



**STATEMENT BY THE REPUBLIC OF SOUTH AFRICA**  
**60TH SESSION OF THE SCIENTIFIC & TECHNICAL SUB-COMMITTEE OF THE**  
**UNITED NATIONS COMMITTEE ON THE PEACEFUL USES OF OUTER SPACE**

**TO BE DELIVERED BY H.E AMBASSADOR RAPULANE MOLEKANE**

**AGENDA ITEM 4 GENERAL EXCHANGE OF VIEWS**

**Date: 06-17 February 2023**

**Chair,**

Allow me, Chair to congratulate you on chairing the 60<sup>th</sup> session of the Scientific and Technical Subcommittee (STSC). We are confident that under your able leadership, we will hold fruitful deliberations.

At the outset, my delegation aligns itself with the statements delivered on behalf of the African Group and the Group of 77 and China.

**Chair,**

South Africa recognises the Scientific and Technical Subcommittee as an essential forum for the exchange of views and sharing of best practices on scientific and technical issues of outer space activities. In this regard South Africa is committed to international cooperation for mutually beneficial and peaceful uses of outer space, alongside requisite capacity building and technical assistance for developing countries. My delegation also supports efforts towards ensuring the long-term sustainability of outer space activities, including the safety of space operations. We note the constructive work carried out in the LTS Working Group and look forward to further progress.

In ensuring that outer space remains safe and usable for all countries, South Africa expresses its concern over the increasing creation of space debris and calls for greater responsibility in decongesting outer space through remediation. We are concerned about the accumulation of space debris and the potential threat they pose if left unattended, we call on the owners to play an active role in safe and secure debris removal efforts.

**Chair,**

Space-based technologies are playing a growing role in furthering global health objectives as remote sensing technologies prove to be useful in monitoring infectious diseases' patterns. In this regard, South Africa supports the recent adoption of the General Assembly Resolution on Space and Global Health encouraging a

multisectoral approach to pursue effective coordination in all key space activities relevant to global health.

The demand for earth observation data has resulted in a significant rise in radar remote sensing. Against this backdrop, South Africa has been actively developing low-cost C-band phased array radar technology as well as Synthetic Aperture Radar (SAR) technology since 2014 with an aim of launching a SAR satellite. My delegation looks forward to updating the STSC on our progress with this technological development.

**Chair,**

South Africa has made great strides in the global space arena, and we are pleased to report on our latest national developments. Last year, South Africa launched a 24/7 space weather capability in the Western Cape The Space Weather Centre is recognised by the International Civil Aviation Organisation (ICAO) as the only regional space weather centre in Africa. One of the offerings of the SWC is global space weather monitoring and forecasting on a 24/7 basis. We will provide more information on the Space Weather Centre in our technical presentation on the 8<sup>th</sup> of February 2023.

South Africa has also made significant progress in developing sensors that can detect elemental potassium emissions from forest fires from Low Earth Orbit. We have created various prototypes including a sensor, which is currently in orbit on-board ZACUBE-2. The technology roadmap includes terrestrial, aerial and space applications of the K-Line technology. We also invite you to our technical presentation on Monitoring Forest Fires from a CubeSat to be held during the session.

**Chair,**

We are also pleased to inform the subcommittee of the recent launch of EOS-SAT-1/AGRISAT microsatellite. Designed and fully built in South Africa, the satellite is the world's first agriculture-focused seven-satellite constellation, which will provide high-quality data to agricultural and forestry industries to support sustainable practices and maintain biodiversity. Agrisat-1 was launched on the Space X launcher Transponder

6 on the 3<sup>rd</sup> of January 2023. My delegation is proud of the contribution that the South African space industry is making to the global space economy.

Further to this, we express our appreciation for the ongoing cooperation between the South African National Space Agency (SANSA) and NASA to establish a deep space ground station in the Karoo to support NASA missions to the moon and Mars. The station will be the third primary site located outside the USA and will be established, operated and maintained by SANSA.

**Chair,**

South Africa is home to several large optical and radio telescopes, of which the MeerKAT radio telescope is the most sensitive telescope of its kind and a precursor to the Square Kilometre Array (SKA) radio telescope. It has captured telescopic images of the centre of our Galaxy with unprecedented clarity and depth, highlighting the importance of protecting a dark and radio-quiet sky to advance our understanding of the Universe. We are thus concerned about the increasing number of satellite constellations in mainly low Earth Orbits and support the objectives outlined in the Conference Room Paper on the Protection of Dark and Quiet Skies for Science and Society and stand ready to co-sign the CRP.

Maintaining the agenda item, “General Exchange of Views on Dark and Quiet Sky” in the 61<sup>st</sup> session of the STSC and establishing an Expert Group would enable communication and cooperation between Member States and stakeholders to promote awareness of the scope and impact of satellite constellations on astronomy. In this regard, we take this opportunity to applaud the National Science Foundation (NSF) and SpaceX for signing an agreement to mitigate the impact of the Starlink Satellite on ground-based astronomy and encourage them to continue exploring methods to further protect ground-based astronomy.

In conclusion, let me reiterate my delegation’s full support in ensuring a successful and productive outcome of this session.

Thank you.