DoD UNIFIED FACILITIES CRITERIA PROGRAM

FY 2023 Program Review
## Table of Contents

1 Executive Summary ................................................................. 2  

2 Program Overview ................................................................. 4  
   2.1 Program Authority ................................................................. 4  
   2.2 Program Organization ......................................................... 5  
   2.3 Program Administration ..................................................... 5  
   2.4 Program Resources ............................................................. 5  

3 Key Highlights and Accomplishments ........................................... 7  
   3.1 UFC/UFGS Highlights .......................................................... 7  
   3.2 Upgrading UFC Program Resourcing ...................................... 7  
   3.3 Discipline Working Group Quarterly Reports and Executive Briefings… 7  
   3.4 Military Medical Facilities .................................................. 8  
   3.5 Construction Cost Estimating .............................................. 8  
   3.6 Civil Engineering ............................................................... 8  
   3.7 Consolidated Planning UFC ................................................ 9  
   3.8 Indoor Environmental Quality .............................................. 9  
   3.9 SpecsIntact Transition ........................................................ 9  
   3.11 Arctic Region Criteria ...................................................... 10  
   3.12 Criteria Management System ............................................. 10  
   3.13 DWG Training Workshop .................................................. 10  
   3.14 Non-Government Standards ............................................. 10  
   3.15 Project Prioritization for FY 2024 ....................................... 10  

4 Unified Facilities Criteria (UFC) ................................................. 12  
   4.1 Introduction ........................................................................ 12  
   4.2 Criteria Strategy ............................................................... 12  
   4.3 Health Metrics ................................................................. 13  
   4.4 FY 2023 UFC Publications ................................................. 14  
   4.5 FY 2024 UFC Projects ....................................................... 14  

5 Unified Facilities Guide Specifications (UFGS) ............................. 17  
   5.1 Introduction ........................................................................ 17  
   5.2 Criteria Strategy ............................................................... 17  
   5.3 Health Metrics ................................................................. 17  
   5.4 FY 2023 New and Revised UFGS ....................................... 18  
   5.5 FY 2024 UFGS Projects ..................................................... 18  

6 Criteria Change Requests ......................................................... 22  
   6.1 Introduction ....................................................................... 22  
   6.2 CR Status ...................................................................... 22
1 EXECUTIVE SUMMARY

The Department of Defense (DoD) is streamlining government criteria by eliminating duplication and increasing reliance on private sector standards. Since 1998, the Unified Facilities Criteria (UFC) Program, under the leadership of the Engineering Senior Executive Panel (ESEP), implements these requirements for facility planning, design, construction, operations, and maintenance.

Unified Facilities Criteria, Facility Criteria (FC), and Unified Facilities Guide Specifications (UFGSs) are technical criteria documents and specifications used for planning, design, construction, and maintenance of all DoD facility projects. Highlights and accomplishments for FY 2023 include:

- Achieved a 78% unification rate for all UFC documents and 77% unification rate for all UFGSs;
- Published 17 new or revised UFCs;
- Published 84 new or revised UFGSs; and
- Managed over 1,500 Criteria Change Requests (CCRs) submitted in FY 2023.

In addition to criteria document improvements, the program provides technical expertise and guidance on many key DoD issues. Major highlights and accomplishments in FY 2023 include:

