Please address the level of radiation associated with the proposed equipment.**

10 A6. Under federal law, Verizon is required to comply with the radiofrequency ("RF")
11 emission levels established by the Federal Communications Commission ("FCC").
12 Calculations using the most extreme assumptions, which could not possibly be duplicated
13 at the site, demonstrate that RF emission levels for each site will still be well below the
14 Maximum Permissible Exposure limits established by the FCC.

15 **Q7. Does this conclude your Prefiled Direct Testimony?**

16 A7. Yes.

¹ From time to time, equipment manufacturers may slightly alter their products or Verizon Wireless may purchase from different suppliers. Therefore, there is a possibility that the actual antennas may differ slightly from what is described in the attached specifications.

Exhibits to Prefiled Testimony of Maria Montrose

Exhibit MM-1

Antenna, Remote Radio Head and Distribution Box
Specifications for Montpelier East