Fund Fiber Optic Broadband, NOT WIRELESS Broadband

The United States is planning its future broadband infrastructure. Public input asking for safe, secure, reliable, extremely high speed, and energy efficient is needed. Fiber optic broadband delivers all these. **Support Fiber Optic Broadband.**

Why?

Fiber optic broadband is the state-of-the-art gold standard in broadband. It is far and away the **highest speed, highest capacity, and most reliable option for broadband.** Wireless isn't even close. Furthermore, it is **safe, secure, and energy efficient**.

Fiber Optic Broadband Necessary for Economic Development

The economic development benefits promised with broadband buildout require state-of-the-art broadband connections to be realized. Video conferencing, distance education, and remote surgeries all require large amounts of bandwidth, speed, and great reliability which, as demand grows, can only be provided by fiber optic broadband. See http://www.businessweek.com/magazine/content/11 09/ http://www.businessweek.com/magazine/content/11 http://www.businessweek.com/magazine/content/11 <a href="

Fiber Optic Broadband is Secure

Unlike wireless - which should not be trusted with proprietary or confidential information because it broadcasts it everywhere, making hacking easy - fiber optic broadband signals are contained within a fiber optic cable - making hacking a difficult physical process.

Fiber Optic Broadband is Energy Efficient

Fiber Optic Broadband is energy efficient - using substantially less energy than wireless - and does not expose wildlife and vegetation to radiation. http://www.lowtechmagazine.com/2009/06/embodied-energy-of-digital-technology.html#more

Fiber Optic Broadband is Safe

The light signal utilized by fiber optic broadband is fully contained within the fiber with no electromagnetic field or hazardous radiation.

The pulsed radio frequency radiation used by wireless technology was recently classified by the IARC of the World Health Organization as a Class 2B human carcinogen, despite incredible industry pressure not to (http://cnews.canoe.ca/CNEWS/Politics/2011/07/01/18363956.html). Several extremely damning replicated studies were not even included in the supporting evidence for the classification, suggesting a stronger classification should be in order. U.S. FCC safety guidelines were developed in order to protect a 6ft 185 lb male from tissue heating during a six minute exposure. They are not meant to protect even that large healthy male from non-thermal biological effects. They have no relevance at all for protecting anyone - man, woman, pregnant woman, fetus, or child - during the chronic daily exposures we now face.

Wireless Technology Causes Radio Frequency (RF) Sickness

Chronic exposure to RF radiation, including the pulsed microwave radiation used by wireless technology, causes symptoms variously known as Radio Frequency Sickness, Radio Wave Sickness, and Microwave Sickness.

The symptoms (abbreviated list at right) result from functional impairment of the body's processes. RF radiation can affect enzyme function, impair proper function of Ca2+ channels, impair secretion of hormones like melatonin, and so on. These effects can have very real consequences. Alzheimer's disease, multiple sclerosis, autism, diabetes, asthma, ADHD, and numerous other health conditions appear to be linked to exposure to radio frequencies, both of transmitted and electrical pollution origin. Affects on cardiac rhythm and function are being reported. Children are also affected. (http://

Symptoms of radio frequency sickness (abreviated):

Headaches, sleep problems, facial flushing, ringing in ears, difficulty concentrating, fatigue, dizziness, irritability, increased stress and agitation, heart palipitations, tingling sensations, heaviness in chest and lungs, flu-like symptoms, joint and muscle weakness/aches,

<u>www.safeschool.ca</u> and <u>http://www.magdahavas.com/?s=bradycardia</u>) To read more about this and other symptoms of radio frequency sickness, please visit <u>www.magdahavas.com</u> or <u>www.electricalpollution.com</u> for more information.

Wireless Technology Damages the Environment

The microwave radiation from wireless technology is causing reproductive, navigational, and health problems for birds, bees, and bats (http://www.hese-project.org/hese-uk/en/issues/nature.php? id=bees). Vegetation is not immune - bark fissures are being reported on trees exposed to WiFi. Dead trees, bushes, and plants are being reported in areas with strong RF signals. (http://www.popsci.com/technology/article/2010-11/wi-fi-radiation-killing-trees)

National Governments Warn Against Use of Wireless

Switzerland, France, Germany, Russia, Israel and the Parliamentary Assembly of the Council of Europe (PACE) are all warning against unnecessary exposure to wireless signals and recommend preferential use of wired technology.

Fiber Optic Broadband is Practical

Fiber optic broadband to the premises is practical and essential just as universal electrification and phone service was practical and possible. There are now various models across the U.S. and the world for providing fiber optic broadband service directly to homes and businesses (http://www.ftthcouncil.org). Switzerland is providing fiber optic access to schools for free, provided that they do not use wireless inside the school, they feel so strongly about SAFE internet access. http://www.magdahavas.com/2010/10/20/free-internet-access-in-swiss-schools-no-wifi/

Support **The Coalition for Local Oversight of Utility Technologies** (http://www.cloutnow.org/) with your local efforts as they work towards getting Section 704 of the 1996 Telecommunications Act changed and support the use of fiber optic broadband in place of wireless.