

Analysis by Blandin Foundation's Broadband Strategy Board of the Draft Report of the Minnesota Ultra-High Speed Broadband Task Force

Principle 1: Ubiquity

Ultra high-speed broadband needs to be available to everyone in Minnesota, including businesses, institutions and individuals. While ultimately all Minnesotans will need this service, this goal will necessarily be achieved in stages.

The Task Force should be commended for its recommendation of 100 percent ubiquitous broadband coverage by 2015. Since Blandin Foundation adopted this principle in 2005, Minnesota has made great strides in moving towards ubiquitous coverage, with Connected Nation reporting that 96 percent of Minnesotans have access to broadband. We know that the areas now without broadband, in most cases, are the least cost-effective to serve due to population density and geography.

The Strategy Board questions, however, whether the Task Force's primary reliance on stimulating market demand to encourage infrastructure development will be enough to close this remaining gap. Many parts of rural Minnesota have broadband because of the existing federal programs designed to ensure ubiquitous telephone services, as broadband was made available with telephone network upgrades.

The Strategy Board believes that more emphasis should be placed on the need to design and create the financial and regulatory tools that will be necessary to incent service in these areas.

Ubiquitous service is just not about physical availability of service; affordability matters as well. Just as lifeline subsidies are available so that everyone can afford telephone, similar strategies are now required for broadband so that citizens can access government services, education and health care.

Principle 2: Symmetry

Ultra high-speed broadband needs to provide symmetric speeds and facilitate source-to-source communication. More communication in the future will be "two-way" as we work more from our homes.

The Strategy Board agrees with the Task Force approach on symmetry and that the key issue is adequate upload capabilities. We believe that current upload services offerings significantly obstruct adoption of important applications in health care and education and inhibit the ability of companies to communicate with current and prospective home workers. As Minnesota seeks to support and attract creative talent, many of whom work at home or in small, entrepreneurial businesses, the ability to upload information through the network is critical for economic development.

More upload options are required and symmetric service should be available to those end-users who require it.

Principle 3: Affordability

Ultra high-speed broadband needs to be available at rates people can afford.

Affordability is a critical factor that is not adequately addressed by the Task Force. When affordability is mentioned, it often refers to low-income residents and their inability to fit broadband subscriptions into their budgets. This is an important component of

affordability, but not a comprehensive look. Even so, the Task Force does not prescribe any detailed solutions to this problem.

The Task Force also misses the opportunity to express strong support for providing places for public access, including more resources for libraries, schools, college campuses, workforce centers and community centers.

Affordability also affects the broader community. Businesses of all sizes rely on competitively priced broadband services to operate their businesses in the global marketplace. Expensive broadband is a drag on business performance and profitability. Expensive broadband discourages adoption of new technology applications that could increase sales, cut administrative costs or otherwise impact the business. More broadly, this cost consideration impacts schools, health care providers, local governments and not-for-profit organizations. Affordable broadband would provide a competitive advantage to Minnesota firms and organizations.

Many of the costs to install and maintain networks are falling. Both fiber and electronics costs are decreasing. The price of bandwidth, especially at the network core, has dramatically decreased. While providers have increased the speed of their offerings, the price per megabit in the United States is much higher than many of our global competitors.

Affordability of middle mile connectivity affects the price that all users pay, including small Internet Service Providers. Developing strategies, such as subsidies or tariffs, to ensure affordable bandwidth to rural network hubs would lower the costs of access for all.

More affordable broadband services would spur subscription and enable a broad range of application development and implementation by business, schools, health care providers and government.

Principle 4: Competition

Competition among service providers should be encouraged. Competition increases customer choice and promotes innovation.

