

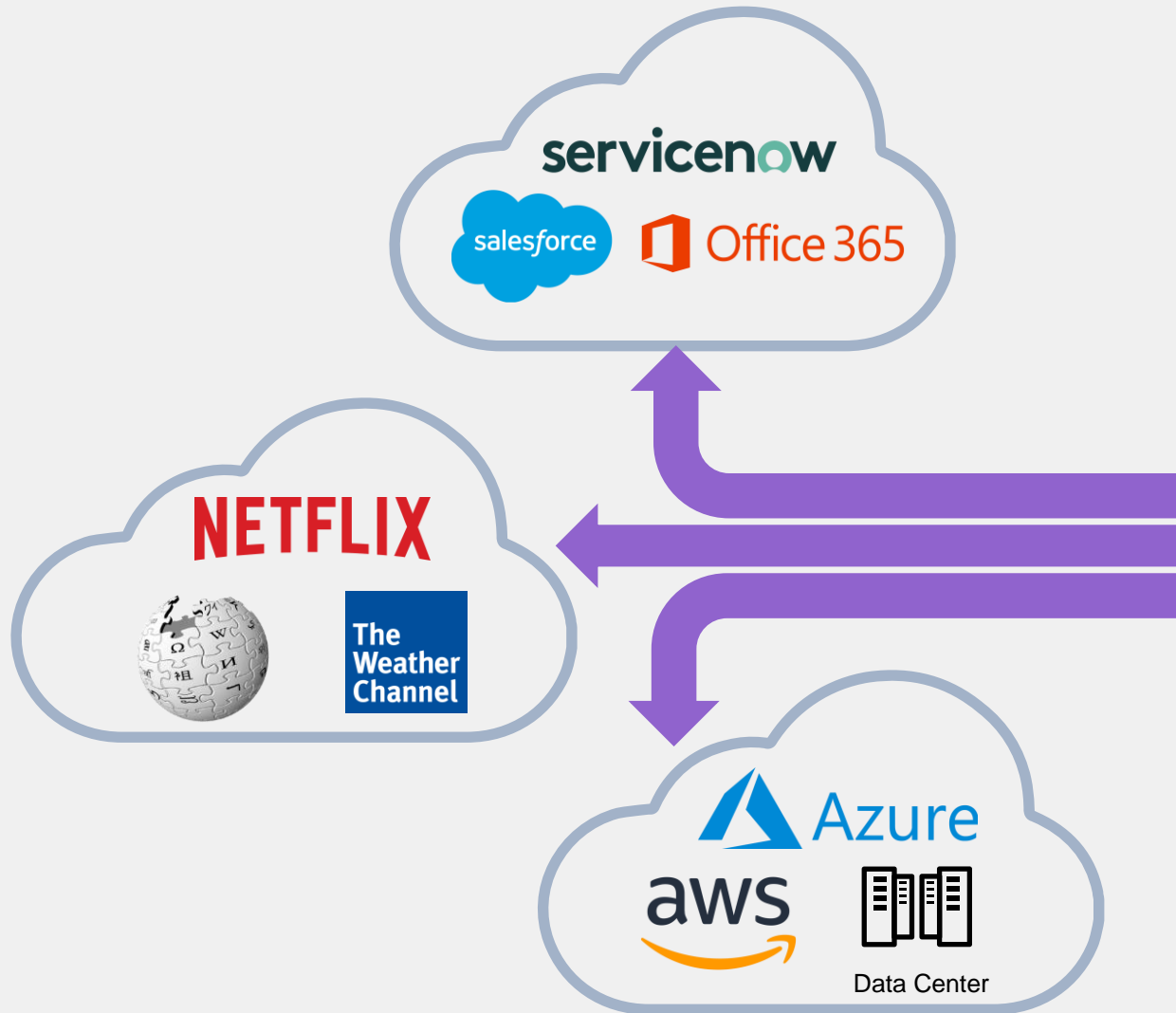


Sicherer Zugang zum Internet, auf Anwendungen im Firmennetzwerk und in die Cloud für ihre hybride Belegschaft: Ein Einblick in FortiSASE