- Continued to receive increased resourcing in order to reduce the backlog of overdue documents. The program received increased military resilience funding focusing on climate change resilience.
- Continued to implement quarterly reports with program metrics. These reports provide a graphic update of program status for each of the 23 Discipline Working Groups (DWGs). Conducted executive briefs with all 23 DWGs on status of reports and issues of concern. These have resulted in a significant reduction in number of overdue documents.
- Published UFC 4-510-01 Design: Military Medical Facilities that provides technical design guidance and mandatory requirements for DoD medical facilities.
- Published UFC 3-740-05 Construction Cost Estimating that establishes uniform guidance to describe methods, procedures, and formats for the preparation of cost estimates and associated analyses.
- Published UFC 3-201-01 Civil Engineering that provides civil engineering requirements for all new and renovated government facilities for DoD.
- Began development of a new consolidated planning UFC to bring together design criteria to be considered in the project planning phase.
- Addressed issues concerning indoor environmental quality in order to improve livability in DoD facilities so that recruitment and retention are also improved.
• Successfully completed implementing the transfer of SpecsIntact from the National Aeronautics and Space Administration (NASA) to DoD, reflecting NASA’s decision to end its support of SpecsIntact and exit the program by the end FY 2023.
• Reviewed multiple provisions in the FY 2023 National Defense Authorization Act (NDAA) requiring changes to the UFC Program.
• Began reactivating and updating UFCs that are relevant to Arctic region criteria.
• Enhanced the Criteria Management System (CMS) in terms of overall design and new features.
• Conducted an in-person DWG Training Workshop to provide better program alignment and direction across DWGs to improve consistency and efficiencies.
• Awarded Non-Government Standards contract to supply access to non-government codes and standards for the field offices of the relevant Military Departments.
2 PROGRAM OVERVIEW

2.1 Program Authority

Figure 2-1 shows the UFC program background and authorities. Public Law 104-113 (the National Technology Transfer and Advancement Act) and OMB Circular A119 (1998) require agencies to streamline government criteria by eliminating duplication of information and increasing reliance on private sector standards. For facility planning, design, construction and maintenance, the DoD complies with these requirements through the UFC Program. The UFC Program is implemented through Military Standard (MIL-STD) 3007G, Standard Practice for Unified Facilities Criteria, Facilities Criteria and Unified Facilities Guide Specifications in compliance with DoD Instruction 4120.24, “Defense Standardization Program,” and directed by DoD Directive 4270.5, “Military Construction.” The UFC Program objectives are:

- Streamline the military criteria by eliminating duplication of information;
- Increase reliance on private sector standards; and
- Create a more efficient criteria development and publishing process.

![Figure 2-1: UFC Program Background and Authorities](image-url)
2.2 Program Organization

The Engineering Senior Executive Panel (ESEP) provides program guidance, resourcing, and criteria approval. The Coordinating Panel (CP) provides program management and oversees the criteria discipline and functional working groups. The Discipline Working Groups (DWGs) and Functional Working Groups (FWGs) are responsible for criteria development and production. Membership and structure are shown in Figure 2-2.

- ESEP Chair–David Dentino, Air Force Civil Engineering Center
- CP Chair–Renee Ayala, Air Force Civil Engineering Center; and
- 23 Discipline and Functional Working Groups.

![Figure 2-2](image)

2.3 Program Administration

The ESEP assigns personnel within U.S. Army Corps of Engineers (USACE), Naval Facilities Engineering Systems Command (NAVFAC), Air Force Civil Engineer Center (AFCEC), and the Office of the Secretary of Defense (OSD) to participate on the CP and the 23 DWGs and FWGs. The working groups are responsible for development and maintenance of the criteria documents by in-house staff or through architect-engineering contracts.

2.4 Program Resources

The ESEP resources the UFC program administration through USACE, NAVFAC, AFCEC, and OSD. As such, the CP and the DWGs and FWGs are responsible for program management, development, and maintenance of the criteria documents.
Funding is allocated by each Service component to support criteria work which requires resources outside of the working group. The breakout of funding allocated to criteria development and updates is shown in Table 2-1.

