

# Server and Business PC Maintenance

Why disciplined maintenance, vulnerability discovery, and verified security remediation are essential business controls.

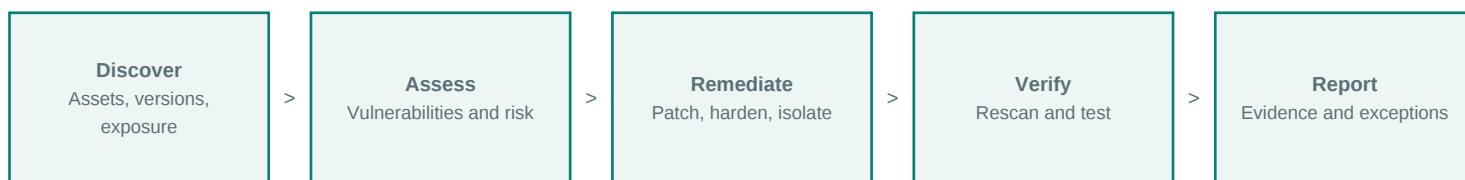
A high-level, public reference for business and technology leaders

# Maintenance is a security program

Servers and business PCs continuously change. New vulnerabilities are disclosed, attackers adapt, applications are updated, certificates expire, storage fills, configurations drift, and security agents can stop reporting. A system that worked yesterday is not automatically secure today.

NIST describes enterprise patch management as preventive maintenance: identify, prioritize, acquire, install, and verify patches and upgrades across the organization. Effective maintenance goes further by finding weaknesses, correcting them, and proving that remediation worked.

## The closed-loop maintenance model



## Why businesses need both server and endpoint maintenance

- Servers concentrate critical applications, identities, files, databases, backups, and administrative privileges.
- Business PCs process email, credentials, browser sessions, documents, remote-access tools, and cloud data every day.
- An unmanaged endpoint can become an entry point; an unmanaged server can turn that entry point into a business-wide incident.
- Maintenance reduces avoidable outages while shrinking the paths an attacker can use to gain access, escalate privilege, or move laterally.

# What a security-centered maintenance program covers

| Control area     | Servers                                               | Business PCs                                                |
|------------------|-------------------------------------------------------|-------------------------------------------------------------|
| Asset visibility | Roles, owners, services, ports, dependencies          | Owner, location, OS, software, encryption, agent health     |
| Patching         | OS, hypervisor, firmware, applications, runtimes      | OS, browsers, productivity apps, drivers, firmware          |
| Scanning         | Authenticated vulnerability and configuration scans   | Endpoint vulnerability, software, and compliance assessment |
| Hardening        | Services, protocols, firewall, admin paths, baselines | Local admin, attack surface, firewall, device controls      |
| Protection       | EDR, logging, integrity, privileged monitoring        | EDR, anti-malware, web/email controls, disk encryption      |
| Recovery         | Application-aware backup and tested restoration       | Protected business data and rapid device rebuild            |

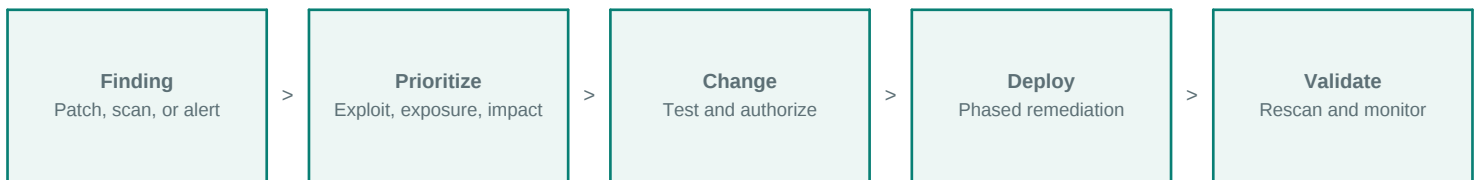
## Maintenance must include remediation

- A scan is a measurement, not a fix. Findings need ownership, risk-based priority, a due date, and a documented resolution.
- Patching should prioritize vulnerabilities known to be exploited, internet-facing exposure, privileged systems, and business-critical assets.
- When a patch cannot be applied promptly, compensating controls may include isolation, access restriction, disabling a vulnerable service, firewall changes, or increased monitoring.
- Every remediation should be verified by installation evidence, configuration checks, rescanning, and functional testing.

# A practical operating cadence

| Cadence            | Representative activities                                                                                | Evidence                               |
|--------------------|----------------------------------------------------------------------------------------------------------|----------------------------------------|
| Continuous / daily | Security-agent health, critical alerts, backup failures, capacity and service exceptions                 | Alerts resolved; exceptions assigned   |
| Weekly             | Urgent patches, known exploited vulnerabilities, external exposure review, failed update follow-up       | Deployment and rescan results          |
| Monthly            | Standard patch cycle, authenticated scans, firmware/app review, local administrator review               | Coverage, findings, remediation status |
| Quarterly          | Configuration baseline review, privileged access review, restoration exercise, unsupported software plan | Approved exceptions and test records   |
| Annually           | Architecture and lifecycle review, recovery objectives, vendor support status, program effectiveness     | Roadmap, budget, and risk acceptance   |

## Risk-based remediation path



## Metrics leadership should see

- Asset and security-agent coverage, including unknown or non-reporting systems.
- Patch compliance by severity, age, exposure, and business criticality.
- Known exploited vulnerabilities outstanding and time to remediate.
- Vulnerability recurrence, approved exceptions, unsupported systems, and compensating controls.
- Backup success, restoration-test outcomes, and recovery gaps.

# What good maintenance prevents

- Exploitation of known software and firmware weaknesses.
- Credential theft and privilege escalation caused by weak configurations or stale controls.
- Lateral movement from employee endpoints to critical servers.
- Outages caused by capacity exhaustion, failed services, expired certificates, or unsupported software.
- False confidence from security tools that are installed but unhealthy, misconfigured, or no longer reporting.
- Unrecoverable disruption caused by untested or exposed backups.

## Public references

NIST SP 800-40 Rev. 4, Guide to Enterprise Patch Management Planning - <https://doi.org/10.6028/NIST.SP.800-40r4>

CISA Cyber Hygiene Services - <https://www.cisa.gov/cyber-hygiene-services>

CISA Known Exploited Vulnerabilities Catalog - <https://www.cisa.gov/known-exploited-vulnerabilities-catalog>

NIST Security Configuration Settings - <https://csrc.nist.gov/Projects/risk-management/about-rmf/implement-step/security-configuration-settings>

## How RSU helps

RSU can establish and operate a maintenance and remediation program for business servers and endpoints, including inventory, patching, vulnerability scanning, configuration review, remediation tracking, monitoring, backup validation, and executive reporting.

Maintenance windows, testing, recovery plans, vendor requirements, and business-critical exceptions should be tailored to each environment. No fixed cadence replaces risk-based prioritization or emergency remediation for active threats.