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Solution Brief

Skylight Enhanced Service Demarcation

As service providers roll out new services with more demanding service level agreements (SLAs) and higher customer expectations, service demarcation solutions are as important as ever. Maintaining customer satisfaction, while keeping service delivery and support costs down, is even more critical and challenging in highly competitive markets. Accedian Skylight's service demarcation capabilities automate service delivery and monitor all services with high performance, reliability and precision in near real time. Service issues can be quickly identified and resolved with built-in data analysis and intelligent machine learning capabilities.

Skylight service demarcation solutions can be tailored to support diverse use cases in mobile backhaul including 5G, Business Ethernet and edge computing applications.

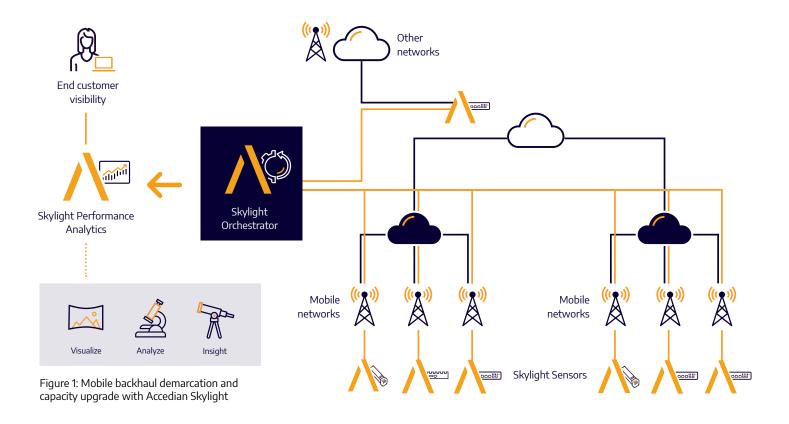
Benefits

- Cost effective low-latency service demarcation with zero impact on end-to end service performance
- Dependable service assurance visibility:
 - Continuous performance monitoring regardless of scale and traffic
 - Near real-time granular and high-precision performance metrics and KPIs
- · Automated delivery of new services, activation testing, validation and performance monitoring
- Performance data analytics in real time for proactive monitoring and issue resolution

Mobile Backhaul

Delivering services to mobile cell sites is simple with Accedian Skylight. Skylight sensors support optical or electrical interfaces and can be deployed to deliver services in different environments and temperature conditions. The smaller form factor sensors can be deployed when limited real estate is available or SFP compute can be used for zero-footprint environments. These devices also support quick and effortless bandwidth upgrades while maintaining performance assurance precision and accuracy. Skylight zero-touch provisioning automation means new services can be deployed quickly on a small or large scale.

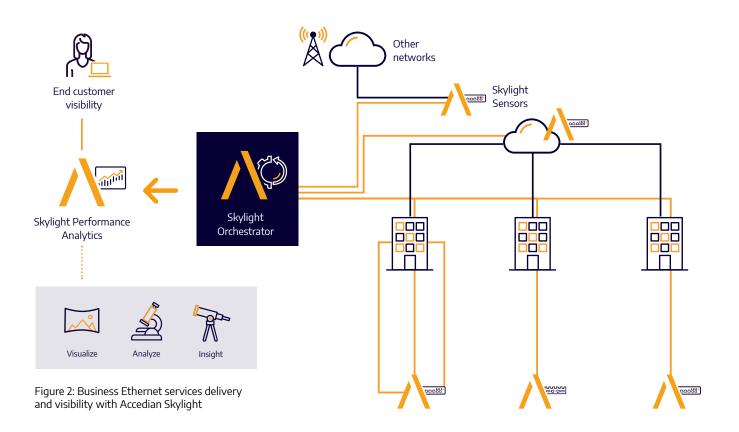
Higher capacity 1GB or 10GB Skylight sensors support thousands of services without impacting performance monitoring accuracy and precision. For external network-to-network interface (ENNI) demarcation use cases, the sensors can monitor all services and enforce service level agreements (SLAs) to third-party network providers of Ethernet access and mobile backhaul services. An example is AAV/Type II service providers providing an E-Access service purchased by a carrier of record delivering an E-Line service.



Business Ethernet

Skylight supports a variety of business services applications. Service providers can deploy a single service to customer locations using Skylight modules or SFP compute sensors. When delivering multiple services to a customer or serving multiple customers at the same site, it is often more cost effective to deploy multi-port Skylight sensors. The higher capacity multi-port elements are also ideal for service providers serving multiple customers or delivering multiple services in the same building or area. Once deployed, it's easy to roll out additional services from that same unit without the need to deploy any additional hardware.

The small form factor sensors make it easy to upgrade bandwidth quickly for end customers. For business services that require extended temperature solutions, the hardened version of the Skylight sensors can be deployed. Small footprint sensors save space and improve rack port density or power efficiency of the chassis in colocation data centers.



Skylight Enhanced Demarcation Solution

Skylight enhanced demarcation orchestrates service delivery, enables precise and granular performance assurance and provides near real-time actionable insights.

Skylight Sensors

Skylight sensors deliver industryleading wire-speed performance, service assurance accuracy and granularity, scalability, and standards-based interoperability. The sensors also offer traffic conditioning and hierarchical quality of service (H-QoS) enforcement that help optimize per-flow performance to maximize resource utilization. The industry-leading accuracy and precision of the performance metrics generated by Skylight sensors are critical for real-time service assurance, regardless of the number of services or traffic running on the devices.

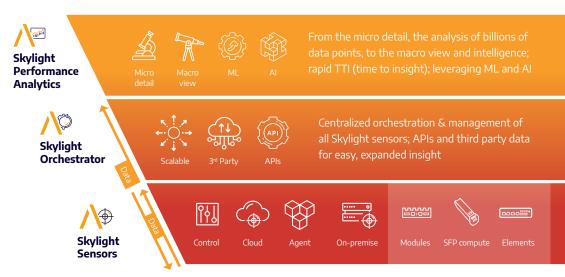


Figure 3: Accedian Skylight components, a service demarcation solution

The larger form-factor Skylight elements, support customer service demarcation and aggregation, as well as ENNI demarcation scenarios. The more compact Skylight elements and modules are ideal for delivering services to customer locations with space constraints; mobile backhaul (including 5G), small cell and Business Ethernet applications. For zero-footprint or fiber exhaust applications, the pluggable SFP compute (1G or 10G) are ideal solutions.

Skylight Orchestrator

Skylight orchestrator provides management and orchestration of all Skylight sensors, automating service delivery, validation, fault management and performance monitoring. It is highly scalable and can quickly deploy and manage a small number or thousands of sensors and performance assurance sessions across the entire network. Skylight orchestrator combines open APIs and a web user interface for easy sensor lifecycle management and automation of service provisioning and performance data collection.

Skylight Performance Analytics

Skylight performance analytics combines performance data and granular metrics from all of the Skylight sensors (and optionally third party data sources) to provide dashboards and reporting tools. High volumes of time-series data can be analyzed in near real-time, providing levels of visibility, flexibility and speed that are not possible with legacy performance monitoring tools.

Skylight performance analytics can also enrich the metrics with metadata and correlate this metadata, which helps segment the views of the network more precisely. This helps service providers to keep service KPIs and SLAs on track, as well as enabling them to proactively manage their network evolution and resolve issues.

About Accedian

Accedian is the leader in performance analytics and end user experience solutions, dedicated to providing our customers with the ability to assure their digital infrastructure, while helping them to unlock the full productivity of their users.

Learn more at accedian.com