



New Network ecosystem for 6G: Foundational shifts TTDD 2025 workshop

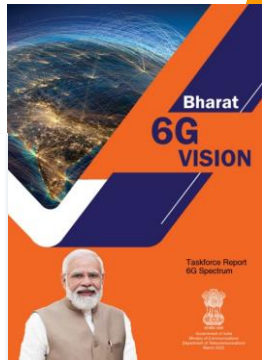
Sandeep Sharma

Vice Chair

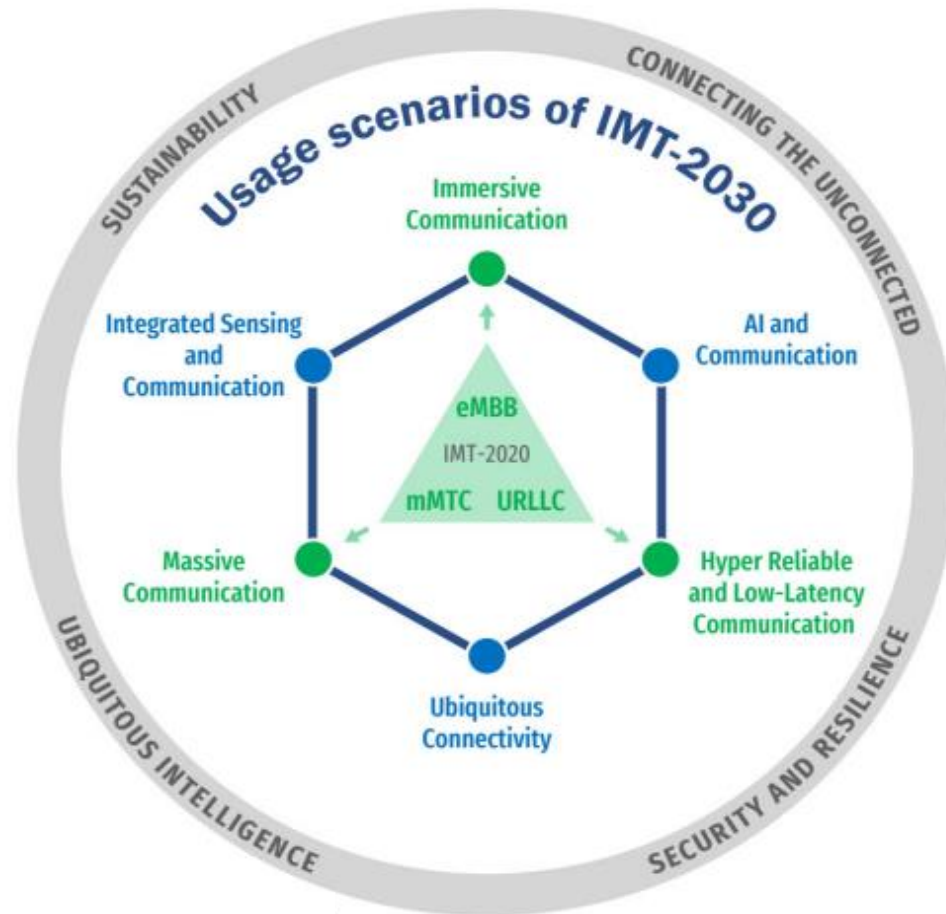
Use case and revenue stream WG

Bharat 6G Alliance

Delhi, 18 July 2025



IMT 2030 Vision



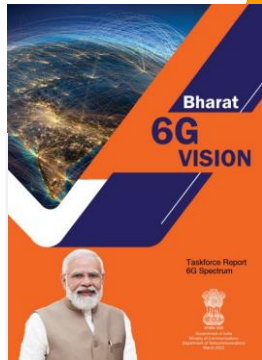
Extension from IMT-2020 (5G)

