Achieving Nationwide, Interoperable Public Safety Broadband Wireless Services Through a Public/Private Partnership

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U.S. Cellular

Two Fundamental Goals

1. Rapid development of a nationwide, interoperable broadband wireless network for public safety.
2. Availability of spectrum capacity for commercial services on terms that foster competitive, universal mobile broadband.

Critical Enablers

To achieve the two fundamental policy goals, the FCC's solution must include:

1. Full partnership between public safety and commercial operators
2. Access to spectrum opportunities for non-national service providers
3. Cost effective and spectrum efficient network deployment, operations and devices
4. Standards and procedures for interoperability
5. LTE trials and limited waivers consistent with nationwide interoperability

A Full Partnership

U.S. Cellular believes that policy objectives are best met with a model that makes public safety and commercial operators full and equal partners

- Efficiencies of shared infrastructure as well as shared use of spectrum, operations, applications and devices across PSBL and D Blocks.
- Commercial operators need long-term arrangements, either as licensees or under long-term contracts with public safety, in order to establish business plans and make investments.
- A reasonable amount of spectrum capacity must be available for commercial use, with clear, consistent and reasonable standards for public safety preemption and priority access under emergency and non-emergency conditions.
- Commercial partners should have access to nationwide roaming on the shared network

Spectrum Opportunities for Non-National Service Providers

Commercial partners must be selected through a fair, transparent, and objective process that doesn't favor national operators, whether through an auction or an RFP process.

- Commercial partnerships or D Block licenses should use geographic areas that make sense for public safety and are accessible to multiple qualified commercial operators.
- 58 areas using the public safety regions already defined for 700 MHz narrowband planning.
  - Faster, more reliable, less costly network deployment than nationwide license
  - Customization to meet local public safety needs with national standards
  - Nationwide coordination for interoperability
  - Eliminate complexity of mega-regional packages

Cost Effective and Spectrum Efficient

The network must be cost effective for taxpayers and public safety agencies, and it must make efficient use of the nation's scarce spectrum resources.

- The most cost effective network will cover the PSBL and D Blocks using 10+10 LTE and will integrate with the know how, infrastructure (including radio access network), operations and services of existing commercial networks.
- Commercial use of the network's capacity will help fund the network and ensure that it is fully employed.
- A robust partnership, focused on the 700 MHz band and including commercial use of the network, will create scale for mobile devices that will make them more widely available and more cost effective for public safety.

Standards and Interoperability

The network must be robust enough to meet the needs of public safety and must be interoperable on a nationwide basis.

- Technical Standards
  - Public safety organizations and commercial carriers chose LTE
  - US Cellular and others made solid proposals on coverage, build out, capacity, reliability and other standards
- Interoperability
  - Emergency Response Interoperability Center to coordinate PSBL and public safety users
  - National committee to coordinate D Block licensees with ERIC, PSBL and FCC
  - National platform for certain public safety applications
  - Reasonable efforts to support gateways for other public safety networks and satellite coverage

Reallocation vs. Auction

There are two paths to achieving the FCC's policy goals.

- U.S. Cellular is not opposed to reallocation of the D Block to public safety, provided it includes safeguards that ensure a full partnership with commercial operators.
  - Requires legislation
  - Legislation must support both policy goals (public safety and competitive commercial market)
  - FCC and Congress would need to ensure full long-term partnerships, sufficient commercial capacity, and a fair selection process that didn't favor the national carriers.
- The FCC could conduct a D Block auction under its existing statutory authority
  - Require partnership with public safety using D Block and PSBL spectrum
  - Use regional license areas

Either path is feasible and would be supported by U.S. Cellular. We agree with the FCC that it cannot presume legislation and needs to move forward with plans that are based on the current statutory framework.

Two Stage Auction Approach

U.S. Cellular has described an auction approach that would accomplish policy goals within the FCC's existing authority

- Address any unsold D Block licenses from auction's first stage through a second stage with relaxed rules for commercial bidders
  - Lower minimum opening bids
  - Possible adjustments to coverage and technical requirements
  - Allow bids for support from commercial or public safety entities
- For any unsold D Block licenses at end of second stage, PSBL becomes zero, best-efforts bidder and licensee
  - Flexibility for PSBL on coverage and technical requirements in deploying services to meet public safety needs in region
  - Could apply an RFP process to partner with commercial operators for shared network and uses
  - Could work with public safety entities in region

A reauction of the D Block can be successful without abandoning the vision of a shared use network.

Waivers and Test Beds

U.S. Cellular supports LTE trials using PSBL spectrum

U.S. Cellular supports the grant of qualified waivers, provided waiver deployments don't compromise the vision of interoperability and full commercial partnership

- Select limited number of early builders in PSBL spectrum within framework for nationwide, interoperable coverage
  - Waivers should not undermine policy of widespread coverage
  - Technical compatibility using LTE
  - Demonstration networks with technical and financial qualifications
- After licensing D Block, early builders could:
  - Continue operations in PSBL spectrum, with commercial services using D Block and spare PSBL capacity; or
  - Combine with applicable D Block licensees for shared network and spectrum, compensated at negotiated value based on depreciated cost and avoided cost for shared network
- Nationwide coordination through PSBL and ERIC

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About U.S. Cellular

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Snapshot of US Cellular

- Today: US Cellular
  - Serves 6.2 million subscribers in regional clusters
  - Serves large rural areas as well as some major metro areas
  - Provides award-winning service quality
  - Has extensive broadband deployment

