

Aggregating Taps

Full duplex single port aggregating Ethernet taps

Aggregating taps at a glance

- Enables dynamic insertion of network monitoring and analysis devices without disrupting links
- Provides full visibility without frame arrival time distortion and loss of VLAN tags
- Provides complete access to network traffic
- Aggregate multiple data streams into a single stream for single interface analysis solutions
- Invisible, non-intrusive access to the network
- Provides significant advantages over "port mirroring" for network analysis
- Does not burden switches
- Allows for monitoring, capturing and analyzing physical errors

Product capabilities

Fluke Networks' tap solutions maximize visibility and minimize link downtime on full duplex switched LANs and WAN segments.

Available in a single port configuration, these aggregating taps give access to all network traffic, including all VLAN tags, from both sides of a full duplex link. They are designed to be fault tolerant and enable network monitoring or analysis tools to be dynamically inserted into LAN segments without breaking the link. In-line taps are completely passive to network traffic and allow for analysis of individual segments along with the ability to rove between segments.

Fluke Networks tap solutions can be used with the OptiView Link Analyzer, OptiView Integrated Network Analyzer, Workgroup Analyzers or third-party LAN and security analyzers. Taps provide a cost-effective and unique way for analyzers or probes to see all of the traffic on one or more previously "blind" links. Aggregation Taps allow for monitoring, capture and analysis of full-duplex, links using a common single interface analysis solutions.

- Connect any network monitoring device (protocol analyzer, probe, intrusion detection system, etc.) for permanent in-line monitoring of full-duplex links – eliminates the need for network connectors to be disconnected and connected each time a segment needs to be monitored.
- Two monitor ports allow two devices to simultaneously monitor the same link, providing extended security and analysis options, while eliminating contention for network access.
- Redundant power supply insures seamless monitoring even if the main power source is unavailable.
- Never lose packets from power failure - industry-leading "no break the link" design guarantees network traffic will continue to flow uninterrupted.
- Simple plug-and-play solution – requires no additional configuration of external monitoring devices.
- Easy to install – comes with optional rack mount kit available to hold, 2 or 3 units (at 1U), or 14 units (at 4U)



ATAP-100 Single port dual output Copper Aggregating Tap 100Mbps

Aggregating in-line taps

Traditional taps enable full-duplex monitoring of all traffic on a network link and transmit the data to the monitoring device in two separate half-duplex streams. This requires the monitoring device to have two input channels in order to monitor both sides of the conversation.