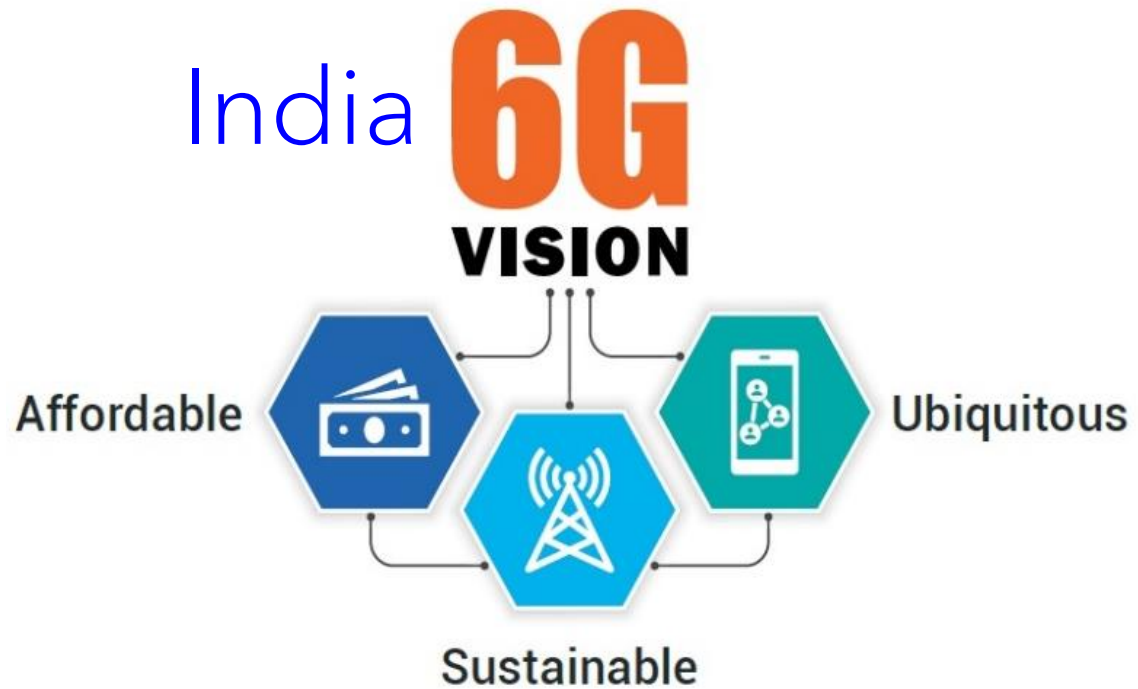
- eMBB Immersive Communication
- mMTC Massive Communication
- URLLC HURLLC (Hyper Reliable & Low-Latency Communication)

New

- Ubiquitous Connectivity
- AI and Communication
- Integrated Sensing and Communication

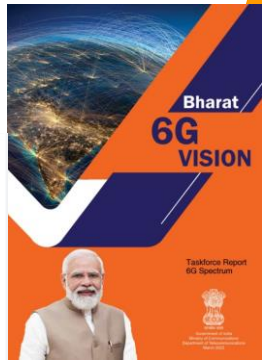
[New paradigms, new approach]