<table>
<thead>
<tr>
<th>Service Component</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>FY 2022</th>
<th>FY 2023</th>
</tr>
</thead>
<tbody>
<tr>
<td>USACE</td>
<td>$1,321,000</td>
<td>$1,300,000</td>
<td>$1,772,000</td>
<td>$4,234,400</td>
</tr>
<tr>
<td>NAVFAC</td>
<td>$1,383,000</td>
<td>$1,951,540</td>
<td>$2,472,500</td>
<td>$2,975,000</td>
</tr>
<tr>
<td>AFCEC</td>
<td>$1,215,000</td>
<td>$3,900,000</td>
<td>$2,235,000</td>
<td>$1,880,000</td>
</tr>
<tr>
<td>OSD</td>
<td>$379,000</td>
<td>$0</td>
<td>$4,788,000</td>
<td>$9,400,000</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>$4,298,000</strong></td>
<td><strong>$7,151,540</strong></td>
<td><strong>$11,267,500</strong></td>
<td><strong>$18,489,400</strong></td>
</tr>
</tbody>
</table>

Table 2-1
Criteria Development Funding

In addition to direct funding for development and maintenance of DoD criteria, funding is required for DoD access to non-government standards (industry consensus standards), management and distribution of DoD standards on the Whole Building Design Guide (WBDG), and administration and maintenance of SpecsIntact. Significant cost savings are realized for these services by procurement through DoD bulk service contracts.

Though the costs have been steady over the history of the program, increases in FY 2023 are the result of (a) appropriated Climate and Resiliency Planning and Design funding from each service, (b) a programmatic shift initiated by the CP and approved by the ESEP to increase funding commitments to address overdue documents, and (c) funding provided by the DoD to address targeted initiatives including Area Cost Factors, non-government standards, and upgrades to both the WBDG and SpecsIntact. The breakout of FY 2023 criteria support costs is shown in Table 2-2.

<table>
<thead>
<tr>
<th></th>
<th>FY 2023 Funding</th>
</tr>
</thead>
<tbody>
<tr>
<td>SpecsIntact</td>
<td>$1,550,000</td>
</tr>
<tr>
<td>SpecsIntact/Windows® Compatibility (update)</td>
<td>0</td>
</tr>
<tr>
<td>NIBS/WBDG</td>
<td>$675,000</td>
</tr>
<tr>
<td>Non-Government Standards Support</td>
<td>$4,150,000</td>
</tr>
<tr>
<td>UFC and UFGS Program Administration</td>
<td>$225,000</td>
</tr>
<tr>
<td>DoD Area Cost Factor Survey</td>
<td>$580,000</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>$7,180,000</strong></td>
</tr>
</tbody>
</table>

Table 2-2
Criteria Access and Distribution—FY 2023 Funding
3 KEY HIGHLIGHTS AND ACCOMPLISHMENTS

3.1 UFC/UFGS Highlights

For FY 2023, the UFC program achieved 78% unification rate for all UFC and 77% for all UFGS documents up from 9% in 1998 (baseline year). The program continued to sustain 100% unification rate for all core UFC documents. Core UFCs that are not current have ongoing projects to revise those documents.

The program published 17 new or revised UFCs and 84 new or revised UFGSs. The CP continued the process of developing core UFGSs similar to the core UFCs and continued bundling of UFGSs for more cost-effective and efficient updates. Program health indices were again improved by removing inactive and archived UFCs from the active document inventory. The number of overdue documents was significantly reduced during the course of the year.

3.2 Upgrading UFC Program Resourcing

Throughout FY 2023, the UFC Program continued to receive increased resourcing funding and hiring in order to reduce the backlog of overdue documents. Program funding increased 64% from FY 2022 to $18.5 million. The CP and ESEP continued to take advantage of increased funding, including resilience funding. Plans are in place to continue the UFC program at an elevated level for FY 2024 in response to the plan developed by the CP in FY 2023.

3.3 Discipline Working Group Quarterly Reports and Executive Briefings

During FY 2023, the CP continued to implement quarterly reports with program metrics. These reports provide a graphic update of program status for each of the 23 DWGs and FWGs, which are collectively referred to as DWGs. The CP also conducted executive briefs with 16 DWGs on status of reports and issues of concern. These have resulted in a significant reduction in number of overdue documents. Figure 3-1 shows the health of each DWG detailing the number of current and overdue documents with the health score noted for both current and previous.
3.4 Military Medical Facilities

FY 2023 saw the publication of UFC 4-510-01 Design: Military Medical Facilities that provides technical design guidance and mandatory requirements for DoD medical facilities. This UFC sets forth performance and quality requirements for such facilities.

