# WIRELESS USB

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- Universal serial bus (USB) technology has been a popular connection type for PCs.

- Migrating into consumer electronic (CE) and mobile devices.

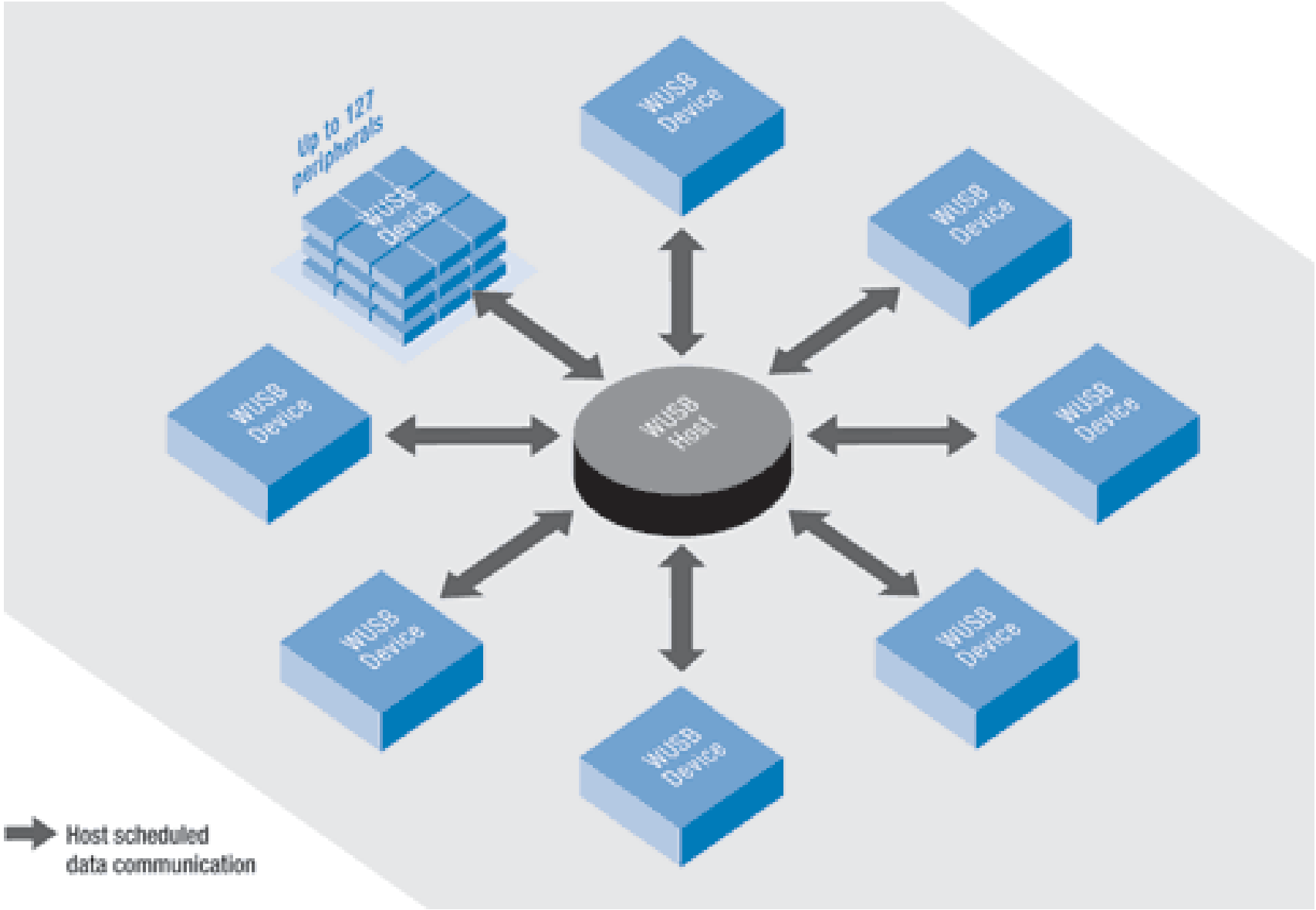
# PERIPHERALS

- Mouse, Keyboards, and Other Human Interface Devices
- Digital Cameras
- Printers
- Cameras
- Hard Drives

# Advantages of Using a Wireless USB Hub

- ***Ease of Moving :*** *move from place to place*
- ***Less Mess :*** *number of physical connections*
- ***Increased Range :*** *no restriction in size of devices*

# WUSB Topology



# MUSB Topology

- Host initiates all the data traffic among devices
- Allots time slots and data band widths to each devices
- Relationships are known as clusters
- Connections are point to point and directed between WUSB host and WUSB devices

# Pictures

# Design Considerations

- WUSB must be backwards compatible with wired USB
- Provide a bridge to wired USB devices
- Low-cost implementation of WUSB will also be important to the successful integration of the technology
- Reduce development time
- Preserve the low-cost, easy-to-use model

# Security and Device Association

- Same level of security as wired USB
- Wireless interconnect is easy to install and use
- Wired connections provide the user with implied expectations

# WUSB in the Future

- The first Wireless USB implementations are in the form of discrete silicon
- This include add-in cards and dongles
- To support the technology's introduction and subsequent rapid ramp up
- Wireless future will arrive once WUSB, along with the common ultra wideband platform

# Advantages

- First high-speed wireless personal interconnect technology
- Meet the needs of multimedia consumer electronics, PC peripherals, and mobile devices
- This preserves the functionality of wired USB
- Performance is targeted at 480Mbps at 3 meters and 110Mbps at 10 meters.

# Conclusion

- Wireless USB is a technically-superior interface technology
- The quality of a Wireless USB implementation will depend on the ability to successfully balance high throughput and power
- A poor Wireless USB implementation will repeatedly retransmit as a result of data errors

# Conclusion

- Protocol analyzers are used for detecting and highlighting errors
- Help developers during initial prototyping stages
- Providing productivity-enhancing high-level decode views
- Ensure that performance tradeoffs have been successfully implemented.

# THANK YOU