Executive Summary

Today's business environment is characterized by continual changes and business needs rapidly evolve across various organizational functions of companies. In this dynamic and rapidly-changing business environment, IT often struggles to gain adequate visibility and control, to ensure security policies and regulatory guidelines are complied with. Effective security policy management that accommodates the dynamic nature of today's organizations is a key challenge for many IT departments.

Fortinet and AlgoSec have partnered to deliver an industry-leading security solution to address these needs. Bringing together AlgoSec's business-driven security policy automation with Fortinet's industry-leading FortiGate® network security firewall platform enables customers to benefit from AlgoSec's comprehensive security policy lifecycle management capabilities, while simultaneously leveraging the best-validated security protection in the industry provided by Fortinet.

Joint Solution Description

AlgoSec seamlessly integrates with the industry-leading Fortinet FortiGate® network security firewall platform through the Fortinet Security Fabric application programming interfaces (APIs), providing customers with unified security policy management across their heterogeneous networks. Through a single pane of glass, AlgoSec provides holistic, business level visibility of security across your entire heterogeneous network infrastructure, your business applications and their connectivity flows.

With this visibility, customers can auto-discover application connectivity requirements, proactively analyze risk from the business perspective, and intelligently automate time-consuming security changes and enhance them with business context—all with zero-touch, and seamlessly orchestrated across any heterogeneous environment—in the cloud, across security-driven network (SDN) and on-premise enterprise networks.

Unify security policy visibility and management across the heterogeneous and hybrid enterprise. Seamlessly and automatically manage your entire security policy lifecycle across the hybrid and heterogeneous environment.

Auto-discover and manage application connectivity. Automatically discover, identify, and generate a visual map of your enterprise applications and services and their connectivity flows—without requiring any prior knowledge or manual configuration by security, networking, or applications experts. Once discovered, automatically provision, change, migrate, and securely decommission connectivity for business applications through easy-to-use workflows, while enforcing security and compliance across the enterprise and helping to avoid application outages.

Automate security policy change management. Process security policy changes in minutes or hours, not days or weeks, via zero-touch, highly customizable workflows to automate the entire security policy change process.

Joint Solution Components

- Fortinet FortiGate, FortiManager
- AlgoSec BusinessFlow, FireFlow, Firewall Analyzer, Cloudflow

Joint Solution Benefits

- Unparalleled broad, automated and integrated security protection
- Automation-driven network management
- Unified security policy visibility and management across heterogeneous and hybrid enterprise
- Auto-discovery and management of application connectivity
- Automated security policy change management
Update the FortiManager relevant policy with **smart change recommendations** and push the changes to the relevant FortiGate devices.

**Proactively assess and manage risk.** Proactively assess the diagram of joint solution impact of every proposed change to the security policy before its implemented to minimize risk, avoid outages, and ensure compliance. Perform advanced firewall policy optimization, and get out-of-the box auditing and compliance reports tailored to industry regulations including PCI-DSS, HIPAA and SOX, as well as corporate-defined policies.

**Unparalleled Security Protection**—Leverage the industry’s best-validated security protection offered by Fortinet’s FortiGate network security platform to protect against sophisticated cyberthreats.

**Receive a wide range of actionable recommendations** to cleanup, optimize, and tighten your security policy. Uncover unused, duplicate and expired rules and objects, and consolidate similar rules.

Leverage the Fortinet-AlgoSec integrated security solution to simplify and intelligently automate network security policy management to make your enterprise more agile, more secure, and more compliant—all the time.

**Use Cases**

**Easily define and manage micro-segmentation**

The Fortinet solution delivers automated cybersecurity threat detection, security incident response, escalation, and remediation. Fortinet’s award winning FortiGate enterprise firewall platform provides end-to-end security across the entire network. Utilizing Fortinets next-generation firewall (NGFW) AlgoSec makes it easy to define and enforce your micro-segmentation strategy inside the data center, and ensure that it does not block critical business services and meets compliance requirements.

Once the micro-segments are established, AlgoSec seamlessly and automatically integrates with you Fortinet NGFW and manages network security policy across the micro-segmented network inside the data center and across on-premise and public cloud networks outside of the data center. As part of this process, AlgoSec proactively checks every proposed firewall rule change request against the segmentation strategy to ensure that the change doesn’t break the strategy, introduce risk, or violate compliance.

**Figure 1:** Advanced security policy analysis and management.
AlgoSec Security Management Solution

The AlgoSec Security Management solution comprises four separate yet tightly integrated products: AlgoSec BusinessFlow®, AlgoSec FireFlow®, AlgoSec Firewall Analyzer, and AlgoSec CloudFlow.

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FireFlow helps process security policy changes in a fraction of the time, so you can respond to business requirements with the agility they demand. FireFlow automates the entire security policy change process—from design and submission to proactive risk analysis, implementation, validation, and auditing. It's intelligent automated workflows eliminate guesswork and help you save time, avoid manual errors, and reduce risk.

Firewall Analyzer delivers visibility and analysis of complex network security policies across on-premise and cloud networks. It automates and simplifies security operations including troubleshooting, auditing, and risk analysis. Using Firewall Analyzer, you can optimize the configuration of firewalls, routers, web proxies, and related network infrastructure to ensure security and compliance.

CloudFlow delivers full visibility and control of security and compliance in public cloud environments and enables an effective management of the security-control layers across the hybrid and multi-cloud estate. CloudFlow's central management provides instant visibility, risk assessment, and compliance analysis, enabling enforcement of company and regulatory policies, as well as proactive detection of misconfigurations in the cloud.

**FortiManager—Single pane of glass management**

Fortinet Security Fabric delivers sophisticated security management for unified, end-to-end protection. Deploying Fortinet-based security infrastructure to battle advanced threats, and adding FortiManager to provide single-pane-of-glass management across your entire extended enterprise provides insight into network-wide traffic and threats.

FortiManager offers enterprise-class features to contain advanced threats. FortiManager also delivers the industry's best scalability to manage up to 100,000 Fortinet devices. FortiManager, coupled with the FortiAnalyzer family of centralized logging and reporting appliances, provides a comprehensive and powerful centralized management solution for your organization.

**About AlgoSec**

AlgoSec enables the world's largest and most complex organizations to manage security based on what matters most—the applications that power their business. Over 1,800 of the world's leading organizations, including 20 of the Fortune 50, have relied on AlgoSec to automate and orchestrate network security policy management across cloud and on-premise networks, to drive business agility, security, and compliance. Learn more at [www.algosec.com](http://www.algosec.com).

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