3.5 Construction Cost Estimating

UFC 3-740-05 Construction Cost Estimating was updated and published in FY 2023. The document establishes uniform guidance to describe methods, procedures, and formats for the preparation of cost estimates and associated analyses. It addresses the various phases of cost estimating from the initial start of design through modification of cost estimates during construction.

3.6 Civil Engineering

Publication of UFC 3-201-01 Civil Engineering took place in FY 2023. This document provides civil engineering requirements for all new and renovated government facilities for DoD. It applies to all service elements and contractors involved in the planning, design, and construction of permanent DoD facilities worldwide. It is also applicable to all methods of project delivery and levels of construction.
3.7 Consolidated Planning UFC

FY 2023 saw the initiation of a new consolidated planning UFC to bring together design criteria to be considered in the project planning phase. DWGs examined 80 existing UFCs to extract relevant planning criteria. It is planned to be issued in 2024.

3.8 Indoor Environmental Quality

In FY 2023, the UFC program began to address issues concerning indoor environmental quality in order to improve livability in DoD facilities so that recruitment and retention are also improved. Indoor environmental quality involves the quality of human-occupied spaces in military facilities; it involves design and construction but also facility management.

3.9 SpecsIntact Transition

In FY 2023, DoD successfully completed implementing the transfer of SpecsIntact from NASA to DoD, reflecting NASA’s decision to end its support of SpecsIntact and exit the program by the end of FY 2023. SpecsIntact is an automated system for preparing standardized facility construction specifications used worldwide by DoD. Previously, NASA has provided SpecsIntact's development and operational support with shared funding by DoD. In FY 2022, DoD began implementing the transfer of SpecsIntact from NASA to DoD.


Provisions in the FY 2023 NDAA required changes to the UFC Program in five areas:
1) Consideration of installation of solar roofing. UFC 1-200-01 DoD Building Code updated to incorporate this consideration. This will eventually be included in a new comprehensive planning UFC currently being developed.
2) Gas-insulated switchgear. Relevant UFGSs modified to include distinct specification for medium voltage gas-insulated switchgear.
3) Microgrids. Relevant UFCs and UFGSs modified to include criteria and specifications for microgrids and microgrid controllers.
4) Electrical Charging Capability. UFC 1-200-01 DoD Building Code modified to include provisions that provide electrical charging for vehicles under covered parking facilities. These provisions will eventually be incorporated into a new comprehensive planning UFC currently being developed.
5) Innovative Construction Materials. The Sustainability DWG is developing a report to Congress on DoD’s efforts to integrate sustainable building materials in UFC and UFGS criteria.
3.11 Arctic Region Criteria

During FY 2023, appropriate DWGs began reactivating and updating UFCs that are relevant to Arctic region criteria. Currently, many Arctic documents are inactive and need to be updated including renaming and renumbering. These documents are unique because the locale—the Arctic and Sub-Arctic—has unique requirements. Appropriate DWGs include Civil, Geotechnical and Architecture.

3.12 Criteria Management System

The Criteria Management System (CMS) is the DoD system to manage the UFC program including the document approval process. In FY 2023, enhancements were made to improve CMS in terms of overall design and new features including a new platform. A waivers module was introduced as a document storage item to track project waivers issued by the Services. New training modules were made available.

3.13 DWG Training Workshop

The DWG Training Workshop took place in August 2023 at the Humphrey’s Engineering Center in Northern Virginia. The workshop’s purpose was to provide better program alignment and direction across DWGs to improve consistency and efficiencies. Seventy-five DoD personnel attended representing all 23 DWGs. A good portion of the attendees were new to the program, so were able to learn the processes and procedures of the UFC program.