Vitus Zeller, Business Development Manager

Juli 2024

Hybrid Workforce



Market Trends

Hybrid Workforce

84%



SOURCE 1:
2023 Forbes Remote Work Trends

Distributed Applications

125+



SOURCE 2:
2022 Gartner: Market Guide for SaaS
Management Platforms

Active Vendor Consolidation

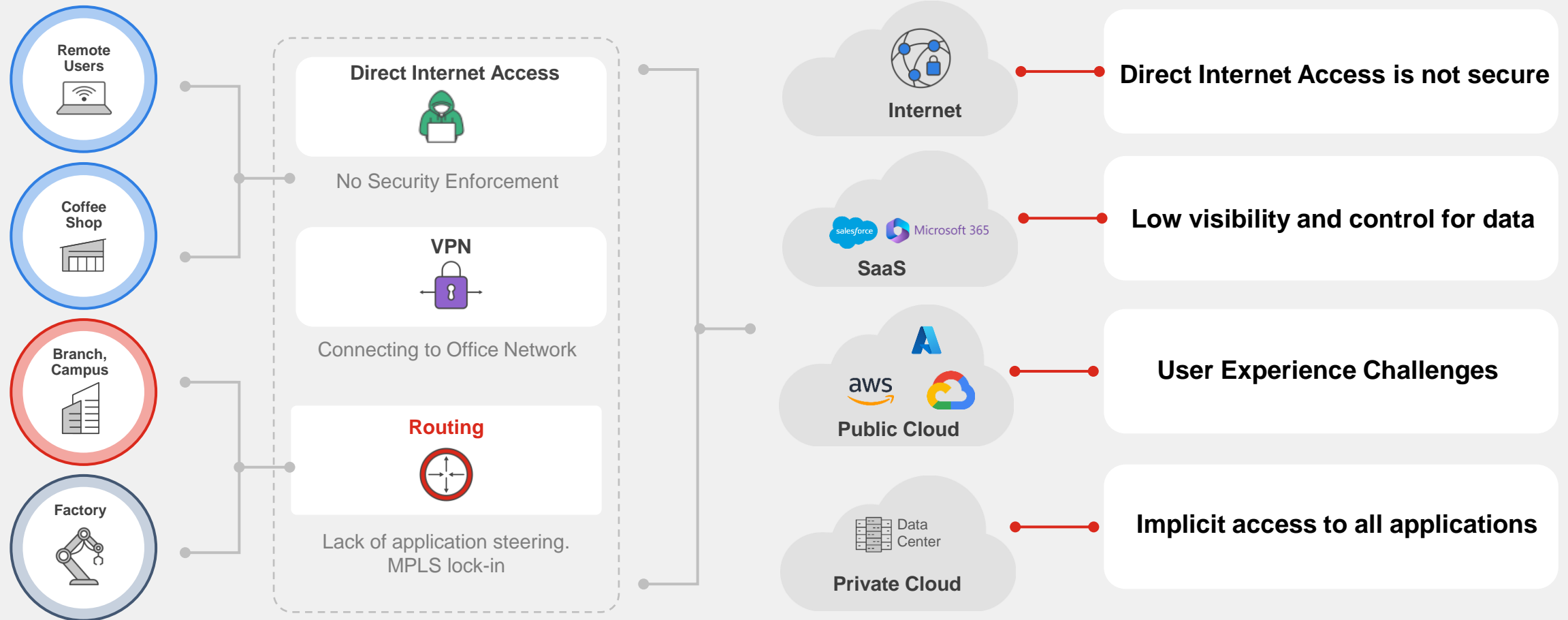
75%



SOURCE 3:
2022 Gartner CISO Survey and infographics



Current Technology Requires Transformation



Zero Trust Mindset

Never Trust, Always Verify for resource protection



Grants network access only after identity is authenticated and authorized



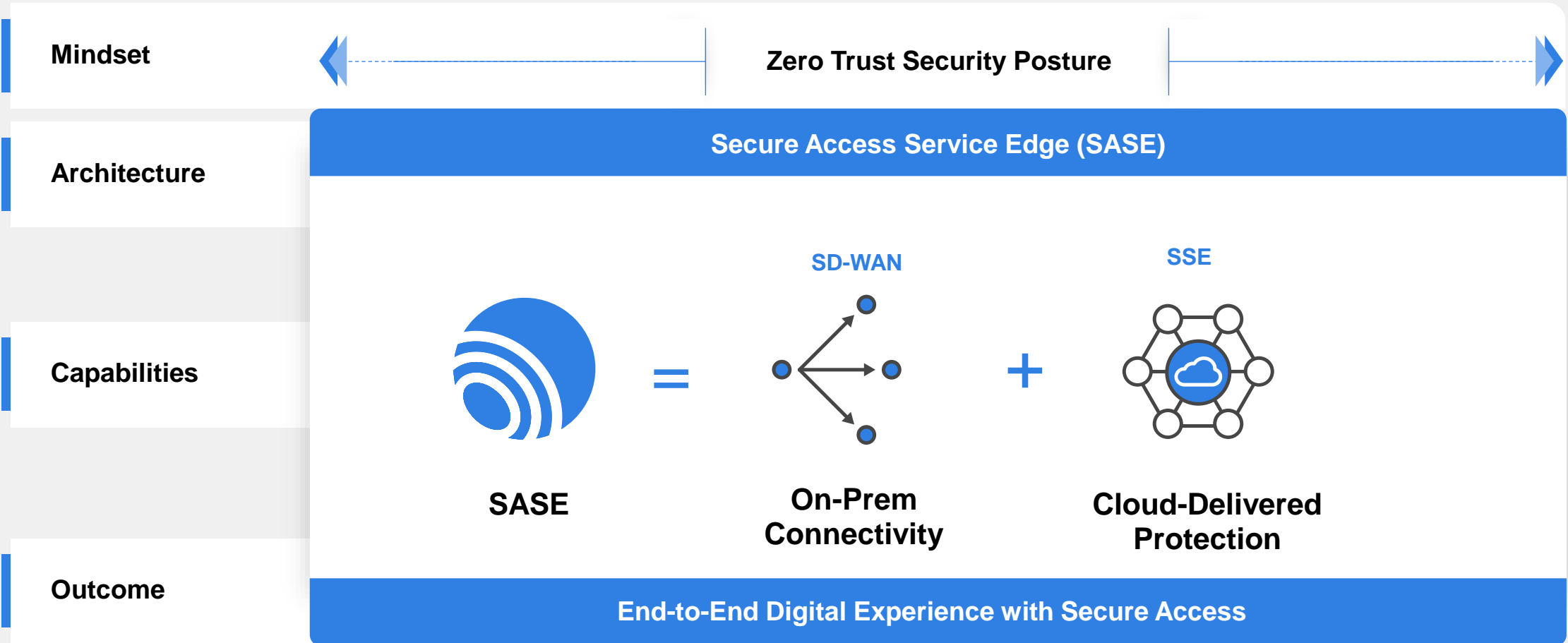
Limits network access only to necessary resources/applications



Continuously adjusts network access in near real time, based on device/user context



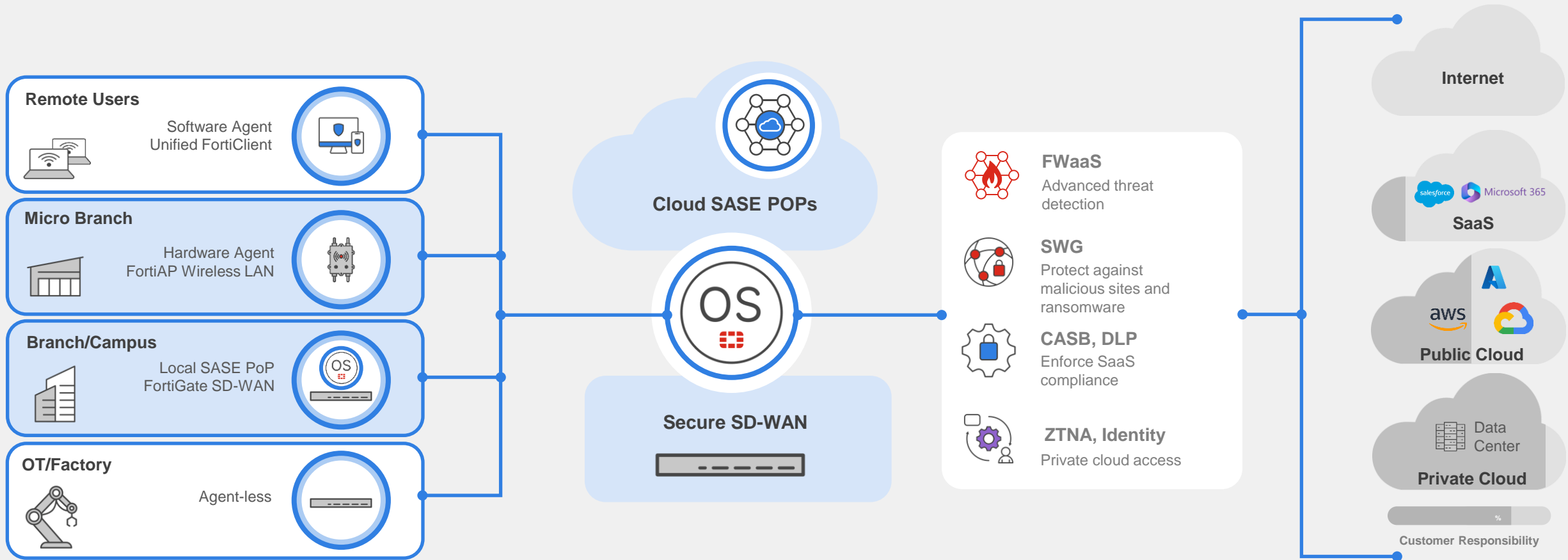
Analyst Recommends SASE for Secure Access



By 2026 – 85% of organizations will adopt SSE offering – Gartner SSE MQ 2024



Hybrid Approach to SASE with Consistent Protection



Unified SASE Use Cases

Secure SD-WAN for Branch and Campus



Transitioning from MPLS to Broadband via SD-WAN reduces cost and enhance application performance.

Clear ROI, Controller-less, Convergence

Secure Internet Access for Remote Users



Enable secure web browsing for remote users to protect from known and unknown threats

AI-Powered Security, Unified Agent, Unified Management

Upgrade Remote Access for Private Applications



Explicit application access under a zero-trust mindset to ensure secure application access

Real-time Monitoring, Universal Enforcement,

SaaS Control and Data Protection



Address Shadow IT visibility challenges by deploying SaaS application control and safeguard data loss prevention

Unified Management, Data Protection

Thin Edge for Secure Access



Deploy and manage Access point with SASE and enable secure access for users and unmanaged devices

Industry's Only, Secure Access, Flexible Connectivity





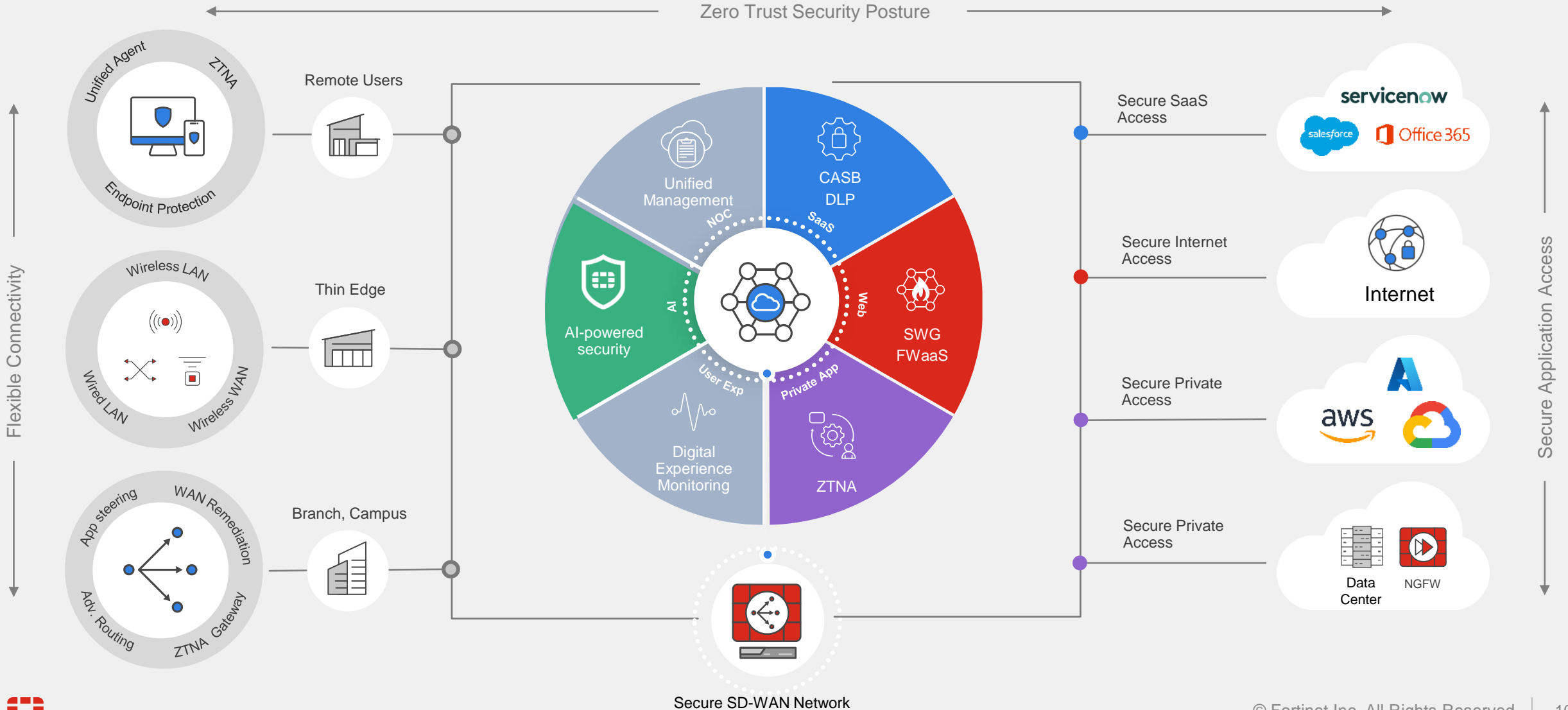
Fortinet SASE Solution



FortiSASE – Cloud Delivered Security Service Edge

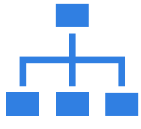


Secure access for the hybrid workforce



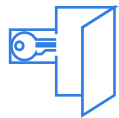
FortiSASE – One Console for Management and Visibility

