



AIS, THAILAND'S TOP MOBILE PROVIDER, ENABLES DIGITAL LIFE WITH JUNIPER ADVANCED SERVICES

Summary

Company:

Advanced Info Service (AIS)

Industry:

Telco Services

Business Challenges:

Optimize and operate a growing network to meet subscriber demand and introduce new revenue-generating services

Technology Solution:

- Juniper Advanced Services, including Service Manager and Resident Engineer
- Junos Space Service Now
- PTX5000 Packet Transport
- MX2020 and MX960 5G Universal Routing Platform.
- QFX10002 and QFX5100 Switches
- EX4600, EX4550, EX4300,
 and EX4200 Ethernet Switches

Business Results:

- Enabled continuous expansion of transport network to meet subscriber growth and introduce new services, such as unlimited entertainment and business cloud
- Leveraged Juniper expert services to ensure network availability and resolve incidents faster
- Optimized network operations with best practices

As a digital life services provider and the largest mobile operator in Thailand, Advanced Info Service (AIS) never stops innovating and enhancing. Its 3G network covers 98 percent of the country, and its 4G network covers 65 percent of cities across 77 provinces. AIS also offers fixed broadband and digital content, such as entertainment, gaming, and business cloud services.

Business Challenge

More than 39.9 million people depend on AIS for mobile services, and with life increasingly digital, subscriber demands continue to grow. Ensuring that its mobile network is responsive and reliable is critical to AIS, because even a minute of service interruption can damage brand reputation, and negatively impact continued growth.

"People can connect with each other anywhere and anytime, and that has changed people's demands and expectations forever," says Nattawut Thipayapornkul, head of transport network operation at AIS. "Increased interactions are creating a deluge of traffic, and we need to stay ahead of the demand."

The telecom market in Thailand is highly competitive, and AIS faces rising costs for 4G licenses, making operational efficiency critically important. The ability to efficiently roll out new services, such as business cloud, is critical for revenue growth and market leadership.

Technology Solution

To stay ahead of subscriber demand and maximize its market reach, AIS planned a major expansion of its IP transport network, which carries mobile traffic and business VPN, including Wi-Fi Internet service, across Thailand. The IP/MPLS transport network consists of the Juniper Networks® PTX5000 Packet Transport Router, and Juniper Networks MX2020 and MX960 5G Universal Routing Platforms. The Juniper Networks QFX10002 Switch, Juniper Networks QFX5100 Switch, and Juniper Networks EX4600, EX4550, EX4300, and EX4200 Ethernet Switches support extensive big data analysis, which enables AIS to glean greater insights into customers' needs.

"Juniper's Advanced Services team enabled us to expand the network faster and accelerate the time-to-value."

- Nattawut Thipayapornkul, Head of Transport Network Operation, AIS

All of these platforms use Juniper Networks Junos® operating system, the single operating system that powers Juniper's portfolio of physical and virtual networking and security products. Building on 20+ years of innovation, reliability, and security, Junos OS provides the high availability, automation, and carrier-grade MPLS feature set that AIS needs. Junos OS offers a suite of APIs that improve programmability, customization, and automation, which increases operational efficiency and frees up valuable personnel time and resources for top-line growth opportunities. Additionally, a unified inservice software upgrade (unified ISSU) capability allows the IT team to upgrade Junos OS software without interruption, which reduces risks and adds competitive advantage.

"By relying on Juniper products, solutions, and services, we can stay ahead of growing consumer and business traffic demands while operating efficiently. We can reduce TCO with a highly flexible, high-performance transport network and be more agile to optimize our existing network resources and roll out new revenue-generating services faster."

- Nattawut Thipayapornkul, Head of Transport Network Operation, AIS

AlS relied extensively on Juniper Advanced Services to help design and operate the IP/MPLS transport network. Juniper Professional Services helped AlS assess and develop a strategic plan to address its key challenges, and Juniper Advanced Services worked proactively to develop solutions to overcome those challenges. The Juniper Resident Engineer, Service Manager, and Advanced Services systems engineering team worked to validate solutions for AlS and test new features. Advanced Services also defined best practices for deployment to reduce the risk of introducing new features and services, which would enable AlS to advance with innovation and remain competitive in the highly competitive market.

Expert help from the Advanced Services team was key to a smooth implementation of new Juniper routing and switching. A pair of Resident Engineers, working closely with the Service Manager, helped AIS optimize its network investment by maximizing the use of advanced Juniper features to deliver full business value. With expert guidance, the AIS operations team implemented the newly defined best practices to increase operational efficiencies and mitigate risk.