3.14 Non-Government Standards

In FY 2023, DoD awarded Accuris a contract to supply access to non-government codes and standards for the field offices of the relevant Military Departments.

3.15 Project Prioritization for FY 2024

During FY 2023, the CP conducted an in-depth project prioritization for FY 2024 UFC and UFGS projects. DWGs were notified with a call for projects, and input was received from 19 DWGs. DWGs submitted 56 project proposals requesting $11.9 million; 44 were funded at FY 2024 cost of $7.7 million of which $2.6 million qualified for resilience funding. Table 3.1 shows funding committed by Service for FY 2024; Figure 3-2 shows funding commitment by DWG.
<table>
<thead>
<tr>
<th>Army Funding</th>
<th>Navy Funding</th>
<th>Air Force Funding</th>
<th>Army Resilience Funding</th>
<th>Navy Resilience Funding</th>
<th>Air Force Resilience Funding</th>
</tr>
</thead>
<tbody>
<tr>
<td>$2,435,000</td>
<td>$1,360,000</td>
<td>$1,300,000</td>
<td>$0</td>
<td>$1,735,000</td>
<td>$900,000</td>
</tr>
</tbody>
</table>

**Table 3-1**  
FY 2024 Funding Commitment by Service

![Pie chart](image)

**Figure 3-2**  
Estimated FY 2024 Funding Commitment by DWG as of August 2023
4 UNIFIED FACILITIES CRITERIA (UFC)

4.1 Introduction

UFC and FC documents are technical manuals used for planning, design, construction, and maintenance of DoD facilities. These documents define design requirements and best practices for DoD construction projects. A smaller percentage of UFCs provides planning requirements, maintenance guidance, and handbook-type information used by field personnel.

4.2 Criteria Strategy

Industry codes and standards provide minimum consensus safety and performance requirements and are the basis of DoD criteria. UFC 1-200-01 DoD Building Code implements the International Building Code, International Existing Building Code, and other consensus codes and standards. UFC 1-200-01 also references 28 other “core” UFC documents and other DoD special requirements to implement legislation and policy, and provide criteria associated with unique DoD functions. These documents collectively comprise the “DoD Building Code.”

The remaining UFC and FC documents generally fall into two categories: facility-type or specialty-type. Facility-type UFC documents provide space and functional requirements for facilities built frequently (such as fitness centers) or have unique DoD requirements.

Figure 4-1
DoD Facilities Criteria Strategy
(such as aircraft hangars and Navy piers). Specialty-type UFC documents are used on projects that require the use of a specialty system or component (such as cathodic protection, boiler control systems, and dockside utilities). Figure 4-1 illustrates this DoD facilities criteria strategy.

4.3 Health Metrics

Table 4.1 shows the primary indicators of UFC health: “% Unified” and “% Current.” % Unified represents the percentage of total UFC documents used by all three Military Departments that are unified and indicates progress toward reducing duplicate criteria. % Current represents the percentage of all UFC documents that have been revised within a specified target timeframe or refresh rate. Refresh rates are assigned as 3 years, 6 years, 9 years, or 12 years. UFC documents can be updated on an interim basis by incorporating minor changes and publishing as a “Change” or restored to a current status by incorporating major changes as a “Revision.” A “Revision” improves program health metrics while a “Change” does not.

The baseline for % Unified data is extracted from the March 1998 report to the Congressional Defense Committees titled “Unified Design Guidance.”

