

Nimesh Sangani

From: Kshitij Khandelwal <kshitij@pixxel.space>
Sent: Wednesday, October 7, 2020 2:01 AM
To: Nimesh Sangani
Cc: Manas Gupta; Awais Ahmed N A; Lin, Tony; Tejaswi Hareesh
Subject: Re: FLN 0201-EX-CM-2020 Pixxel
Attachments: S-Band Angle vs Gain_2.245G.csv; Anand_API_v05.zip

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Nimesh,

1. We are unable to provide the antenna pattern in a polar form as it is not similar to any of the suggested patterns in the ITU database. As such, we are attaching a .csv file with the antenna gains as a function of the angles along with the radiation pattern image as an attachment to the spacecap.
2. The errors have been resolved. Apologies for the inconvenience.
3. We have changed the nature of service for the VHF and UHF bands for Space Ops (TT&C) as permitted under ITU regulations and FCC regulations. Also, we plan on coordinating VHF as stated in the mod. application:

“The telecommand uplink utilizes the Space Operation (Earth-to-Space) allocation spectrum in the 148-149.9 MHz band, consistent with the U.S. and ITU Table of Frequency Allocations. See 47 C.F.R. § 2.106 n. 5.218. Accordingly, we plan on coordinating our use of this band with other authorized operators. We anticipate little to no coordination issues in this spectrum, considering that the IT-01 ground station will be the only station operating at this frequency for telecommand and is based in Italy.”

Looking forward to your response.

Warmly,

[Kshitij Khandelwal](#)

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On Wed, Sep 30, 2020 at 5:13 PM Nimesh Sangani <Nimesh.Sangani@fcc.gov> wrote:

Please address/correct the following:

1. Provide antenna radiation patterns in polar format.
2. Spacecap 3 fatal errors (see attached report)

3. Provide an interference analysis or change the Nature of service in the spacecap for the uplink 148-149.9 MHz band. It is not allocated for EESS. The same applies to Downlink 401.8974-401.9026 MHz. It is not allocated for EESS in the downlink.

V/r,

Nimesh Sangani

Federal Communication Commission

Office of Engineering & Technology

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