

U.S. Small Businesses are hungry for more Fiber

Small businesses across the U.S. are facing unprecedented challenges brought on by the Covid-19 crisis. With the reliance on internet connectivity growing due to an increase in telecommuting, videoconferencing, e-commerce and many other online activities, fast reliable access has become much more important for smooth operations, and in some cases, simple survival in just a few months.

The deployment of fiber-based internet to residential internet users has been a focus of the Federal Communications Commission for over a decade, but with the stress on small businesses brought on by the Covid crisis, the spotlight is being shone on fiber access for SMBs.

In a June 2020 Webcast *“The State of PON Applications in the Telco Market”*, the Broadband Forum hosted an event that included service provider from across the globe. Fiber experts from AT&T, CityFibre, Orange, Verizon and Vodafone shared plans for passive optical networking deployments.

In the U.S., analysts have been ***watching AT&T’s progress*** and its potential impact on the competitive landscape across the mobile, commercial and consumer markets.

Presenting at the Broadband Forum webcast, an executive from AT&T’s Network Planning & Engineering group outlined AT&T’s plans for U.S. passive optical networking (PON) fiber deployment. Since AT&T announced its initial FTTP deployment in Austin in 2013, the company has built fiber reaching over 14 million customer locations. Overwhelmingly, the underlying infrastructure was built using Gigabit Passive Optical Networking (G.PON) technology.

G.PON is the standard that most of the mass market fiber is built on today and can deliver 2.4Gbps downstream and 1.2G upstream. While used for business connectivity and mobile traffic backhaul, G.PON was first and foremost a consumer broadband service.

This next generation of PON technologies now being rolled out is ***much more than a consumer play***. The role of mass market fiber is entering the first stage of “unified access” where the network is used for fixed and mobile backhaul and connecting to all sizes of businesses in addition to serving consumers. As a result, the choices for deployment decisions will likely be different than they have been in the past which mapped to high return residential territory. The new PON buildout is more likely to target 5G requirements and ***commercial locations*** as priorities.

In March 2020, AT&T announced its initial next-generation PON deployment strategy. The company has chosen to deploy XGS-PON, a technology that has the capability to deliver symmetric 10Gbps service.

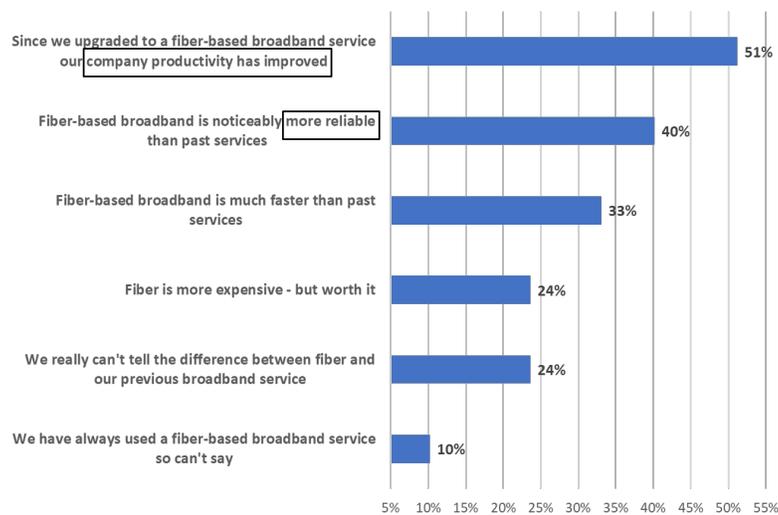
- **Symmetric bandwidth** capacity was listed as one of the top reasons for deploying XGS-PON - rounding out the top three reasons were:
- **Latency:** *“AT&T considers latency a key metric when designing a network.... fiber services are the gold standard benchmark for low latency.”*
- **Reliability:** *“Is higher for AT&T Fiber as its built with a 100% passive optical fiber network compared to designs using active electronics in the outside plant.”*

Market Impact

Increasing fiber deployment throughout the U.S. marketplace has many analysts considering the impact on the competitive environment. The effect on the consumer market has been well covered, but in this time of small business turmoil, the availability of fiber to small businesses is more important than ever. To help measure the potential effect on the SMB marketplace, in June 2020 *Independence Research LLC* surveyed 500 U.S. small business ICT decision-makers to better understand their internet requirements.

The following chart gives a good view of fiber's **impact on small business productivity**:

Q. You indicated your company uses a fiber-based broadband service - which of the following statements do you agree with? (Please select all that apply)



Source: Independence Research 2020

Other Key Findings

- Of those SMBs that had an internet technology preference 44% **preferred receiving internet services over fiber**, vs. 28% over any kind of wireline technology and 27% over a wireless network
- 40% of respondents indicated that **symmetric speeds were the best fit** for their business – compared with 24% who indicated that downstream speed was “what really mattered”
- At 65%, Internet **reliability was the top reason** SMBs were satisfied with their internet provider followed closely by fast speed at 64% - low price was just 30%

Please contact Matt Davis at mdavis@independenceresearch.com for more details on the study...