

IBM and Cybersecurity Maturity Model Certification (CMMC)

In January 2020, the Department of Defense (DoD) released the Cybersecurity Maturity Model Certification (CMMC) v1.0 to proactively protect both Federal Contract Information (FCI) and Controlled Unclassified Information (CUI) that is shared between the US Government and Contractors. In the past, under NIST 800-171, though contractors were bound to protect this information, the US Government lacked a framework in place to enforce the rules. CMMC is designed to provide assurance to the DoD that its contractors can protect CUI in accordance with the guidelines of the NIST policy 800-171 (rev 2, Feb 2020) by adding a pre-award audit through 3rd party auditing organizations (3PAO's).

The CMMC defines 5 levels of cyber maturity from “Performed” (basic) to “Optimizing” (advanced) and lays out the standards-based requirements that need to be in place to achieve each level (Figure 1). Contracts will be awarded based on the level of a contractor’s certification.

To assess whether contractors have met any specific CMMC level, the DoD will deploy certified third-party assessor organizations (C3PAO's) to conduct audits. The practice of providing audits and ratings (level 1-5) is scheduled to commence in the latter half of 2020 and into 2021. Certain procurements in 2020 will include a requirement to have a CMMC Rating (1-5) in order to be able to bid on future work where CUI is included. The level indicates your company’s ability to secure CUI data up to the level that you are rated for. US Dept of Defense officials have stated that by 2023 they hope to have all procurements with CUI data contain a requirement for having a CMMC certification level, or a company will not be eligible to receive an award for the work. It is expected that once the DoD has this program up and running efficiently, it will be expanded to other segments such as civilian agencies and beyond.

IBM Security provides a range of products and services to help enhance your cyber security program to meet the guidelines of NIST 800-171 and other standards within scope of CMMC. The following pages will provide an overview on how working with IBM Security will help your company meet these requirements in an efficient and cost-effective way. For clarity, IBM is not providing audit or certification services at this time.

Level 1	Level 2	Level 3	Level 4	Level 5
PERFORMED	DOCUMENTED	MANAGED	REVIEWED	OPTIMIZING
Basic cyber hygiene	Intermediate hygiene	Good hygiene	Proactive	Advanced / progressive

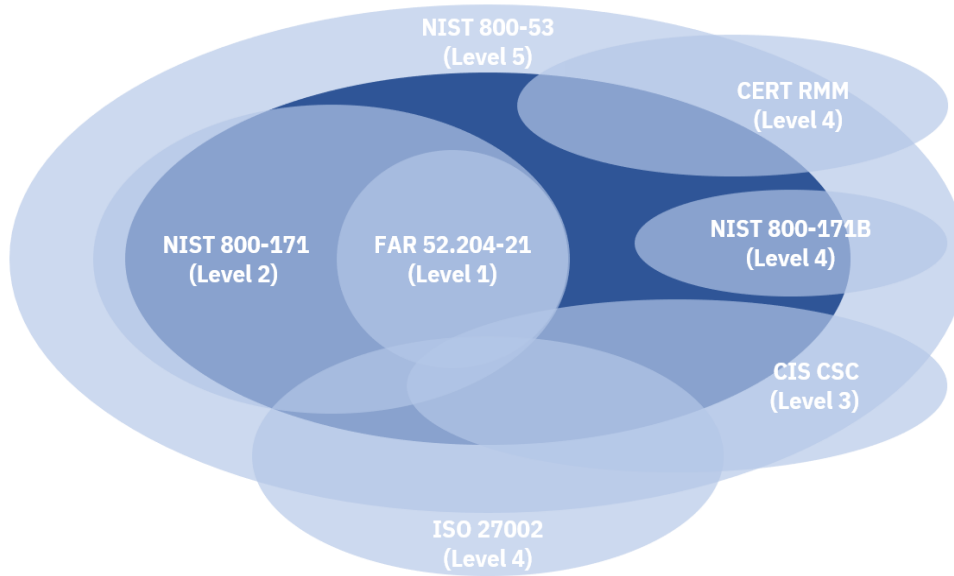


Figure 1. CMMC standards requirements by certification level and relationship between various standards. E.g. NIST 800-53 includes all controls for 800-171 but not ISO 27002.

CMMC also defines 17 security domains, each listing the technical capabilities, best practices and procedures that are required to be in place to meet the challenges of each of them. The controls defined in each domain increase in number and sophistication for each level of certification being sought.

Access Control	Asset Management	Awareness and Training	Audit and Accountability	Configuration Management
Identification and Authentication	Incident Response	Maintenance	Media Protection	Personnel Security
Physical Protection	Recovery	Risk Management	Security Assessment	Situational Awareness
System and Communications Protection		System and Information Integrity		

Figure 2. CMMC security domains

IBM Security recognizes that Federal System Integrators, contractors and small businesses will be challenged with the implementation of CMMC, and the management of the complex environments needed to accommodate FCI/CUI data.

We'd welcome the opportunity to engage with you in a review of your organization's people, processes, and technologies and identify areas where resources should be focused to move towards CMMC readiness. Additional guide documentation (available upon request) indicates how CMMC control requirements are laid out within the aforementioned 17 domains, and how specific security solution functionality can assist in the satisfaction of those requirements.

About IBM Security

IBM Security works with you to help protect your business with an advanced and integrated portfolio of enterprise security products and services plus a modern approach to your security strategy using Zero Trust principles, helping you thrive in the face of uncertainty. To learn more, visit <https://www.ibm.com/security>.

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