

The world's leading Layer 1 network platform

Ultra-Low Latency

- 4 nanoseconds port-to-port

Feature Rich

- Media conversion
- Signal regeneration
- Dynamic Patching
- Telemetry

Monitoring

- Packet statistic on every link
- Signal quality monitoring

Deterministic

- Virtually no jitter

7130 Connect Series Layer 1+ Switches

Arista's 7130 Connect Series Layer 1+ switches are powerful network devices designed for ultra-low latency of just 4 nanoseconds.

Available in 16, 48 or 96 port device options, they combine a multitude of network functionality on a single device:

- Signal regeneration
- Media conversion
- Port mirroring
- Telemetry
- Dynamic patching/link management
- Layer 1+ statistics on every link

All network devices are deterministic with virtually undetectable jitter as they neither buffer or queue data, hence utilizing 100% of available bandwidth.

The 7130 Connect Series platform is packet-aware providing comprehensive packet statistics, signal quality monitoring including eye diagrams, and diagnostics. Packet replication provides the ability to sniff packets without affecting the data path.



7130 Connect Series Layer 1+ switch

Feature	Description
Ultra-low latency	Fan-out with 4 ns of latency, equivalent to a single meter of fibre or copper interconnect, and insignificant jitter.
Ethernet media conversion	Reduce costs by converting between different Ethernet media types. E.g. one end of a link can be 10G twinax and the other 10G-BASE-LR single-mode fiber.
Multi-feature	Save rack space and reduce complexity by leveraging dynamic patching, tapping, 1:N replication, telemetry, and comprehensive port statistics on a single device.
Flexible SFP/SFP+ support	Make significant cost savings through the support of most SFP/SFP+ transceivers including DWDM and direct attached copper cables; boosted by high-performance signal recovery and regeneration.
Deterministic	Replace taps to monitor or share feeds such as market-data with full regeneration and no additional overhead.
Packet statistics	Leverage advanced monitoring and capture high-level packet statistics across all ports. Receive detailed switch statistics via SNMP or CLI and obtain tcpdump and LLDP on every port.
64-bit x86 management processor and MOS	Leverage an open standards platform and MOS operating system to provide user extensible solutions.
Remote configuration	Change mappings between ports at any time via a number of standard APIs with no physical reconfiguration required. Wire-once to reduce visits to the data center and save on remote hands

Why use Arista 7130 L1+ switching devices?

- Leverage the lowest latency network devices on the market
- Troubleshoot and manage your network by receiving packet statistics and monitoring across all ports
- Save cost through remote patching, flexible SFP/SFP+ support and media conversion
- Simplify your network architecture by replacing a rack loaded with separate devices

MOS Operating System

MOS is a custom distribution of the popular Linux operating system, optimized for configuring and managing the 7130 platform. It provides many of the familiar utilities and tools such as the Bash shell and support for RPM packages available from general-purpose Linux distributions such as Red Hat and CentOS.



7130 Connect Series Layer 1+ device

MOS has a number of tools and features including:

- Command-line interface (CLI), web user interface & JSON-RPC API via HTTP/HTTPS
- Integrated telemetry via the InfluxData TICK Stack (Telegraf, InfluxDB, Chronograf and Kapacitor)
- Application monitoring e.g. the Layer 1 switch or telemetry
- SNMP support including traps on environmental, authentication, link state, memory, disk, load
- Ability to load FPGA images from the MOS CLI or Linux shell command-line utilities

Platform	7130-16	7130-48	7130-96
Description	16 port Layer-1 Switch	48 port Layer-1 Switch	96 port Layer-1 Switch
SFP+ Interfaces (100M-11.3Gbps)	16	48	96
Port-to-Port Latency	4 ns	4 ns	6 ns
RU	1	1	2
Airflow	Front-Rear or Rear-Front	Front-Rear or Rear-Front	Front-Rear or Rear-Front
Power Supplies	Redundant AC or DC	Redundant AC or DC	Redundant AC or DC