FortiSASE Unified Management



Centralized Control

Control and configure all FortiSASE components (SWG, FWaaS, ZTNA, CASB, DLP)



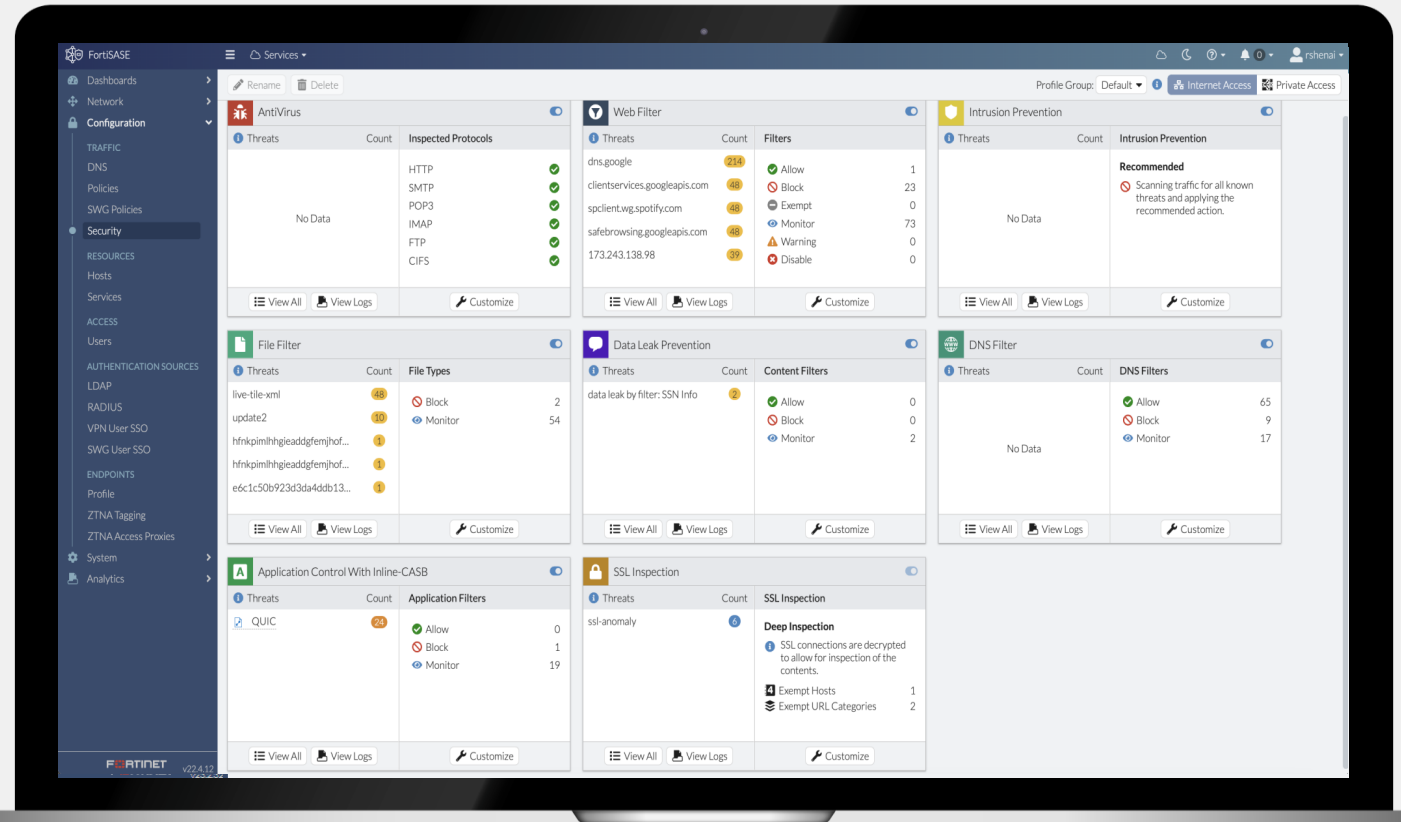
Single Console

Single pane for Internet and Private Access



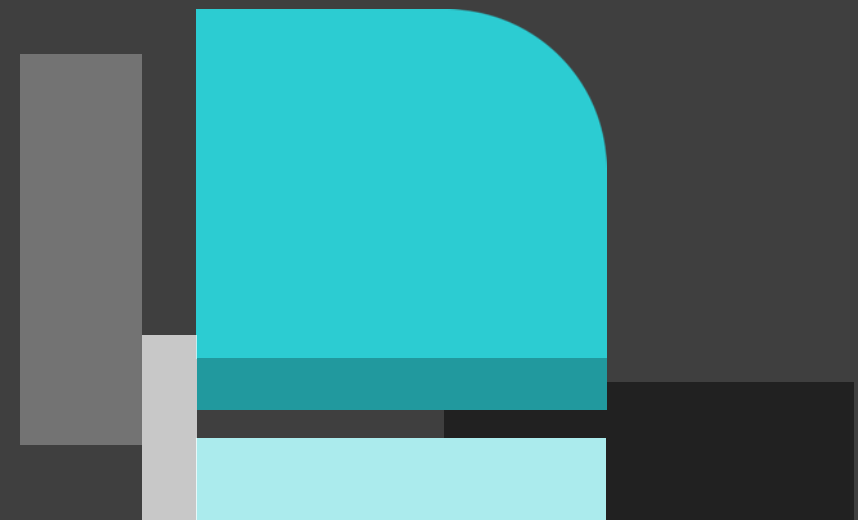
Enhanced Visibility and Monitoring

Reporting, Analytics, Digital Experience Monitoring





Use cases



Secure Internet Access

For Remote Users, Thin Edge and Branch Locations

Safe browsing from anywhere



Malware & Ransomware prevention

Prevent threats with cloud-based Firewall, IPS, Web Filtering, Anti-virus, DNS and File Filtering, Sandbox



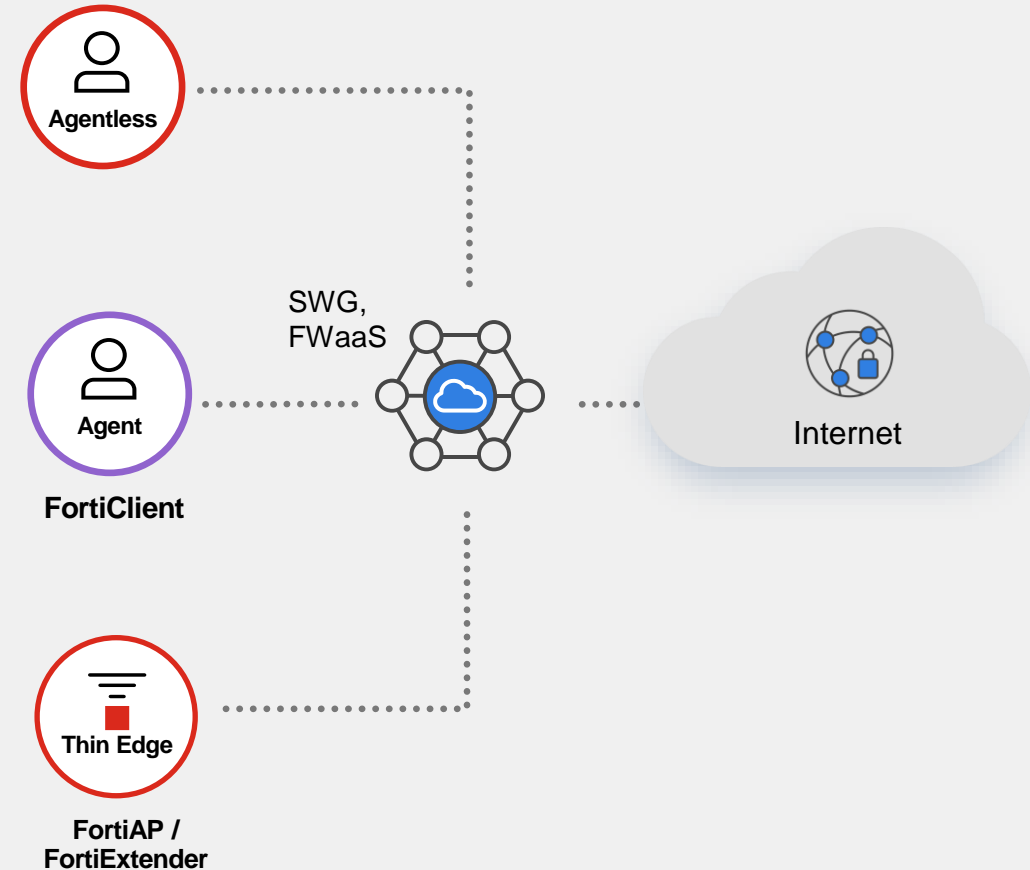
Deep SSL Inspection of end-user activity

Deep inspection of web activity for threats, even when using secured HTTPS access



AI Powered Security Services

Best in class security efficacy and zero-day threat protection with AI powered FortiGuard Security Services



Secure Internet Access – Threat Protection

The screenshot displays the FortiSASE Security configuration interface. The left sidebar shows the navigation menu with 'Security' highlighted. The main area contains several configuration panels for different security services. Red callouts are placed over the interface to highlight specific features:

- 1**: Points to the 'Security' menu item in the left sidebar.
- 2**: Points to the 'Default' profile dropdown in the top right of the configuration panels.
- 3**: Points to the 'Internet Access' and 'Private Access' profile options in the top right.
- 4**: Points to the 'Customize' button in the DNS Filter panel.