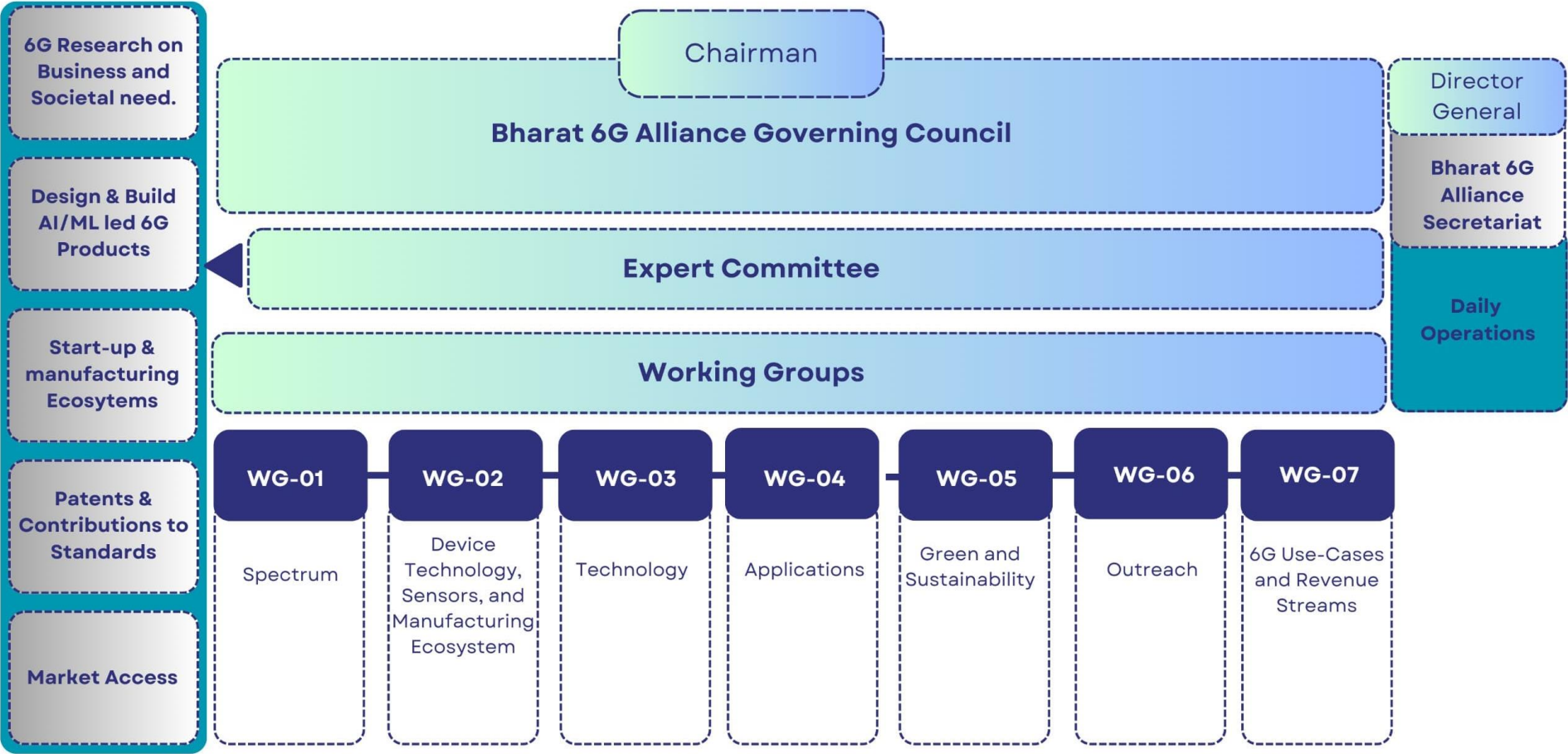


- India 6G roadmap - March 22, 2023
 - By Hon. Prime Minister of India
- Design, develop and deploy 6G Network Technologies
- Affordability, Sustainability, and Ubiquitous Coverage
- Position India as a global leader in 6G
 - Contribution to global standardization
<https://dot.gov.in/circulars/bharat-6g-vision-statement>

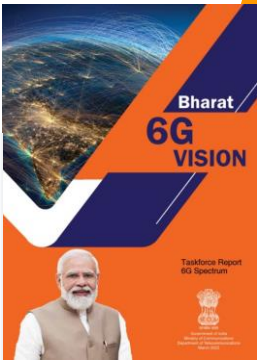
Achieving 6G leadership



B6GA Structure



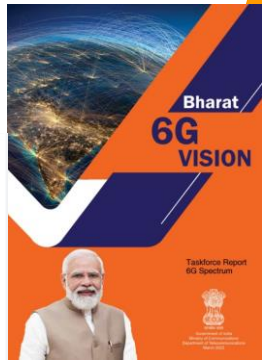
7 focused working groups



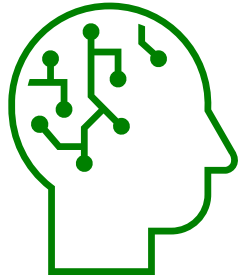
Global MOUs

 NEXT G ALLIANCE An ATIS Initiative	 6G FORUM	 Brasil 6G	 6G FLAGSHIP UNIVERSITY OF OULU	
 6G SNS IA	 5GACIA 5G Alliance for Connected Industries and Automation	 XGMF XG Mobile Promotion Forum		
 NGMN	 UK TELECOMS INNOVATION NETWORK	 tsdsI India's Telecom SDO	TBA	

