Description of Proposed Experimental Operation

Applicant

The Raymond Corporation
22 S. Canal st.
Greene, NY 13778

1. Purpose of Experimental Operation

The Raymond Corporation requests Special Temporary Authority (STA) under FCC Part 5 to conduct field testing and operational evaluation of updated FCC approved RF products operating in the Bluetooth Low energy 2.4 GHz band.

Remote Transmitter Unit (RTU) FCC ID: 2AYXJ-1360796

Remote Receiver Unit (RRU) FCC ID: 2AYXJ-1338021

The purpose of the testing is to evaluate:
• wireless communication reliability,
• latency performance,
• operational range,
• antenna performance, and
• system stability under real-world deployment conditions.

Testing is strictly experimental in nature and will not be used for commercial service or customer operations.

Requested operational period:
June 8, 2026 through September 15, 2026.

2. General Description of Operation

The experimental system consists of portable remote transmitter units communicating with fixed and mobile receiver units using Bluetooth Low Energy (BLE) modulation.

Operations will occur intermittently during daytime and evening hours at temporary outdoor test locations.

Testing will involve:
• up to 10 portable transmitter devices,
• up to 5 receiver units,
• mobile and fixed operation,
• low duty cycle intermittent transmissions.

All testing will be conducted under the supervision of qualified engineering personnel.

3. Technical Parameters

RRU

Parameter	Description
Frequency Range	2402–2480 MHz
Technology	Bluetooth Low Energy (BLE)
Modulation	GFSK / BLE 1M PHY
Emission Designator	1M00F1D
Maximum Conducted Output Power	+4 dBm
Antenna Type	Whip, tilt
Maximum Antenna Gain	2 dBi
Occupied Bandwidth	Approximately 1 MHz

RTU

Parameter	Description
Frequency Range	2402–2480 MHz
Technology	Bluetooth Low Energy (BLE)
Modulation	GFSK / BLE 1M PHY
Emission Designator	1M00F1D
Maximum Conducted Output Power	+4 dBm
Antenna Type	Chip
Maximum Antenna Gain	2 dBi
Occupied Bandwidth	Approximately 1 MHz

4. Proposed Operating Locations

Testing will occur at the following temporary field trial locations:

Site ID	Location Description	Coordinates	Operational Environment	Dates
Site 1	Albertsons Distribution Facility	40°51'10.88"N 111°55'27.64"W	Indoor Mobile	Jun–Sep 2026
Site 2	Dollar General	34°46'20.24"N 92°06'27.82"W	Indoor Mobile	Jun–Sep 2026
Site 3	Albertsons	33°54'35.90"N 117°51'54.64"W	Indoor Mobile	Jul–Sep 2026
Site 4	Dollar General	29°45'58.57"N	Indoor Mobile	Aug–Sep 2026

		82°31'43.67"W		

Operations may occur within the facility of the listed coordinates for temporary deployment and mobility testing purposes.

5. Interference Mitigation

Operations will be conducted on a non-interference basis.

The Raymond Corporation acknowledges that experimental operations must not cause harmful interference to authorized radio services and agrees to immediately reduce power or cease operation upon notification of interference.

Additional mitigation measures include:
• low transmit power operation,
• intermittent duty cycle transmissions,
• engineering supervision during testing,
• operation within controlled test environments where practical.

6. RF Exposure Compliance

All equipment used during testing will comply with applicable FCC RF exposure requirements for portable and mobile devices operating within the requested frequency range and power levels.

7. Equipment Control and Monitoring

A responsible control operator will be available during all periods of operation.

Technical Contact:

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8. Equipment Summary

Equipment Description	Quantity	Notes
Prototype BLE Remote Unit	10	Portable transmitter
Prototype Receiver Unit	5	Fixed/mobile receiver
Engineering Test Laptop	2	Monitoring and logging

9. Conclusion

The Raymond Corporation respectfully requests grant of this STA to permit short-term field testing and evaluation of the described experimental wireless telemetry system at the locations identified herein.