Protocol	Status
HTTP	✓
SMTP	✓
POP3	✓
IMAP	✓
FTP	✓
CIFS	✓

Filter	Action	Count
dns.google	Allow	214
clientservices.googleapis.com	Block	48
spclient.wg.spotify.com	Exempt	48
safebrowsing.googleapis.com	Monitor	73
173.243.138.98	Warning	0
	Disable	0

File Type	Action	Count
live-tile-xml	Block	48
update2	Monitor	10
hfnkpmihhgieaddgfemjhof...	Block	1
hfnkpmihhgieaddgfemjhof...	Monitor	1
e6c1c50b923d3da4ddb13...	Block	1

Filter	Action	Count
data leak by filter: SSN Info	Allow	2
	Block	0
	Monitor	2

Filter	Count
Allow	65
Block	9
Monitor	17

Filter	Action	Count
QUIC	Allow	24
	Block	1
	Monitor	19

Category	Count
ssl-anomaly	6
Deep Inspection	
SSL connections are decrypted to allow for inspection of the contents.	
Exempt Hosts	1
Exempt URL Categories	2

- 1 Simplified FOS Security from single pane
- 2 Default profiles available for fast consumption
- 3 Web and Private App visibility
- 4 Security profiles can be customized



Secure Private Access

With ZTNA and SD-WAN integration

Secure corporate app access



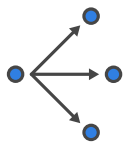
Secure Cloud & datacenter app access

Secure anywhere access to corporate applications in datacenter and cloud with deep security inspection



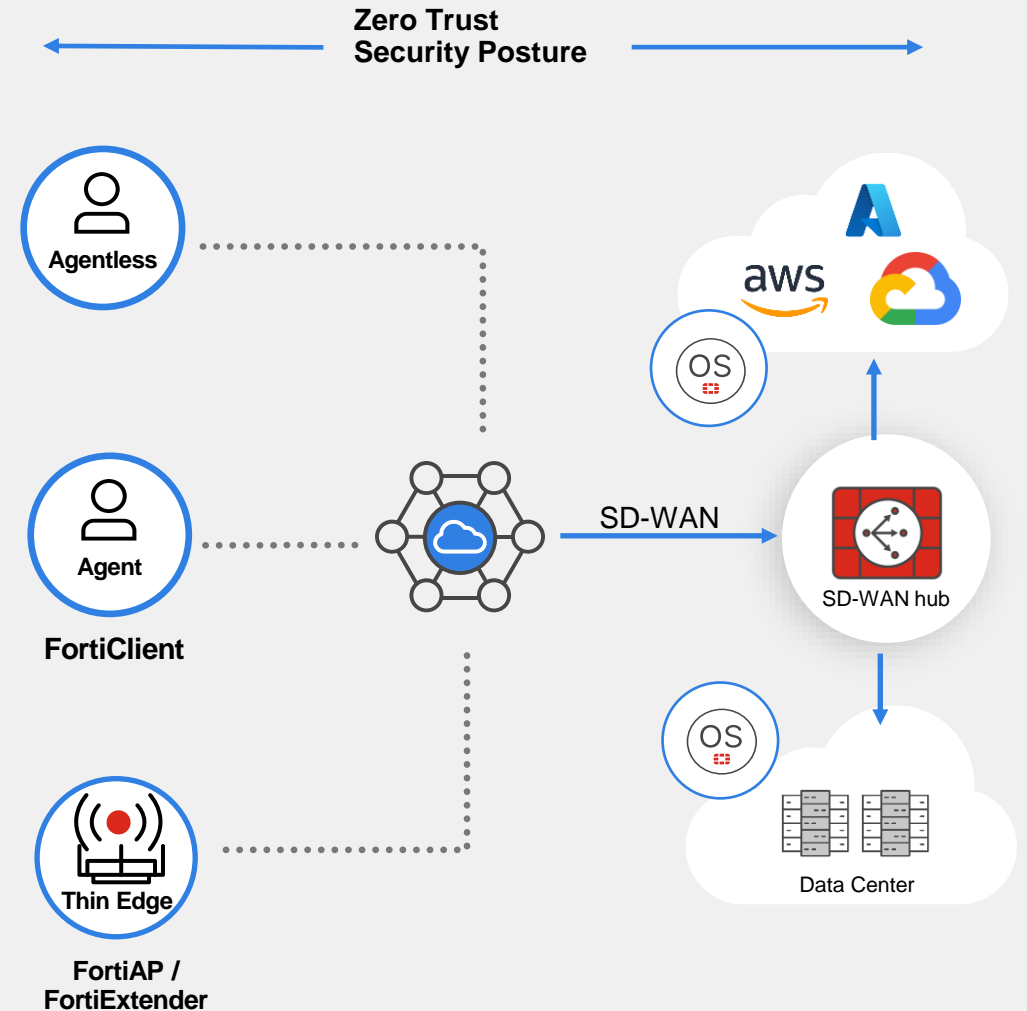
Universal Zero-trust Network Access

User identity and device context-based zero-trust access to explicit applications from remote or on-prem location



SD-WAN integration

Superior user experience with full integration with Fortinet SD-WAN architecture



Secure Private Access with ZTNA

Cloud delivered ZTNA with FortiSASE



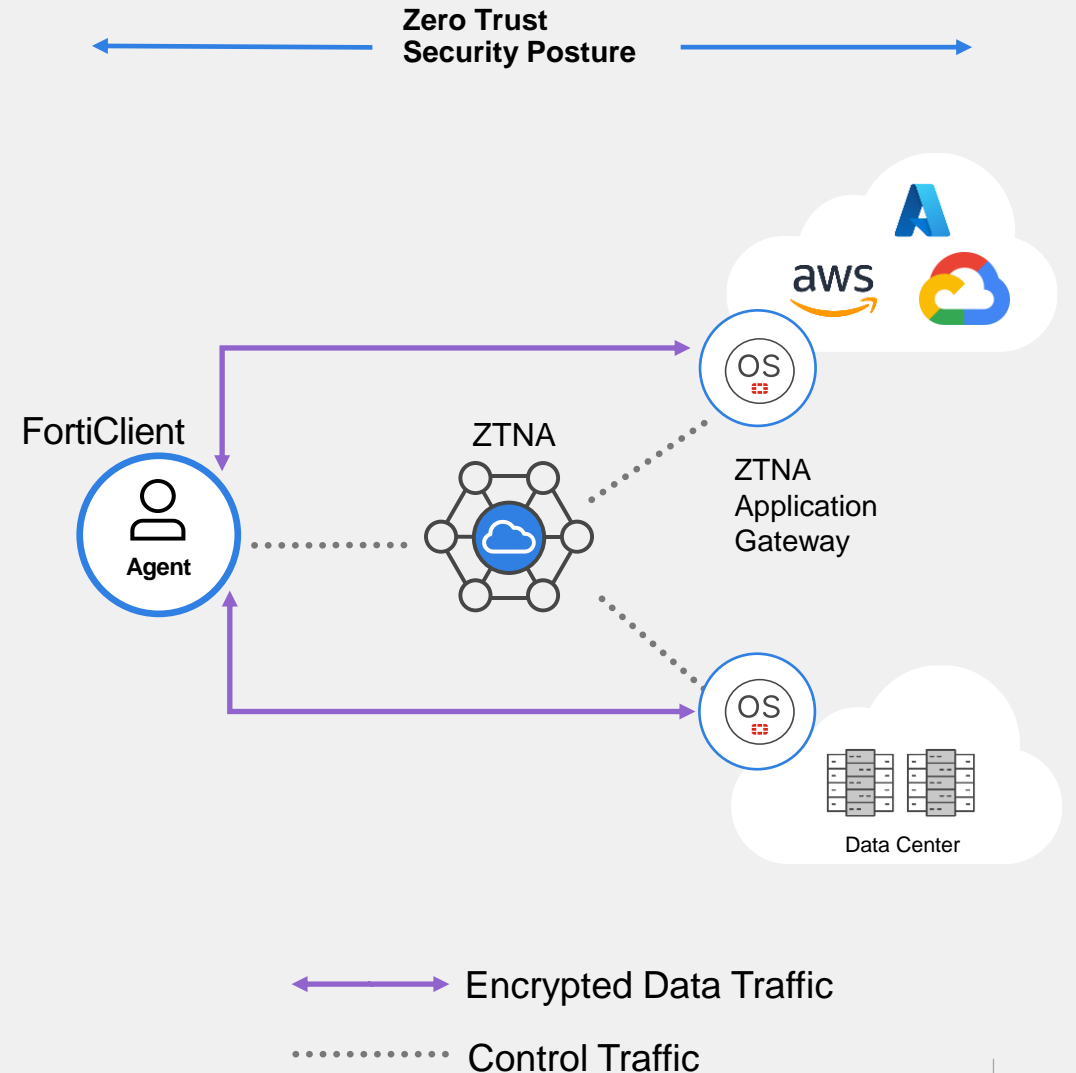
User identity and device posture validated for access from anywhere