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Total #</td>
<td>361</td>
<td>260</td>
<td>164</td>
<td>176</td>
<td>178</td>
<td>181</td>
</tr>
<tr>
<td>UFC &amp; FC</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>% Unified</td>
<td>9%</td>
<td>40%</td>
<td>80%</td>
<td>74%</td>
<td>74%</td>
<td>78%</td>
</tr>
<tr>
<td>% Current</td>
<td>N/A</td>
<td>N/A</td>
<td>57%</td>
<td>64%</td>
<td>60%</td>
<td>63%</td>
</tr>
</tbody>
</table>

Table 4-1
UFC Health Metrics
A UFC or FC is considered “current” when its individual health index is less than one. The health index of a document is a measure of the age of the document as compared to its refresh rate, see Equation 4-1. Hence, if the health index of the document is less than one, the document is considered to be up to date and current. If a document health index is greater than one, it is considered beyond its established refresh rate and requires a revision to revalidate and update requirements. Note that a document with a health index greater than one does not mean the document is invalid. It signifies that the document needs revalidation or revisions to remain current.

\[
\text{Document Health Index} = HI_{\text{DOC}} = \frac{(Current \ Date - Document \ Publication \ Date)_{\text{yrs}}}{(Refresh \ Rate)_{\text{yrs}}}
\]

Equation 4-1
Document Health Index

4.4 FY 2023 UFC Publications

In FY 2023, 17 new or revised UFC were published:

- UFC 3-520-02 Facility Energy System Resiliency and Reliability
- UFC 3-210-10 Low Impact Development
- UFC 4-010-06 Cybersecurity of Facility-Related Control Systems
- UFC 4-150-07 Waterfront Facilities: Operations and Maintenance
- UFC 4-722-01 Design: Dining Facilities
- UFC 4-730-01 Military Family Service Centers
- UFC 4-740-20 Libraries
- UFC 4-420-01 Ammunition and Explosive Storage Magazines
- UFC 4-826-10 Design: Refrigeration Systems for Cold Storage
- UFC 3-530-01 Interior and Exterior Lighting Systems and Controls
- UFC 4-510-01 Design: Military Medical Facilities
- UFC 3-240-13FN Industrial Water Treatment Operation and Maintenance
- UFC 3-740-05 Construction Cost Estimating
- UFC 3-450-01 Noise and Vibration Control
- UFC 3-201-01 Civil Engineering
- UFC 3-540-01 Engine-Driven Generator Systems for Prime and Standby Power Applications

4.5 FY 2024 UFC Projects

The following UFCs comprise approved and funded projects for FY 2024.
Architecture
- UFC 4-721-02F Air Force Level I Confinement Facility
- UFC 1-200-01 DoD Building Code

Aviation
- UFC 4-211-02 Aircraft Corrosion Control and Paint Facilities

Civil
- UFC 3-810-01N Navy and Marine Corps Environmental Engineering for Facility Construction

Comprehensive Planning
- TBD Site Planning
- TBD Project Planning Requirements

Contingency Engineering
- TBD Cold Formed Steel Machine Requirements for Non-Permanent Facilities
- UFC 1-201-01 Non-Permanent DoD Facilities in Support of Military Operations

Control Systems
- UFC 3-410-02 Direct Digital Control for HVAC and Other Building Control Systems
- UFC 3-470-01 Utility Monitoring and Control System (UMCS) Front End and Integration
- UFC 3-530-01 Interior and Exterior Lighting Systems
- UFC 4-010-06 Cybersecurity of Facility-Related Control Systems
- UFC 3-550-04 Installation Microgrid Design

Design-Build
- Navy Design-Build Templates

Electrical
- UFC 3-575-01 Lightning and Static Electricity Protection Systems
- UFC 3-520-02 Facility Energy System Resiliency and Reliability

Facility Space Planning
- UFC 2-000-05N 200 Series: Maintenance and Production Facilities

Geotechnical
- UFC TBD Dam Performance Criteria
- UFC 3-220-08FA Engineering Use of Geotextiles
Installation Resilience