Working in close partnership with Juniper Advanced Services allowed AIS to use its own resources more effectively, while supporting its goals to continuously expand the MPLS network to meet growing subscriber demands and maintain stringent SLAs for operating and managing the network.

With the help of Advanced Services, the AIS engineering and network operations teams fulfilled their new network deployment, meeting operational and engineering requirements and resolving technical issues in an effective and timely manner. "Juniper's Advanced Services team enabled us to expand the network faster and accelerate the time-to-value," says Thipayapornkul.

Regular transfer of knowledge between Advanced Services and AIS was critical to effectively enhance capabilities and productivity to improve network operational efficiency and reduce overall operational costs for AIS.

Business Results

"By relying on Juniper products, solutions, and services, we can stay ahead of growing consumer and business traffic demands while operating efficiently," says Thipayapornkul. "We can reduce TCO with a highly flexible, high-performance transport network and be more agile to optimize our existing network resources and roll out new revenue-generating services faster."

AIS reduced the number of problem tickets raised to the Juniper Technical Assistance Center (JTAC). Thanks to the rich experience and in-depth routing knowledge of the Juniper Advanced Services team, the AIS engineering team gained useful insights into its everyday processes and received tailored recommendations for best practices and valuable advice on effectively using proactive tools. Due to the support provided by the Advanced Services team, the number of tickets raised to JTAC was reduced by 70 percent.

AlS built more than a fast, reliable network to meet consumers and businesses' ever-growing demand for mobile and Internet service. With a network that scales easily and efficiently, AlS can profitably meet subscriber demand for mobile and broadband, as well as expand video, gaming, mobile money, enterprise cloud services, and Internet of Things (IoT) platform services. Expert assistance and automated support has enabled AlS to reduce downtime and costs while delivering a better service.

Working with Advanced Services enabled AIS to reduce network downtime on the transport network. In one particularly challenging instance, an incident occurred that did not cause an alarm, but that could have led to service downtime. The Juniper Service Manager collaborated with internal experts and

external related parties to explore the best solution to address the issue in the future. As a result, a special method to monitor and detect the trigger point was developed, and operational procedures and troubleshooting instructions were created. With these expedient actions, the risk of future network interruptions and downtime related to this issue was effectively mitigated, and AIS was pleased by how astutely and quickly Juniper managed the situation. AIS can now resolve incidents more efficiently and quickly with the Juniper Resident Engineer, who uses a strong service mindset to better understand the essentials of the network and the crucial nature of the services AIS provides its end customers. Positioning business success as the top priority ensured that AIS and its systems integration partner could always reach out to Juniper when help was needed—24/7—so that incidents could be resolved more quickly.

Next Steps

With the ability to continuously expand its network to meet the demand for mobile and Internet services, AIS is well-positioned to introduce innovative new digital services and bring the power of digital life to Thai people everywhere, while controlling operating costs. And that will help AIS maintain its market leadership position.

For More Information

To find out more about Juniper Networks products and solutions, please visit www.juniper.net.

To learn more about Juniper Services and Support, please visit $\underline{\text{www.juniper.net/us/en/products-services/services/technical-services/}.$

To learn more about the business value of supporting networking operations using Juniper Resident Engineers, read the IDC whitepaper: www.juniper.net/assets/uk/en/local/pdf/ whitepapers/2000661-en.pdf.

About Juniper Networks

Juniper Networks brings simplicity to networking with products, solutions and services that connect the world. Through engineering innovation, we remove the constraints and complexities of networking in the cloud era to solve the toughest challenges our customers and partners face daily. At Juniper Networks, we believe that the network is a resource for sharing knowledge and human advancement that changes the world. We are committed to imagining groundbreaking ways to deliver automated, scalable and secure networks to move at the speed of business.

Corporate and Sales Headquarters

Juniper Networks, Inc. 1133 Innovation Way Sunnyvale, CA 94089 USA

Phone: 888.JUNIPER (888.586.4737)

or +1.408.745.2000 Fax: +1.408.745.2100

www.juniper.net

APAC and EMEA Headquarters

Juniper Networks International B.V. Boeing Avenue 240 1119 PZ Schiphol-Rijk Amsterdam, The Netherlands

Phone: +31.0.207.125.700 Fax: +31.0.207.125.701



Engineering Simplicity



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