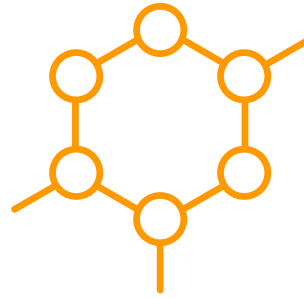
(Synergized thoughts and putting India priorities way ahead of standardization)



Global Interest areas



AI Native



ISAC



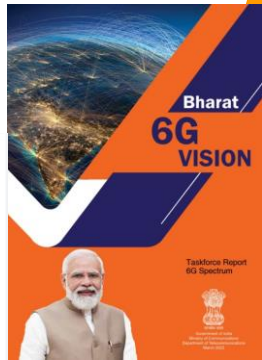
Spectrum



NTN

Other - Energy efficiency, IoT/M2M, Reliability, Latency, Immersive Comm. & Open interfaces

AI and spectrum are horizontal to every conversation

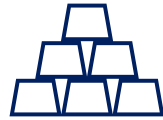


Reimagining networks in the hyper intelligent 6G Era (observations)

Intelligence Native
Networks



Simple yet modular
Networks



Unified Sensory
Networks



Agentic autonomy
Networks



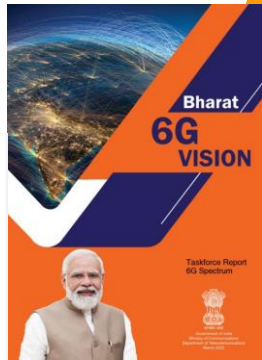
Trust Centric,
Sovereign
programmability



Intelligent
sustainability by
design



(Focus on both essential and Implementation patents)



B6GA WG activities



Spectrum Strategy for India

First release

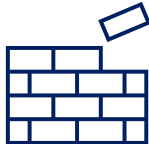


Collective AI thoughts whitepaper with member partners

In process

WRC'27 Preparations

In process

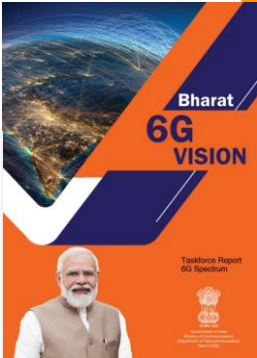


Resilient 6G Networks white paper with 6G Flagship

In discussion



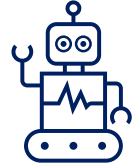
Collective execution and strategy



Use case working group (WG7 observations)



Data Aggregation



Cobots



Sensing



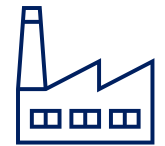
NgIoT



Transport &
Public safety

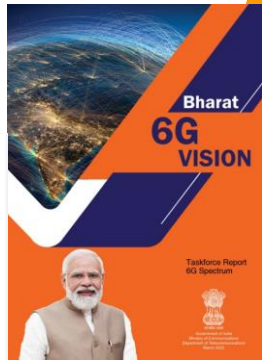


Immersive



Industries

[AI and Gen AI are the key enablers for the possible complex use cases]



Key take aways

- Position India as 6G thought and technical leader
- Establish an ecosystem for R &D and standardization
- Collaboration is key to achieve Bharat 6G vision
- Differentiate yet collaborate with global forums
- Develop an inclusive 6G ecosystem in India of all stakeholders



B6GA ...

Accelerating 6G Leadership in India

Thank You

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