

Umjantshi House Private Bag X101
30 Wolmarans Str. Braamfontein, 2107
Braamfontein T +27 11 013 1667
Johannesburg
2001

The Independent Communications Authority of South Africa (ICASA)
350 Witch-Hazel Avenue, Eco Point Office Park
Eco Park, Centurion
South Africa

Attention: Mr Manyaapelo Richard Makgotlho / Mr Davis Kgosimolao Moshweunyane
Email: rmakgotlho@icasa.org.za / dmoshweunyane@icasa.org.za

11 December 2025

Re: INPUT FOR ICASA MIGRATION PLAN TO CONSIDER THE 1895 – 1915 MHZ FREQUENCY RANGE FOR PASSENGER RAILWAY COMMUNICATION IN SOUTH AFRICA

Dear Messrs. Makgotlho & Moshweunyane

The Passenger Rail Agency of South Africa (PRASA) would like to extend its sincere gratitude for the opportunity to provide inputs and comments regarding the Second Draft National Radio Frequency Plan ("NRFP2025").

PRASA mandate is established by the Legal Succession to the South African Transport Services Act of 1989, commonly known as the "Legal Succession Act." Our operations involve the acquisition of a safety permit overseen by the Railway Safety Regulator (the "Regulator") under the National Railway Safety Regulator Act, 16 of 2002 (the "RSR Act"). The Regulator is responsible for overseeing safe operations, including secure communication within our operational jurisdiction, and ensuring safe practices among operators. Furthermore, we are legally required to uphold safety standards as outlined in the Occupational Health and Safety Act, 85 of 1993, to ensure the safe operation of our services.

PRASA remains committed to engaging constructively and offering meaningful contributions to the development and implementation of policies that impact the industry.



11/12/2025

Athanacius Makgamatha

General Manager: SAD Signals & Telecoms
PRASA Group Capital
E-mail: atha.makgamatha@prasa.com

Directors (Chairperson) N. Nokwe-Macamo, Adv. S. Sethene,
L. Joel, G. Maluleke, M. Mukhuba, TN. Mype,
Dr. R. Kgoroeadira, Prof. J. Havenga,
H. Ralinala, BJ. Nobunga

Group CEO
H. Emeran

Company Secretary
L. Mthayise

1. The Strategic Acknowledgement of ICASA's Inclusion of the FRMCS Band:

PRASA welcomes and commends ICASA for incorporating the FRMCS band into the Second Draft National Radio Frequency Plan 2025. This is a decisive and forward-looking policy position that aligns South Africa with global technological evolution in railway communications. The inclusion reflects ICASA's strategic leadership and ensures that South Africa's spectrum roadmap is consistent with the European Union's designation of the 1.9 GHz range as the core band for FRMCS.

This alignment also mirrors developments across the African continent, including Angola's formal allocation of this band for railway modernization. The harmonized approach strengthens regional interoperability and reinforces South Africa's regional leadership in transport digitalization.

2. Global Transition and National Urgency:

The NRFP 2025 is being finalized at a pivotal moment for the global rail sector. GSM-R, the legacy platform based on 2G/3G technologies, will be sunset worldwide by 2030. South Africa's mobile operators are already implementing their own 2G/3G shutdown plans between 2025 and 2027, with full discontinuation expected before 2030.

These global and national timelines make the migration to FRMCS not only important, but urgent. Without a clearly defined spectrum assignment and migration pathway, South Africa risks operational disruption, safety vulnerabilities, and dependency on obsolete technologies that will no longer be supported or manufactured.

3. PRASA's Operational Requirement Within the 1895–1915 MHz Range:

While ICASA has prudently included the full FRMCS band, PRASA confirms its specific operational requirement for 1895–1915 MHz. This allocation:

- Provides PRASA with the contiguous **20 MHz bandwidth** required for mission-critical voice, data, signaling, automation, and real-time monitoring.
- Fully aligns with UIC/ETSI standards and the globally harmonized FRMCS architecture.

Umjantshi House Private Bag X101
30 Wolmarans Str. Braamfontein, 2107
Braamfontein T +27 11 013 1667
Johannesburg
2001

- Ensures interoperability with international rail systems and access to a mature global vendor ecosystem.
- Aligns South Africa with Angola's allocation, strengthening SADC spectrum harmonization and reducing cross-border coordination complexity.

This segment of the band will serve as the foundational layer for PRASA's national FRMCS deployment, ensuring long-term scalability and continuity beyond the GSM-R and 2G/3G sunsets.

4. National Strategic Importance of the Allocation:

Allocating 1895–1915 MHz to PRASA within the broader FRMCS band is a strategic national investment that will deliver benefits far beyond the rail sector. Specifically, it will:

- Improve safety-critical operations by ensuring reliable, low-latency communication essential for signaling and train protection systems.
- Enable railway digital transformation, including predictive maintenance, advanced automation, cybersecurity enhancement, and smart mobility integration.
- Position South Africa as the regional benchmark for modern rail communication, attracting investment and enhancing cross-border connectivity.
- Strengthen alignment between national spectrum policy, the digital economy strategy, and the transport sector's long-term modernization agenda.

5. Concluding Perspective:

PRASA respectfully supports ICASA's inclusion of the full FRMCS band (1895–1951 MHz) in the Second Draft National Radio Frequency Plan 2025 and formally submits its requirement for the 1895–1915 MHz portion for railway operations. This allocation is essential to secure continuity, interoperability, and safety in South Africa's future rail communication environment.

Directors (Chairperson) N. Nokwe-Macamo, Adv. S. Sethene,
L. Joel, G. Maluleke, M. Mukhuba, TN. Mype,
Dr. R. Kgoroeadira, Prof. J. Havenga,
H. Ralinala, BJ. Nobunga

Group CEO
H. Emeran

Company Secretary
L. Mthayise

Allocating this band will enable a nationwide transition to FRMCS, align with global and regional best practice, and deliver a modernized, resilient, and future-ready communication platform for South Africa's transport infrastructure.

-End-