

MidPoint Working Group at TIIME 2024 MidPoint and Cybersecurity Compliance

Radovan Semančík

Evolveum's Co-Founder and Software Architect

Agenda

- Cybersecurity and compliance
- Regulations and Standards
- How can we help?
- ISO27001 (preview)
- Plans
- Discussion







Introduction

- Cybersecurity crisis
- Poor practice → low security → breaches
- Visibility problem
- Countries react by cybersecurity regulations
- Compliance with cybersecurity regulations and best practice







Regulations and Standards

- ISO27001:2002
- NIS2
- NIST CSF
- GDPR
- PCI DSS
- HIPAA
- SOX
- COBIT 2019
- ...







ISO27001:2022

Information security, cybersecurity and privacy protection Information security management systems Requirements

International Organization for Standardization (ISO)

- Technology standard
- Lists 93 concrete controls to be applied
- Risk-based
- Best practice ("voluntary" compliance)
- Referenced by other specs (NIS2, NIST CSF)







NIS2

Directive (EU) 2022/2555 ... on measures for a high common level of cybersecurity across the Union, ...

European Parliament and the Council (EU)

- EU legislation (to be applied by 18th October 2024)
- High-level requirements (not very technical)
- Alignment of legislation across EU member states
- Stricter requirements than NIS1: broader scope, fines, personal responsibility







NIS2 and MidPoint

- NIS2 encourages the use of innovative technology, incl. AI (Part1-15)
- NIS2 encourages the use of open source (Part1-52)
- NIS2 explicitly mentions IAM (Part1-89)
- NIS2 reporting obligations would be almost impossible to satisfy without IGA
- NIS2 points to "state-of-the-art" and "industry best practice" → ISO27001, NIST CSF







NIST Cybersecurity Framework

Framework for Improving Critical Infrastructure Cybersecurity

U.S. National Institute of Standards and Technology (NIST)

- Version 2.0: final draft in early 2024 (NIST CSWP 29)
- Guidelines, mandatory for U.S. federal agencies and their contractors
- Used internationally as general best practice
- Risk-based







How Can We Help?

- IGA is absolutely essential component of cybersecurity
- No direct out-of-the-box compliance
 - midPoint cannot be "ISO27001 certified"
- However, we can help customers with compliance
 - Statement of Applicability (SoA)
 - Recommendations for midPoint configuration
 - Documentation
 - Future: Built-in tooling (e.g. compliance checklists/dashboards)
- Starting with ISO27001:2022





Preview: ISO27001 Statement of Applicability (Summary)

Work in progress: preliminary results

| Category | Number of controls | midPoint coverage | Percentage |
|----------------|--------------------|----------------------|------------|
| Organizational | 37 | 26 | 70 % |
| People | 8 | 7 | 88 % |
| Physical | 14 | 2 | 14 % |
| Technological | 34 | 22 | 65 % |
| Total | 93 | 57 | 61 % |

14 controls are almost impossible to implement without IGA platform in place





Preview: ISO27001 Statement of Applicability (Spreadsheet)

Work in progress: preliminary results

| | | | | month progress |
|--|----------|---|----------------------|--|
| ISO/IEC 27001:2022 Statement of Applicab | | | | |
| | Contro V | | Control applicable ? | Reference to Control Document/Evidence |
| | | | | |
| A5 - Orgi | A.5.1 | Policies for information security | 0 | midPoint segregation of duties |
| 45 - Org: | A.5.2 | Information security roles and responsibilities | 1 | midPoint segregation of duties |
| \5 - Org: | A.5.3 | Segregation of duties | 1 | segregation of duties |
| Þ | | | | |
| \5 - Orga | A.5.4 | Management responsibilities | 0 | |
| 45 - Org | A.5.5 | Contact with authorities | 0 | |
| A5 - Org: | A.5.6 | Contact with special interest groups | 0 | midPoint segregation of duties |





Preview: ISO27001 Statement of Applicability (Text)