Granular and explicit application access per-session



Continuous device posture re-assessment



Zero Trust security for secure application access

Name	Profile Group	Source	User	Destination	Action	Hit Count	Status
CSA-Thin-Edge-SPA	CSA-SPA-Profile	All Edge Devices		All Private Access Traffic	Accept	2,592	Enabled
ftnt-tk-spa-deny		WindowsFW-off-check	sighber-corp ftnt-tk	All Private Access Traffic	Deny	0	Enabled
ftnt-tk-spa	Default	WindowsFW-on-check Win10-OS-check	sighber-corp ftnt-tk	All Private Access Traffic	Accept	8	Enabled
CJ_SPA_Policy	CJ_SPA_Profile_Group	Win10-OS-check WindowsFW-on-check	CJ_Group	All Private Access Traffic	Accept	3	Enabled
BDE-CAN_VPN_PA_Pol1 Permit DNS	BDE-CAN_PA_PG		BDE-CAN BDE-CAN_FSELAB_RG01	BDE-CAN_PA_DC01	Accept	6,179	Enabled
BDE-CAN_VPN_PA_Pol2 Permit Any	BDE-CAN_PA_PG	BDE-CAN_Domain_FSELAB	BDE-CAN BDE-CAN_FSELAB_RG01	BDE-CAN_PA_Net_AG	Accept	18,485	Enabled
BDE-CAN_VPN_PA_Pol3 Deny Any			BDE-CAN BDE-CAN_FSELAB_RG01	BDE-CAN_PA_Net_AG	Deny	106,222	Enabled

- 1 SPA policies defined with ZTNA tags
- 2 ZTNA tag rules supported for multiple OS's

Operating System: Windows, macOS, Linux, iOS, Android

Rule Type: AntiVirus

AntiVirus

- AntiVirus
- Certificate
- Domain
- EMS Management
- File
- IP Range
- OS Version
- Registry Key
- Running Process
- Sandbox
- Severity Level
- User Identity
- Windows Security
- On-Fabric Status

EDIT RULE SET

Name: WindowsFW-off-check

Enabled:

Comments:

When the following rules match

Type	Parameters	Matching Criteria
Windows		
Windows Security	Windows Firewall is enabled	All parameters must pass

Apply the following tag

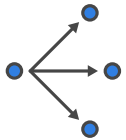
Tag Name: WindowsFW-off-check



Secure Private Access

With seamless SD-WAN integration

SD-WAN Private Access



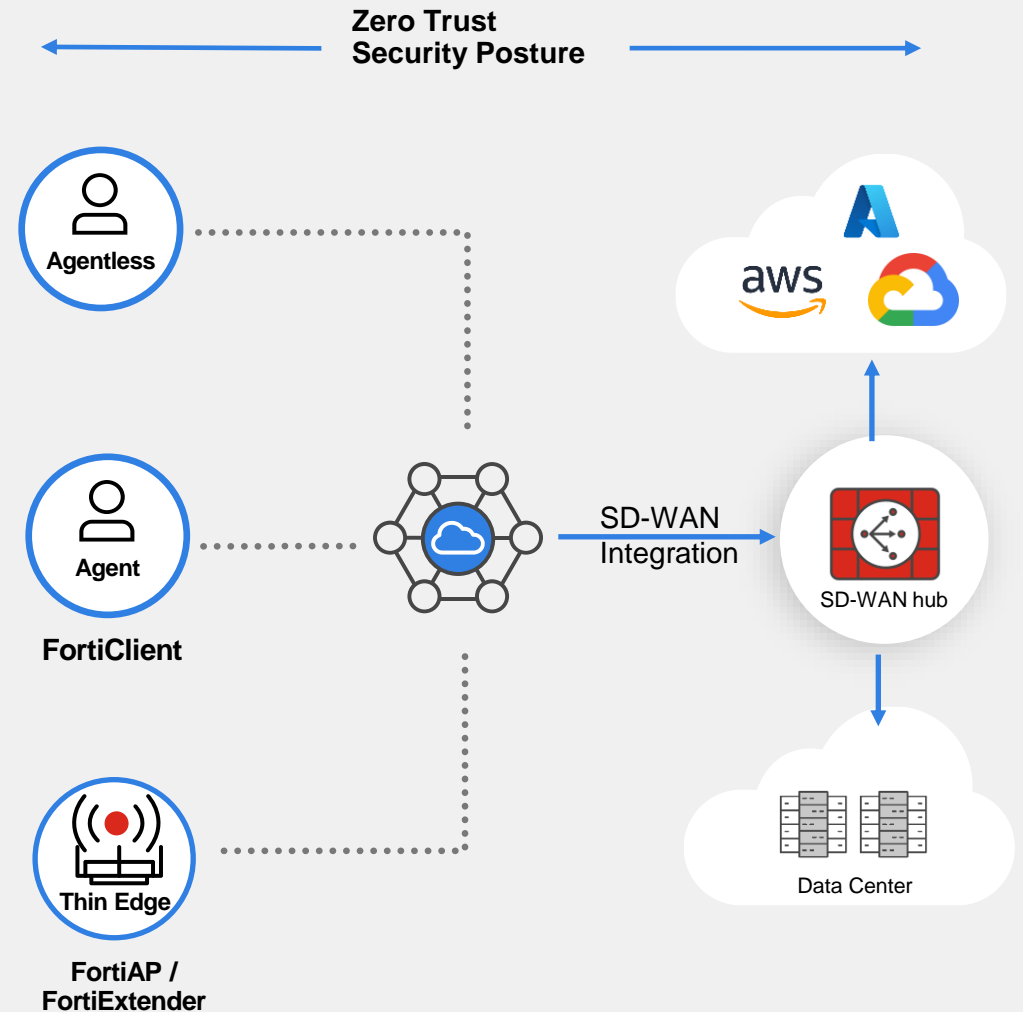
SD-WAN Integration with existing SD-WAN Hub from any **SASE PoP**



Fast access to applications using **SD-WAN** from SASE PoP to SD-WAN Hub



Broader app support
(UDP-based VoIP, video, UC)



FortiSASE Secure Private Access

Bridge to securely connect remote users to their private applications

The screenshot displays the FortiSASE dashboard interface. On the left is a navigation sidebar with options like Dashboards, Edge Devices, Network, Asset Map, Secure Private Access, Managed Endpoints, Connected Users, Digital Experience Monitoring, Configuration, System, and Analytics. The main area features a map of the United States with several edge locations marked: San Jose - California - USA, Dallas - Texas - USA, Miami - Florida - USA, and Ashburn - Virginia - USA. On the right, a list of devices is shown, including ZTNA Access Proxy, FortiAP-431F, FortiAP-231F, San Jose - California - USA, Miami - Florida - USA, Dallas - Texas - USA, and Ashburn - Virginia - USA. A red box highlights a 'Filter by Edges' menu with the following options: Endpoint, FortiAP, FortiExtender, FortiGate, Private Access Hub, Security PoP, and ZTNA Access Proxy. Below the map is a network traffic graph showing Receive and Transmit data over time.

Filter by Edges



Secure SaaS Access

For Visibility and Control

Secure Access to Cloud apps and files



Cloud App Access Control

Safe Cloud Application access and blocking of malicious apps with in-line CASB feature, including Zero Trust posture checks