- Future: US Cellular intends to be
  - A strong wireless competitor
  - Offering leading broadband services
  - Across a regional footprint

- FCC Actions needed for US Cellular to continue expanding its broadband services coverage
  - Additional spectrum
  - Other key enablers — USF support including broadband, data roaming for 3G and 4G, access to advanced handsets, reduced special access charges

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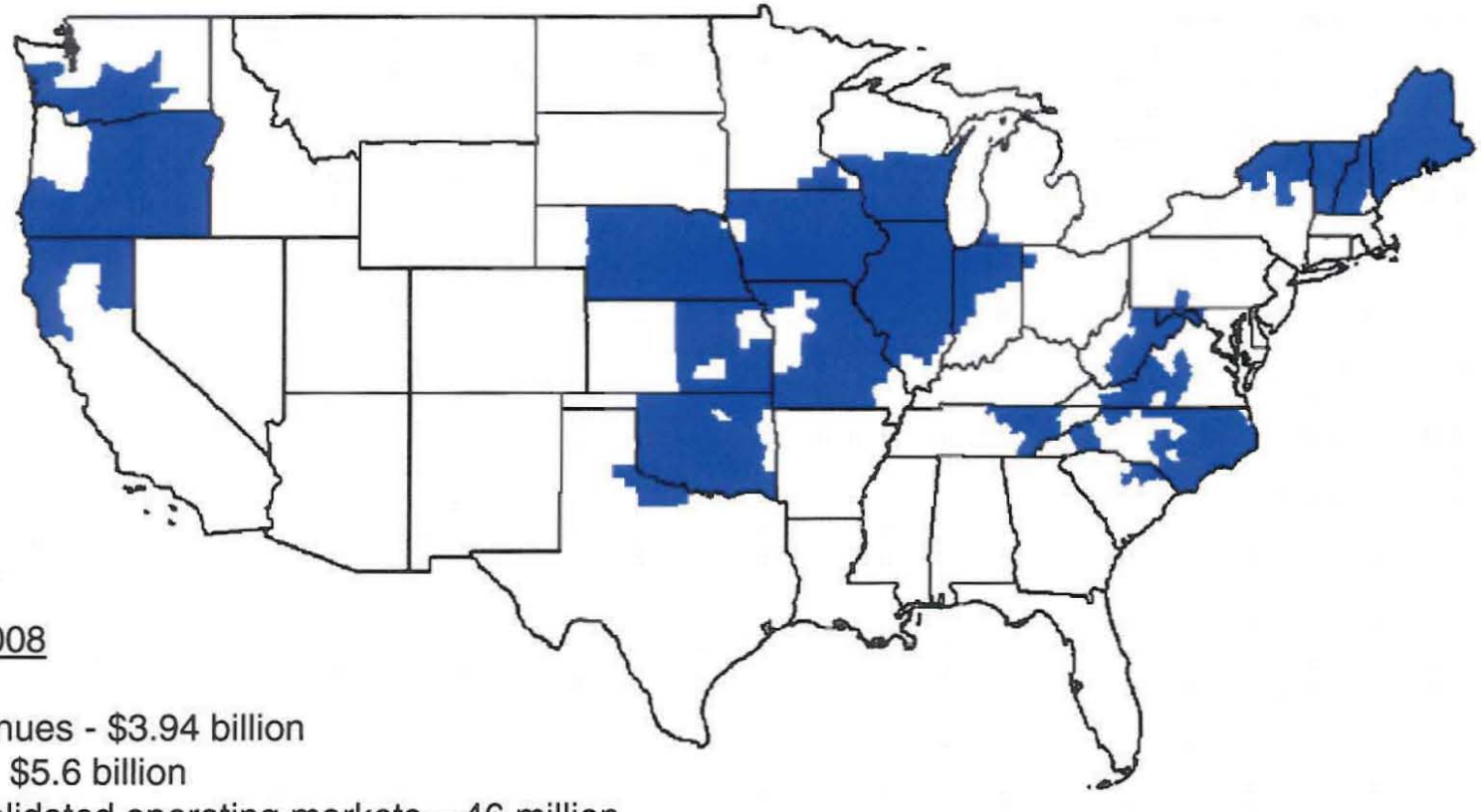
We connect with you.

Majority-Owned or Managed



2008

Service Revenues - $3.94 billion
Total Assets - $5.6 billion
Pops in consolidated operating markets – 46 million

U.S. Cellular

Committed to Providing Coverage and Quality for Public/Private Partnership in Broadband Wireless Services

- With USF support for voice services, US Cellular deployed cell towers to areas that lacked quality wireless voice service. Examples of new towers for unserved areas in 2009:
  - Iowa (Leando, Whittmore, Union, Green Bay, Akron, Ocheyedan)
  - Missouri (Rover, Sunnyview, Wyaconda, Chestnut Ridge, Dove Mountain, Cassville)
  - Nebraska (Grant, Pierce West, Snyder, Spalding, Chambers, Pleasanton, Franklin, Eustis, Leigh, Burr Crab Orchard)
  - Oregon (Bonanza, Malin, Hillcrest, Spray, Kings Spring)
- US Cellular has 3G coverage enabled on about 60% of its cell sites, reaching about 75% of its post-pay customers
  - Broadband coverage to many previously unserved and underserved areas
- Eight consecutive J.D. Power awards for highest call quality in North Central Region
- Seeking solutions for broadband in remote areas.
  - Applied for ARRA grants for additional broadband deployments in California, Kansas, Missouri and Nebraska