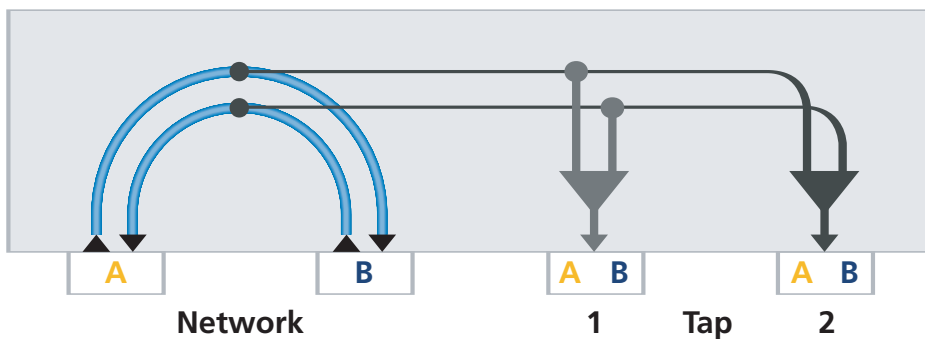
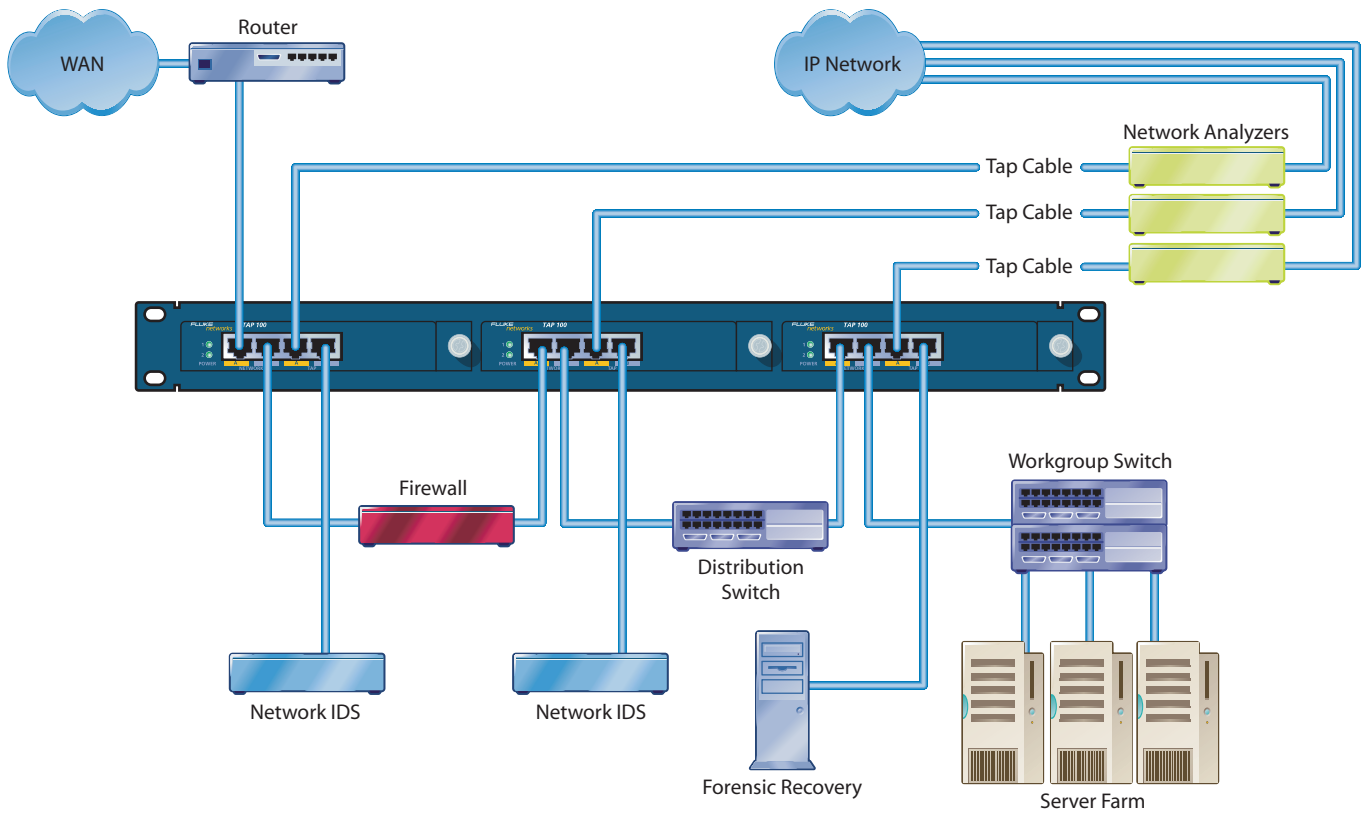
Fluke Networks Aggregating Taps seamlessly combines the two data streams,

allowing any connected monitoring device to receive a full-duplex stream of data with one NIC.

Additionally, the aggregating taps provide a feature to help manage network resources – a second monitor port. With an extra monitor port, two devices (such as an analyzer and an intrusion detection device) can receive the same full-duplex transmission, so there will never be contention for access to the network link.

Although ideal for placement in networks where utilization is consistently under 50% on each side, aggregating taps can help prevent data overload and dropped packets due to traffic “bursts” by incorporating a memory buffer (1 MB) to manage overflows in data transmission and allows seamless continuity of full-duplex monitoring.

Typical In-line Aggregating Tap Application



Aggregating Tap (Functional)

Technical Specifications (Aggregating Taps)