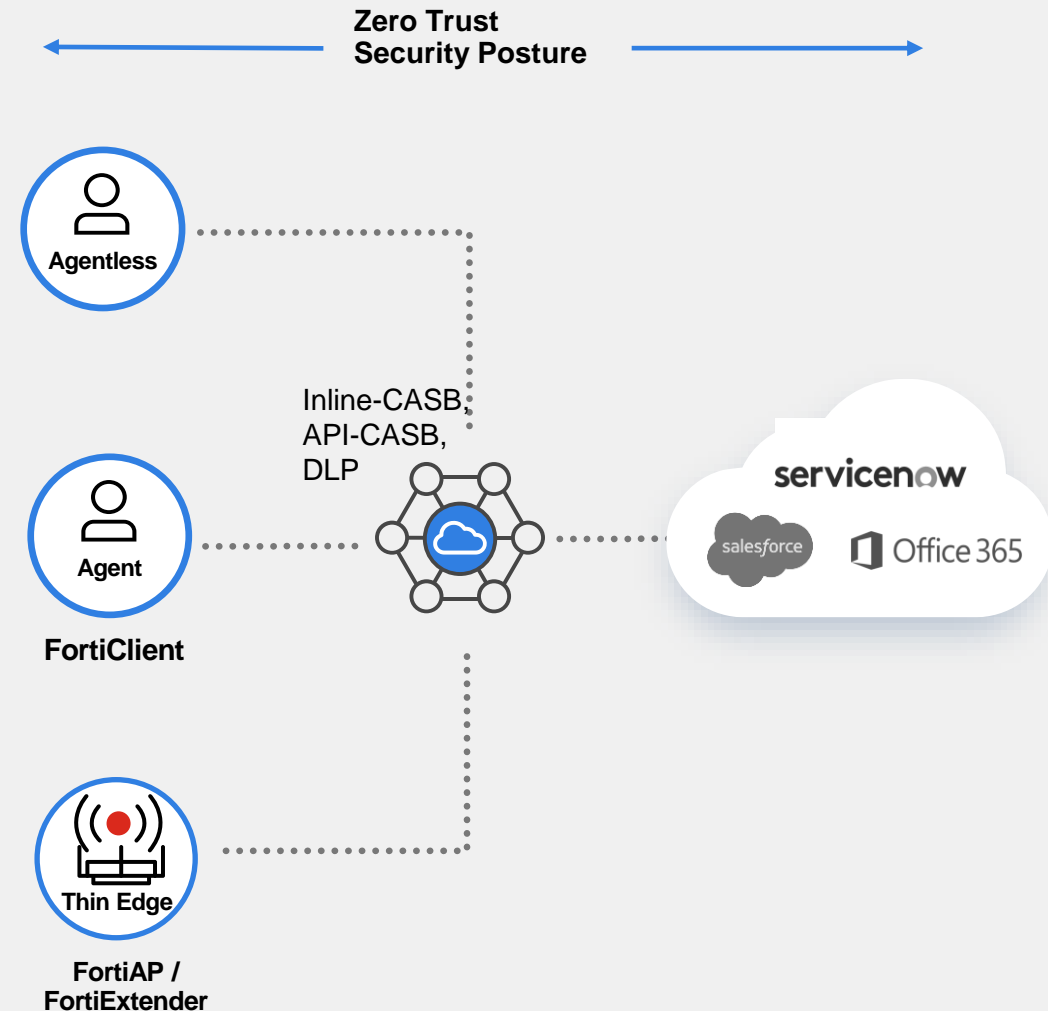
Deep control & view of apps content

Control over app content and files with API-based CASB for enhanced security and threat detection



Unified agent for anywhere detection

FortiClient Agent covers all the use-cases from SASE, Zero-trust, SaaS security, and End-Point Protection



Inline CASB capabilities

The screenshot displays the FortiSASE Security configuration interface. The left sidebar shows the navigation menu with 'Security' highlighted. The main content area contains several configuration cards:

- Internet Access:** Shows a list of IP addresses with their status (e.g., Monitor).
- Data Leak Prevention:** A table showing threats and content filters.
- DNS Filter:** A table showing threats and DNS filters.
- Application Control With Inline-CASB:** A table showing threats and application filters. A red box highlights this section, which includes a warning: "110 Cloud Applications can be monitored & controlled by Inline-CASB when SSL inspection is enabled."
- SSL Inspection:** A card showing certificate inspection details.

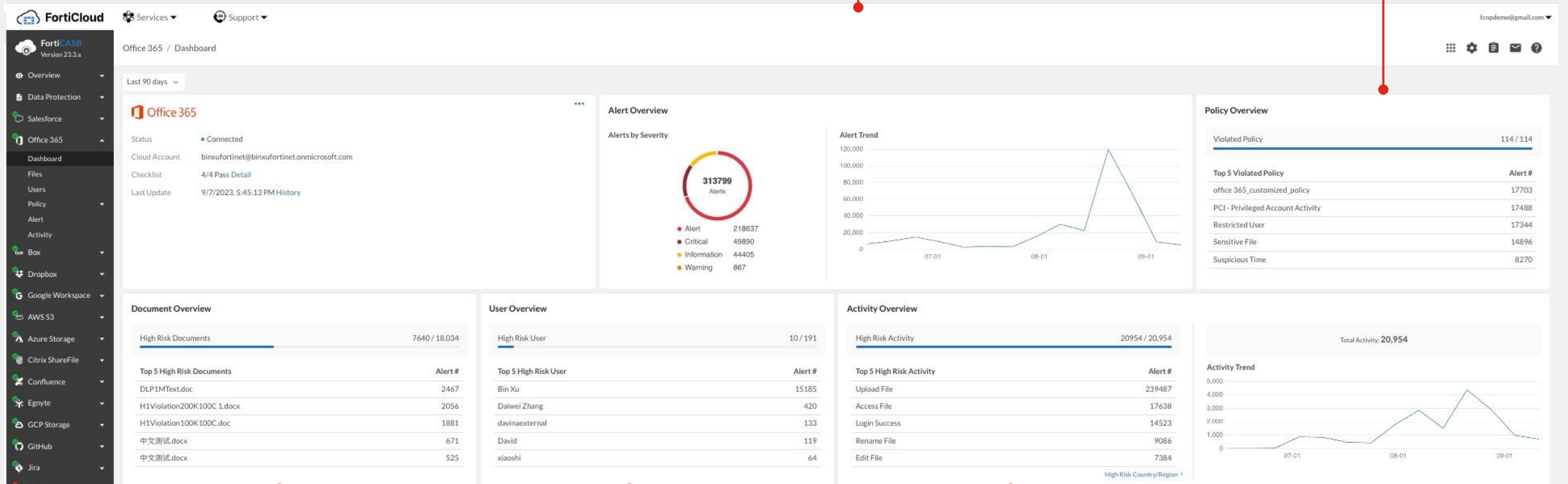
- Application status
- Activity history
- Risk statistics
- Highest risk users, files, triggered policies & countries
- Risk/usage trends



Example: O365 Summary Over Past 90 Days

Alerts & Trends

Policy Violations



Documents profiled as per Risk

Users profiled as per Risk

Activities profiled as per Risk



Shadow IT: Application List

Filtering based on Risk score or app type

Risk score vs user breakdown

The screenshot displays the FortiCloud Shadow IT Application List interface. On the left, a sidebar contains navigation options like Overview, Dashboard, Report, Audit Log, Shadow IT, and Application List. The main content area is titled 'Shadow IT Application List' and features a 'Score' slider set to 40 and a 'Categories' list with various application types checked. A table lists applications with columns for Application, Category, Risk Score, Number of Clients, and Sessions (Blocked/Allowed). A red box highlights the filtering controls, and another red box highlights the Risk Score and Number of Clients columns.

Application	Category	Risk Score	Number of Clients	Sessions (Blocked/Allowed)
Harris Media	Web Hosting	98	1	140 (0 / 140)
Hosting.India.to	Web Hosting	88	1	74 (0 / 74)
Molo	Customer Management	80	1	3 (0 / 3)
Fixus Host	Web Hosting	78	1	8 (0 / 8)
Host4Yourself	Web Hosting	67	1	3 (0 / 3)
Engage	Customer Management	66	1	2 (0 / 2)
GalaxyHostPlus	Web Hosting	64	1	2 (0 / 2)
FarmLogs	Inventory & SCM	63	1	3 (0 / 3)
Host.ag	Dedicated Hosting	61	1	5 (0 / 5)
Azendoo	Project Management Tools	59	1	5 (0 / 5)
http://host.co.in	Dedicated Hosting	58	1	3 (0 / 3)
DigitalOcean	Cloud Hosting	56	1	10 (0 / 10)
Baidu Cloud	Cloud Hosting	55	1	35 (0 / 35)
box	Online Backup	53	1	1 (0 / 1)
AWS	Cloud Hosting	50	2	269 (0 / 269)
Bizible	Marketing Software	49	1	1 (0 / 1)
CloudFlare	Cloud Hosting	48	1	1 (0 / 1)
Data.com	Operations Management	47	2	1722 (259 / 1463)
Digital Global Hosting	Web Hosting	46	1	6 (0 / 6)
Do	Project Management Tools	45	2	13 (0 / 13)



Comprehensive Data Security

Built-in Data Leakage Protection (DLP)

Data Protection with FortiSASE



Identification, monitoring and protection of organization's data—**At rest and in motion**



FortiGuard AI-powered DLP feeds
Supports 500+ pre-defined data patterns updated frequently for new patterns



Predefined sensors and dictionaries
Support for granular policies to meet data protection requirements with tailored reporting

Time	User	Protocol	Destination	Action
2024/03/13 00:38:26	Jack@40netcloud.onmicrosoft.com	HTTPS	https://chat.openai.com/backend-api/conversation	Blocked
2024/03/13 00:38:25	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:38:25	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:38:25	Jack@40netcloud.onmicrosoft.com	HTTPS	https://nleditor.office.net/NLEditor/TileCheck...	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://chat.openai.com/backend-api/conversation	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://nleditor.office.net/NLEditor/TileCheck...	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:20:34	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:19:52	Jack@40netcloud.onmicrosoft.com	HTTPS	https://nleditor.office.net/NLEditor/TileCheck...	Blocked
2024/03/13 00:19:52	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:18:18	Jack@40netcloud.onmicrosoft.com	HTTPS	https://chat.openai.com/backend-api/conversation	Blocked
2024/03/13 00:18:04	Jack@40netcloud.onmicrosoft.com	HTTPS	https://chat.openai.com/backend-api/conversation	Blocked
2024/03/13 00:18:04	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/13 00:18:04	Jack@40netcloud.onmicrosoft.com	HTTPS	https://nleditor.office.net/NLEditor/TileCheck...	Blocked
2024/03/13 00:18:02	Jack@40netcloud.onmicrosoft.com	HTTPS	https://turing-writingassistance.edge.microsoft.c...	Blocked
2024/03/11 09:42:49	Jack@40netcloud.onmicrosoft.com	HTTPS	https://dlptest.com/http-post/	Blocked
2024/03/10 18:00:49	Jack@40netcloud.onmicrosoft.com	HTTPS	https://dlptest.com/http-post/	Blocked
2024/03/01 10:57:58	john@40netcloud.onmicrosoft.com	HTTPS	https://dlptest.com/https-post/	Log Only
2024/03/01 10:57:45	john@40netcloud.onmicrosoft.com	HTTPS	https://dlptest.com/https-post/	Blocked