The Task Force does not effectively encourage competition in the broadband marketplace. We recognize from our own experience the challenges of reaching agreement on the specifics of how to increase competition, as any change in the status quo will create winners and losers in market share and/or regulatory authority. Some approaches to increasing competition may even undermine efforts to achieve another principle, like Ubiquity. But these difficulties only underscore the need for Task Force leadership in this area. There is a wide range of possible approaches to spurring innovation, lowering prices and improving customer service. While the Blandin Broadband Strategy Board is divided on which would bring the greatest benefit to the greatest number of Minnesotans -- especially those currently un- or underserved -- we encourage the Task Force to do the hard work of analyzing relative costs and benefits using the lens of its charge to articulate a broadband vision for Minnesota. Examples of the range of possible strategies that would benefit from Task Force analysis include:

- Change in franchise laws enabling telecom providers to deploy triple play services in only a portion of a city rather than requiring 100% overbuild, while protecting the public benefits of current local franchising processes.
- Encourage the separation of the network ownership from the delivery of services so that competitive providers can enter a market without the costs of network deployment.

- Eliminate the 65% city referendum for the provision of voice services by local governments.
- Make the public sector eligible for any incentives prospectively available to the private sector to stimulate investment in competitive telecommunications networks.
- Identify and remove regulatory and capital market barriers to increased competition, including new infrastructure investments.

Principle 5: World Class

We must achieve world-class state-of-the-art service based on global standards. We cannot afford just to be better than our neighboring states.

The Strategy Board generally supports the aspirational goals of placing Minnesota in the top five states in both speed and adoption. A global top 15 goal is also acceptable for adoption. We are concerned that the Task Force stopped short of an international speed aspiration goal as our competitive position requires that we have comparable services in this critical infrastructure.

The numeric goals fall far short of where we need to be. Minnesota’s two largest telecommunications providers already market services at or above these levels, though issues of availability and affordability are present. Similar task forces in the United States and around the world have goals of 100 Mb or 1 Gb; many of these states or countries have funding mechanisms in place to achieve these goals. As we market Minnesota to high technology companies for investment, what message does this underwhelming goal send to the marketplace?

The Task Force has also stopped short in recommending specific mechanisms for providing public sector funding or for stimulating private sector investment in broadband. It would be extremely helpful to narrow the choices for legislative leaders with some assurance that the options would be successful in stimulating investment.

In summary, it is a disappointment that the Task Force has set a low numeric speed goal accompanied by no recommendations for funding or regulatory mechanisms to assure progress towards the goal.

The Task Force should be recognized for its excellent work towards making the network more robust and secure; this is a critical component of world class and will be of great benefit to Minnesota’s high technology business environment.

Principle 6: Collaboration

The deployment and utilization of ultra high-speed broadband is a challenging goal that can benefit from public and private entities working together.

The Task Force focus on collaboration in market development activities is welcome. Both providers and the state will benefit when all citizens can access the Internet and have the skills to get the online information they need and want. Over the past several years, Blandin Foundation has focused the great majority of its broadband development resources towards this strategy. Positive results have been documented by the Center for Rural Policy and Development. These activities always have included active recruitment of all area telecommunications providers as essential partners in market development. Providers who have engaged as partners in these initiatives have benefited from increased sales and enhanced community relations.

Lacking in the Task Force report, however, is any clear supporting language about the role of government in infrastructure development and broadband service delivery. Some municipal providers have a successful track history of providing telephone, cable and data services. The authority to own and operate municipal telecom networks is legislatively authorized and has been confirmed by the Minnesota Supreme Court. The growing interest in broadband issues at the county level provides a credible alternative to inadequate private sector investment. Communities, whether municipalities or counties, can choose the infrastructure development and operations model that best suits their situation and preferences. The Task Force report should clearly support this approach as a legitimate model.

The Task Force focuses on collaboration between the private and public sector, but there is clearly opportunity for collaboration on infrastructure development between cities, among cities, counties and groups of counties as well as between the state and local units of governments. Public sector investments should be fully leveraged to obtain maximum community benefit.

Principle 7: Neutrality

Ultra high-speed broadband policy should be promoted regardless of the technology platform that delivers it. The best technology for delivering ultra high-speed broadband may not have been invented yet.