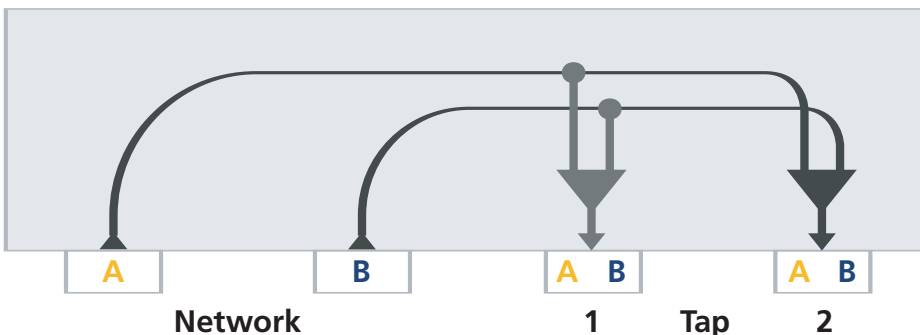
	ATAP-100	ATAP-GIG-BT-BT	ATAP-GIG-BT-SX	ATAP-GIG-SX-SX	ATAP-GIG-SX-BT
Network Ports/Media	10/100 Mbps 1 pair RJ-45	10/100/1000 Mbps 1 pair RJ-45	10/100/1000 Mbps 1 pair RJ-45	1000BASE-SX 2 dual LC Fiber	1000BASE-SX 2 dual LC Fiber
Monitor Ports/Media	10/100 Mbps 2 dual RJ-45	10/100/1000 Mbps 2 dual RJ-45	1000BASE-SX 2 dual LC Fiber	1000BASE-SX 2 dual LC Fiber	1000BASE-T 2 dual RJ-45
Power Requirements	5VDC 1A	2 x 5VDC 1A	2 x 5VDC 1A	2 x 5VDC 1A	2 x 5VDC 1A
Operating Temperature	0° to 40° C	0° to 40° C	0° to 40° C	0° to 40° C	0° to 40° C
Height	1.1 in	1.1 in	1.1 in	1.1 in	1.1 in
Width	5.75 in	8 in	8 in	8 in	8 in
Depth	5.75 in	7 in	7 in	7 in	7 in
Weight	12 oz	12 oz	12 oz	12 oz	12 oz
Rack Mount Kits	TAP-RMK-3 1U 3 Bay RMK-14 4U 14 Bay	TAP-RMK-2 1U 2 Bay	TAP-RMK-2 1U 2 Bay	TAP-RMK-2 1U 2 Bay	TAP-RMK-2 1U 2 Bay

Enhanced security

An Aggregation Tap enhances your security because it allows you to see 100% of your network traffic. Total visibility means no missed packets and no chance of missing a network attack due to port oversubscription, traffic overflow, or many of the problems associated with traditional monitoring methods.

Improved problem resolution time

Aggregation offers a complete view of the traffic. Instead of collecting and manually assembling trace or log files from separate tools on separate network segments, the aggregation tap can easily let security and analysis tools collect all the data they need in a single file. In security applications, events and false positives are recorded fewer times. In all applications, data is analyzed faster than ever, which increases uptime and saves money.



**Aggregating
Span Tap
(Functional)**

Technical Specifications (Aggregating Span Taps)

	ASTAP-100	ASTAP-BT-4x6	ASTAP-BT-SX-2X8	ASTAP-SX-SX-2X8
Network Ports/Media	10/100 Mbps 2 RJ-45	10/100/1000 Mbps 6 RJ-45	10/100/1000 Mbps 8 RJ-45	1000BASE-SX 8 Dual LC
Monitor Ports/Media	10/100 Mbps 2 RJ-45	Gigabit 2 RJ-45 2 Dual LC Fiber	1000BASE-SX 2 Dual LC Fiber	1000BASE-SX 2 Dual LC Fiber
Power Requirements	2 x 5VDC 1A	2 x 5VDC 1A	2 x 5VDC 1A	2 x 5VDC 1A
Operating Temperature	0° to 40° C	0° to 40° C	0° to 40° C	0° to 40° C
Height	1.1 in	1.1 in	1.1 in	1.1 in
Width	5.75 in	8 in	8 in	8 in
Depth	5.75 in	7 in	7 in	7 in
Weight	12 oz	12 oz	12 oz	12 oz
Rack Mount Kits	TAP-RMK-3 1U 3 Bay RMK-14 4U 14 Bay	TAP-RMK-2 1U 2 Bay	TAP-RMK-2 1U 2 Bay	TAP-RMK-2 1U 2 Bay

Aggregating Span Taps - Monitor more network traffic with fewer tools

Network administrators are no longer required to have a separate device for each network segment to achieve simultaneous 24x7 monitoring of multiple links, nor do they need to “switch” to a different segment each time they need to collect data from it. The Aggregating Span Tap simultaneously collects data from multiple network segments and combines all the data before sending it to the connected monitoring and analysis devices, expanding network visibility and reducing the number of tools needed on the network. Fewer tools means lower equipment and licensing costs. With Aggregating Span Taps, you can always view the entire conversation even in asymmetric routing, redundant, and load-balanced environments. The tap also has an additional monitor port (2 and 4-port models available), so multiple Gigabit devices can receive the same data stream. This allows different monitoring and analysis devices to collect data from the same network segments at the same time, eliminating contention for access to the network.