Source

Source IP: 10.212.128.2
Source Country/Region: Reserved
Source UUID: cefac762-4ece-51ed-12c0-3233b33d34a2
Security PoP: Frankfurt - Germany
User: Jack@40netcloud.onmicrosoft.com

Destination

Destination IP: 104.18.37.228
Destination Port: 443
Destination Country/Region: United States
Traffic Type: Internet Access
Destination UUID: cefa40d0-4ece-51ed-7a17-11e592cdf365
Hostname: chat.openai.com
URI: https://chat.openai.com/backend-api/conversation

Application Control

Protocol: 6
Service: HTTPS

Data

File Type: N/A

Action



Secure Thin Edge Connectivity

Industry's First – Wireless LAN integration with SASE

Secure Thin Edge Access



Cloud delivered AI-powered Security

Secure thin edge locations that don't have on-prem firewall to block ransomware and malware



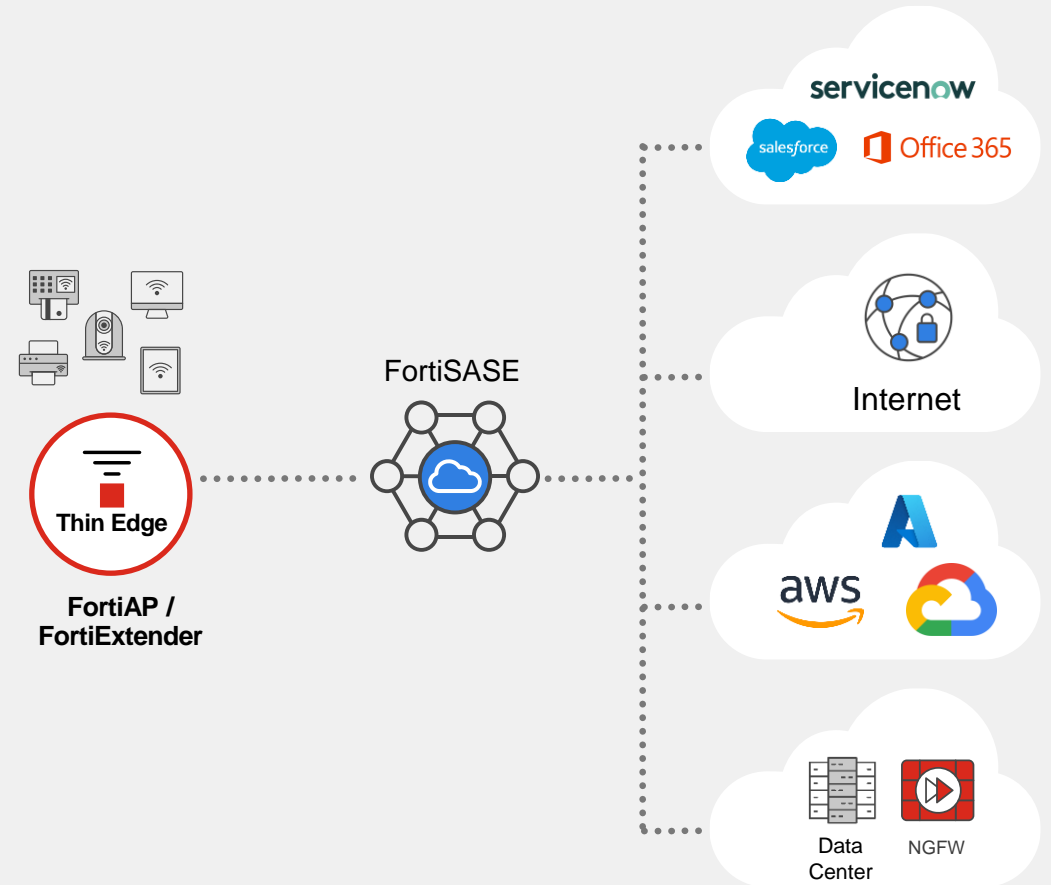
Secure Agentless Access from IoT

Secure access using built-in hardware agent in FortiAP and FortiExtender without any client agents.



Cloud delivered Management

Cloud delivered management of FortiAP and FortiExtender with zero-touch provisioning support



FortiSASE Cloud Delivered Management for Thin Edge

Streamlined Management

Single pane to manage

The screenshot displays the FortiSASE management interface. On the left, a sidebar lists navigation options: Dashboards, Edge Devices (highlighted), FortiExtenders, FortiGates, FortiAPs (highlighted), Network, Configuration, System, and Analytics. The main dashboard features three panels: two 'Usage' gauges (Online and Low) and a 'Bandwidth' graph. Below these is a table of managed FortiAPs.

	Name	Device Type	DHCP Clients	Security PoP	Serial Number	Status	IP	Profile
<input type="checkbox"/>	Sunnyvale-AP	FortiAP	1	Ashburn - Virginia - USA	FP231FTF23045206	Online	100.0.193.106	SASE-FAP231F-Profile

Sunnyvale-AP extending to SASE PoP



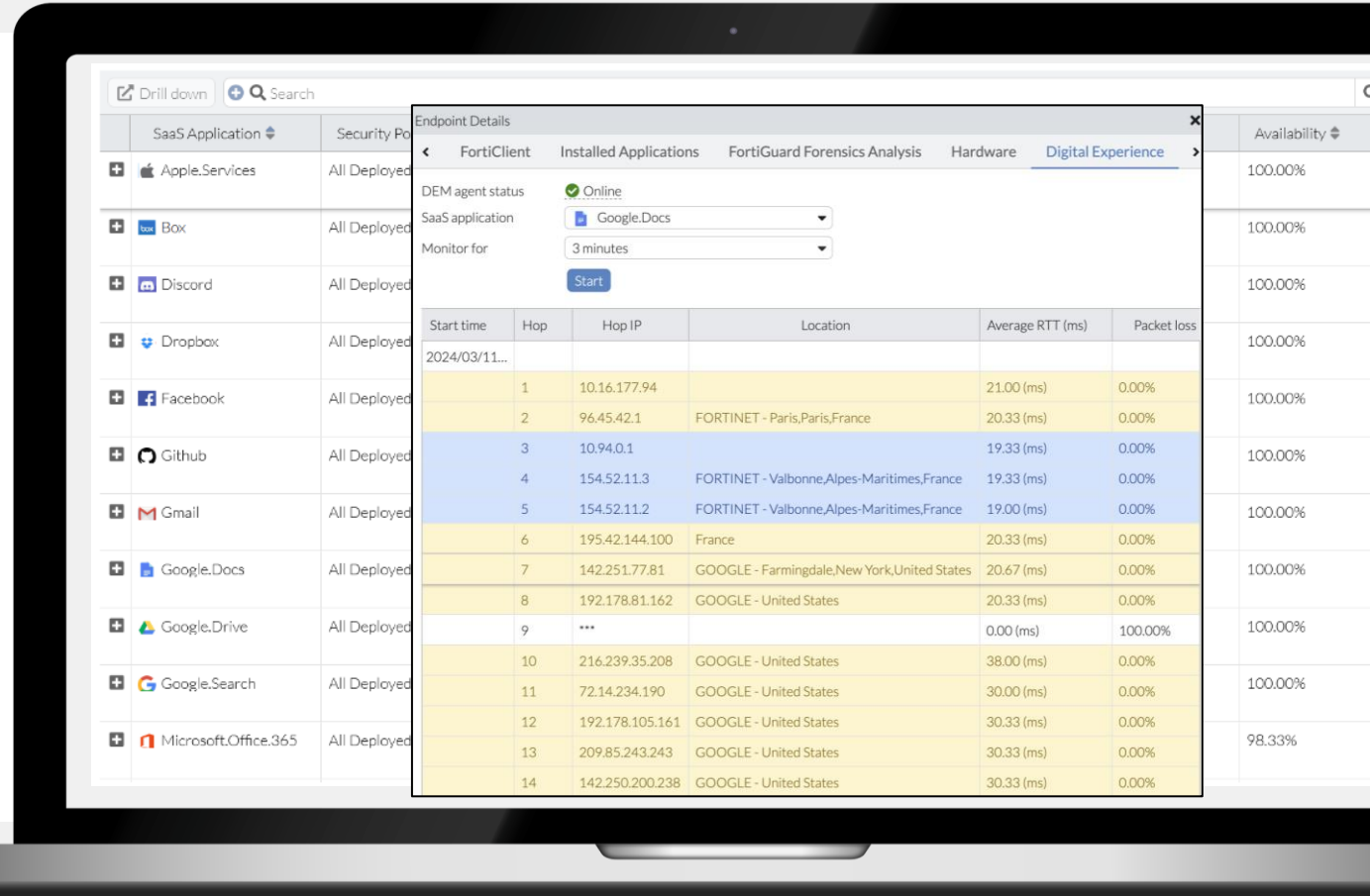
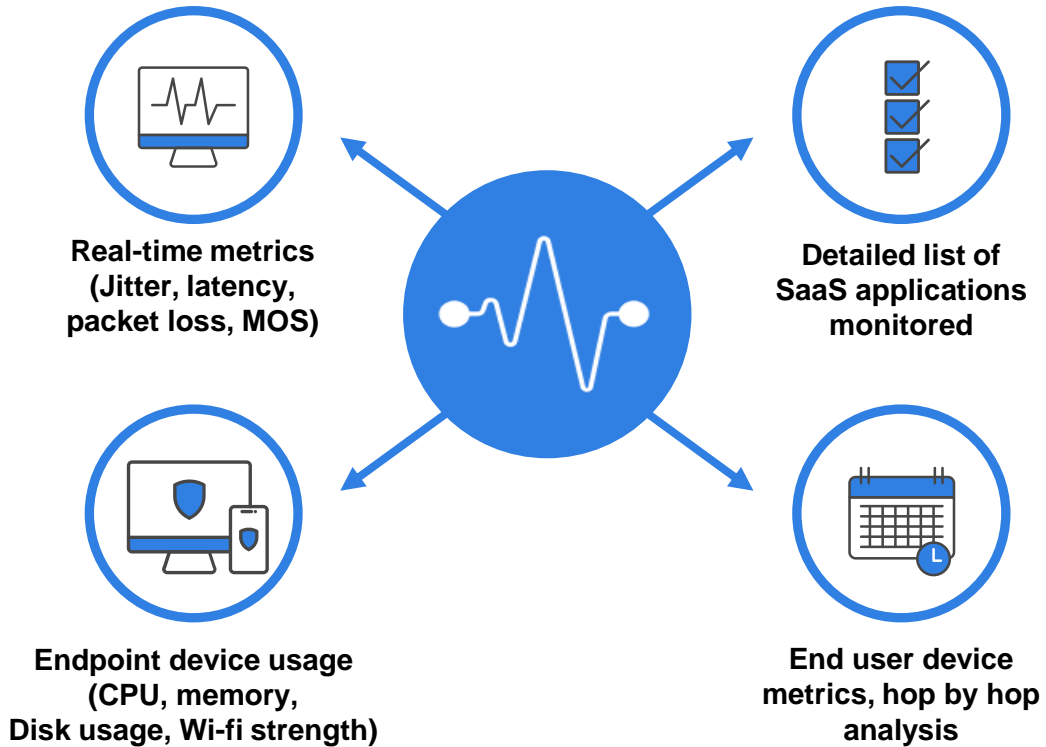