When written, the principle of neutrality focused on the need to recognize that different network technologies have unique advantages that might be most suitable depending on circumstances. In addition, the dynamic nature of technology development should preclude the Strategy Board or other state policies from citing one technology as the “one.”

Neutrality has taken on additional meanings in recent years. Both the FCC and the USDA/NTIA ARRA funding programs outline criteria for ensuring access and use of networks that would improve competition and maximize the ROI from any public dollars invested in partnerships with or as subsidy to private sector providers. The Task Force should examine these criteria and their possible applicability to any financial incentives created by the State of Minnesota.

Principle 8: Interoperability

Regardless of the technology used for ultra high-speed delivery, all systems must seamlessly interoperate with all other technologies.

The Strategy Board agrees with the Task Force and their recognition of the importance of interoperability, especially with regards to critical applications--public safety, health care and education.

Other Considerations

The Strategy Board applauds the Task Force’s recommendation to continue the important work it has begun through the formation and support of an ongoing continuing broadband advisory committee. Monitoring results, trends and emerging telecommunications issues will be critical to ensuring progress towards the goal. The membership of this advisory committee will be crucial to its success. Diverse voices and perspectives must be included. Specifically, we urge the participation of more community representatives and end-users, especially those with strong technology backgrounds and needs – from large and small businesses, historically marginalized and disadvantaged populations, health care, education and government. We believe these representatives would be well positioned to identify and implement collaborative strategies to bring world class broadband throughout Minnesota.

The Strategy Board agrees with the Task Force on the importance of communities in the broadband discussion. We encourage the Task Force to define community in the report as a flexible term meaning a self-defined area that may be a city, school district, county, reservation, or region.

We know through the Connected Nation mapping that most cities have at least one source of broadband defined as 768k. The areas that lack this service are mostly outside of city boundaries in the surrounding rural countryside. These townships often lack the organizational or financial capacity needed to address broadband issues on their own, much less the market potential to solve their broadband problems independently.

As with the speed goal, however, the Strategy Board finds inherent conflict in the report about the role of communities. On one hand, the Task Force promotes the concept of communities addressing their own broadband challenges and places responsibility on the community to do so. On the other hand, the Task Force only grudgingly recognizes the right of communities to invest in infrastructure and provide service, and recommends only public-private partnerships. We all know that partnerships require at least TWO willing participants and the private sector is often the partner who is absent.

The Strategy Board believes that the report should recognize the need for an enhanced role for state government in providing leadership, regulation and financial tools to ensure that Minnesota remains competitive in the global economy. Publicly funded infrastructure networks need to be opened to the public. Requiring hundreds of unique solutions for each community, health care provider, school district, business or citizen is not the most effective or efficient way forward. Government provides funding for the telecommunications needs of many of these public sector organizations already, so maximizing the cost-effectiveness of these dollars would result.

In summary,

1. Focus on the Broadband Gap. More emphasis should be placed on the need to design and implement financial tools to incent service in Minnesota's remaining un- and under-served areas.
2. Address affordability. Prohibitively expensive broadband does not count as ubiquitous. Developing strategies that incent reductions in the cost of middle mile connectivity, including to rural network hubs, would lower the costs of access for all.
3. Upload speeds matter. More upload options are required and symmetric service should be available to those end-users who require it.
4. Competition is good for customers. More specific focus should be paid to the need to encourage competition, including by municipal or other public sector entities, leading to innovation, lower prices and improved customer service.
5. Encourage investment. The report should address the need for specific mechanisms for providing public sector funding or incentives and for stimulating private sector investment in broadband. Minnesota must commit to making the necessary investment to become a world leader in the universal deployment and use of ultra high-speed broadband.
6. Be inclusive. Insist that the voices and perspectives of communities and end-users are well represented on the proposed State Broadband Advisory Committee.
7. Aim higher. Include an international speed aspiration goal and adopt more aggressive numeric goals.