Project	**IEEE 802.20 Working Group on Mobile Broadband Wireless Access** <**http://grouper.ieee.org/groups/802/20/**>
Title	**Channel Requirements For MBWA**
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Re:	MBWA Call for Contributions
Abstract	This contribution proposes additional details and considerations for the MBWA requirements.
Purpose	For information
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Technical Requirement Definitions for IEEE802.20 Standards

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Outline

- Current System Requirements
- Clarification and expansion of the System Requirements
    - Link Budget
    - Spectrum Efficiency
    - Channel models
    - Granularity of data rate and maximum simultaneous users
    - Airlink RTT
- Conclusion and recommendations

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Current Requirements on IEEE 802.20

- Peak data rate: DL: >1Mbps, UL: >300Kbps for 1.25MHz

  Expansion: Requirements for path loss, frequency reuse, channel conditions and cell loading.

- Mobile speed up to 250KM/H

  Expansion: Characterization of the channel conditions LOS, rural, suburban or dense urban. Specifications for the minimum data rates, fade margins, spectrum efficiency, and capacity loss.

- Sustained spectrum efficiency 1b/s/Hz

  Expansion: Need to determine the loading assumptions of the neighbor cells.

- The current requirements represent a good set objectives but we are now at the stage where the next level of clarification and definition need to begin.

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