Advanced features



End-to-End Digital Experience Monitoring

Comprehensive visibility | Metrics and alerts correlation | Proactive response



SOC As a Service integration with FortiSASE

Seamless integration



Say No to False Positives!

24x7 Human based Monitoring and analysis with weekly summary reports, alerts and notifications



Respond: Act Fast

Fortinet security experts notify **within 15 mins** – IOCs, remediation, why and what



Improve: Maximize Investment

Cloud-based portal with intuitive dashboards, on-demand reports and quarterly Fortinet expert meetings





Security – FortiGuard Forensics

- Leverage FortiGuard Forensics service to investigate potentially compromised endpoints
- Submit Endpoints for analysis directly from the FortiSASE portal
- FortiGuard Forensics Team will analyze and provide verdict & details report on findings

The screenshot shows the FortiCloud interface for 'Forensic Status - Complete (13)'. The table lists 13 endpoints with their respective groups, users, IP addresses, forensic status, verdicts, and report dates. The verdicts include 'Clean', 'Compromised', and 'Suspicious'.

Endpoint	Group	User	IP	Forensic Status	Verdict	Report Date
ashah's PC	PM	ashah	172.27.1.108	Complete	Clean	2021-09-28 10:22:08
yanwu's iMac	Design	yanwu	172.27.3.201	Complete	Compromised	2021-09-28 08:21:02
pm PC	PM	pm	172.27.6.52	Complete	Clean	2021-09-27 18:09:14
sraghu's PC	QA	sraghu	10.21.1.177	Complete	Clean	2021-09-27 15:35:43
tfeng's PC	HR	tfeng	172.17.70.25	Complete	Suspicious	2021-09-27 12:39:17
Carrie's iMac	Design	Carrie	172.27.1.109	Complete	Clean	2021-09-27 10:28:12
Steven 's PC	Finance	Steven	172.27.3.205	Complete	Clean	2021-09-27 09:35:26
Jenny's PC	Design	Jenny	172.27.6.50	Complete	Suspicious	2021-09-27 09:26:09
Lily's PC	PM	Lily	10.21.1.172	Complete	Compromised	2021-09-27 08:36:48
Leo's PC	QA	Leo	172.17.70.20	Complete	Compromised	2021-09-27 08:05:26
Jack's PC	HR	Jack	172.27.1.109	Complete	Clean	2021-09-27 08:01:36
Kate's iMac	Design	Kate	172.27.3.202	Complete	Clean	2021-09-26 15:31:56
Charles' PC	Finance	Charles	172.27.6.51	Complete	Suspicious	2021-09-26 13:43:01





Business outcomes & Benefits



Secure Access to Any Application for Any User

UNIFIED SECURE ACCESS FOR HYBRID WORKERS

The Fortinet secure access service edge (SASE) solution enables secure access to the web, cloud, and applications for the hybrid workforce, while simplifying operations and universal Zero Trust

CONSISTENT SECURITY

Eliminated gaps in security for remote users by providing same level of security as in office

50%

Reduction in man hours for operations with consistent security

Reducing Cost

Reduced TCO and simplified operations using single console to centrally manage all components

68%

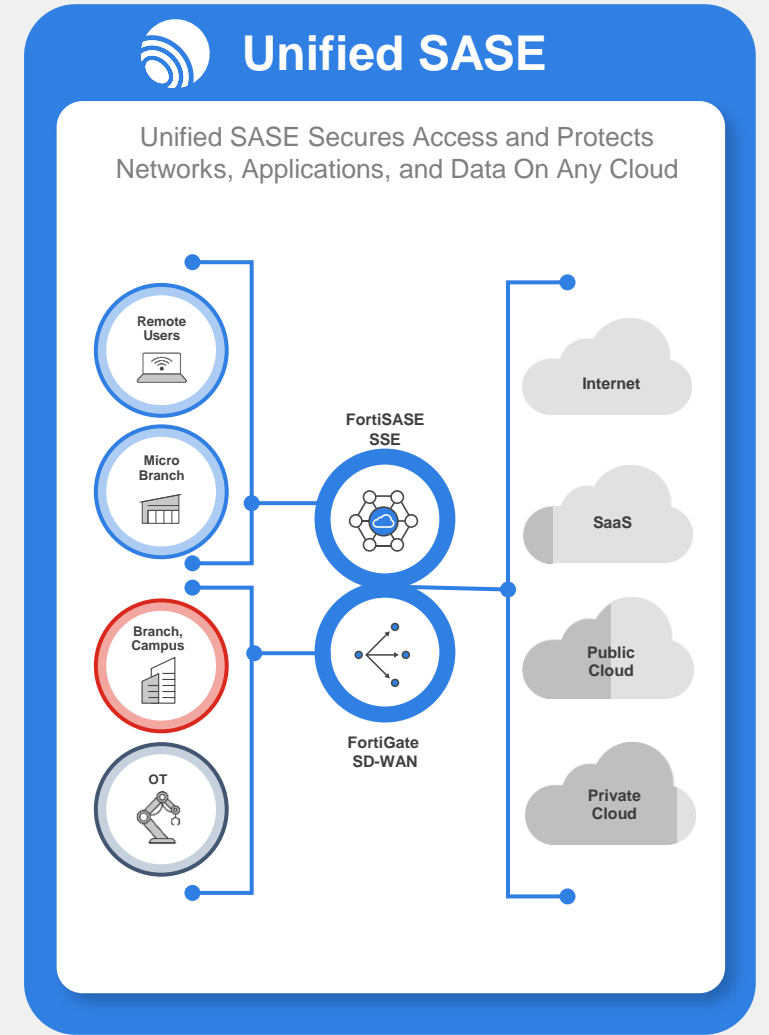
Reduction in TCO with consolidation

BETTER USER EXPERIENCE

Improved user and guest experience with accessing applications

10x

Improvement in performance



Why Fortinet Unified SASE?

1

**FortiOS Powered
Convergence**



FortiOS

2

**AI / ML Driven
FortiGuard Security**



AI-Security

3

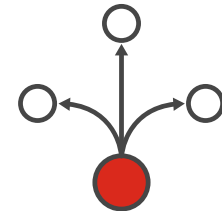
Simplicity



**Unified agent
Single console
SOCaaS / DEM**

4

Flexible Security



**Flexible deployment
Flexible locations
Agentless/Agent**

**Simplifying Operations
and Cost Savings**

Consistent Security Posture

Better User Experience



Why now, next Steps

1

**SASE & ZTNA are Facts:
Read Docs, start now**

2

**Talk with us or with your Partner:
It's time to move. SASE is easy
but ZTNA needs time!**

3

**Seeing is believing
See a Demo**



FORTINET®