Work in progress: preliminary results

5.18 Access rights

Role of midPoint: necessary

midPoint offers possibilities for creating business access roles that are easier managed. Customers can define approval procedures for granting access rights. Roles can be tagged for segregation of duties with selected behavior (e.g., automatic rejection). All the changes are recorded and available via logs also many changes and settings can be inspected directly in midPoint. Since midPoint can aggregate user identities from a lot of different systems, it can serve as a central point for access rights to all of the systems. With a recertification campaign it is possible to regularly check and control if access rights are still valid and proper. Important feature for all access roles is the possibility to set time expiration of access rights.

5.19 Information security in supplier relationships

Role of midPoint: optional

midPoint can manage access rights of suppliers, e.g., by creating temporary access rights automatically revoked on expired date, by creating a business role especially created for a specific supplier that can be easily monitored (who has access to that role) and revoked.





MidPoint ISO27001 Statement of Applicability (SoA)

- Starting point for midPoint evaluation and deployment
- Needs to be customized for ISO compliance, reflecting real configuration and processes
- Still work in progress







Documentation Links

MidPoint / Compliance / ISO27001

ISO27001 Compliance

Last modified 24 Jan 2024 13:22 +01:00

| Control ID | Control Name | Necessity | Features |
|------------|---|-----------|---|
| A.5.2 | Information security roles and responsibilities | optional | Role governance Approval process Delegated administration |
| A.5.3 | Segregation of duties | necessary | Segregation of duties |
| A.5.9 | Inventory of information and other associated assets | optional | Role governance Application inventory |
| A.5.10 | Acceptable use of information and other associated assets | necessary | Object lifecycle Object metadata Access certification Micro-certification |
| A.5.12 | Classification of information | optional | Role governance |





Documentation Links

Evolveum Docs

MidPoint IAM Introduction Book Identity Connectors Talks

Search

4.8

Identity and Access Management Book

MidPoint

Configuration reference

4.8

Roles and Policies

Access Certification

Assignment

Automatic Role Assignment

Meta-roles

Policy Rules

Policy-Driven RBAC

RBAC

Role Autoassignment

Role Catalog

Role Governance

Role Lifecycle

Role Mining

Roles and Policies

Configuration

Roles, Services and Orgs

Segregation of Duties

User-Friendly Policy

Selection

MidPoint / Configuration reference / 4.8 / Roles and Policies / Role Governance

Role Governance

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Work in progress

Lorem ipsum. Role has owners ... and approvers. We can set up approval policies ... and authorizations. Policy rules, policy rules must be there. Dolor sit amen.

See Also

- Policy Rules
- · Object Lifecycle

Compliance

This feature is related to the following ISO27001 controls:

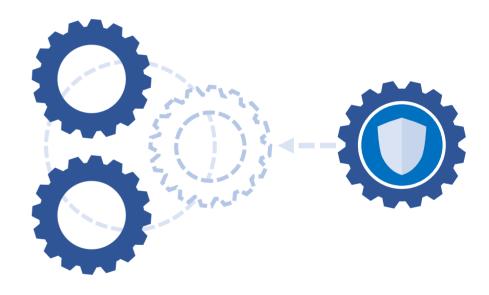
- · A.5.2 Information security roles and responsibilities
- · A.5.9 Inventory of information and other associated assets
- A.5.12 Classification of information





Plans

- Finish ISO27001 Statement of Applicability
- Documentation links and improvements
- Configuration suggestions
- NIS2 Statement of Applicability (as much as possible)
- NIST CSF?











Discussion











Conclusion

- Compliance with cybersecurity regulations and best practice
- ISO27001, NIS2, NIST CSF, ...
- It is **necessary**, for the benefit of us all
- It will be slow, painful and never-ending process
- MidPoint can help, make it faster and less painful
- We are working on it







Thank you for your attention

Feel free to ask your questions now!



MidPoint Working Group at TIIME 2024