- UFC 3-550-04 Installation Microgrid Design
- UFC 3-440-01 Facility-Scale Renewable Energy Systems
- UFC 3-470-01 Utility Monitoring and Control System (UMCS) Front End and Integration
- UFC 3-540-01 Engine-Driven Generator Systems for Prime and Standby Power Applications
- UFC 3-540-08 Utility-Scale Renewable Energy Systems
- UFC 3-550-01 Exterior Electrical Power Distribution
- UFC TBD Installation Resiliency Criteria Roadmap

Mechanical

- UFC 3-410-01 Heating, Ventilating and Air Conditioning
- UFC 3-490-06 Design: Elevators

Pavements/Airfields

- UFC 3-260-04 Airfield and Heliport Marking Sustainability
- UFC 3-250-01 Pavement Design for Roads and Parking Areas

Structural

- UFC 3-301-01 Structural Engineering
- UFC 3-301-02 Design of Risk Category V Structures, National Strategic Military Assets
- 3-Bar Standard Navy ECM

Waterfront

- UFC 4-159-03 Moorings
5.1 Introduction

UFGSs are technical master guide specifications used in construction projects. UFGSs reference industry-consensus test and material standards and are mostly prescriptive in nature. UFGSs are edited by the designer for each project and are directed to the construction contractor. Sections are numbered and titled in accordance with Construction Specifications Institute’s (CSI) Masterformat™. Sections are organized into three parts in accordance with UFC 1-300-02 UFGS Format Standard:

Part 1 – GENERAL
References
Submittals

Part 2 – PRODUCTS
System performance
Materials

Part 3 – EXECUTION
How to install
Field quality control and testing

5.2 Criteria Strategy

UFGSs provide the level of quality and performance to provide best life-cycle cost sustainment for DoD facilities over a 45-55-year service life. UFGSs are editable in order to adjust quality and level of performance based on project specific factors such as climate zone, site factors, structural loading, corrosion potential, durability requirements, facility criticality, and appearance requirements. DWGs identify the primary UFC tied to their UFGS, and its relationship in content (low, medium, or high) as part of this effort. CMS is being programmed to show the UFC and UFGS relationship fields in the document screens. In FY 2018, the CP began the process of identifying core UFGSs similar to the core UFCs and continued bundling of UFGSs for more cost-effective and efficient updates.

5.3 Health Metrics

Figure 5-1 shows the primary indicators of UFGS health: “% Unified” and “% Current.” % Unified represents the percentage of total UFGSs used by all three Military Departments that are unified and indicates progress toward reducing duplicate criteria. % Current represents the percentage of all UFGSs that have been revised within a
specified target timeframe or refresh rate. Refresh rates are assigned as 3 years, 5 years, or 7 years.

The baseline for % Unified data is extracted from the March 1998 report to the Congressional Defense Committees titled “Unified Design Guidance.”

UFGSs are considered “current” when their individual health index is less than one. Similar to UFC and FC, the UFGS health index of a document is a measure of the age of the document as compared to its refresh rate, see equation 4-1.

![Graph showing the change in # Total UFGS, % Unified, and % Current over time]

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td># Total UFGS</td>
<td>1179</td>
<td>830</td>
<td>781</td>
<td>775</td>
<td>770</td>
<td>770</td>
</tr>
<tr>
<td>% Unified</td>
<td>0%</td>
<td>67%</td>
<td>73%</td>
<td>75%</td>
<td>73%</td>
<td>77%</td>
</tr>
<tr>
<td>% Current</td>
<td>N/A</td>
<td>N/A</td>
<td>57%</td>
<td>62%</td>
<td>60%</td>
<td>58%</td>
</tr>
</tbody>
</table>

Table 5-1
UFGS Health Metrics

5.4 FY 2023 New and Revised UFGS

In FY 2023, 84 new or revised UFGS were published. A complete listing of UFGS can be found at: [https://www.wbdg.org/ffc/dod/unified-facilities-guide-specifications-ufgs](https://www.wbdg.org/ffc/dod/unified-facilities-guide-specifications-ufgs)

5.5 FY 2024 UFGS Projects

The following UFGS comprise the funded and approved projects for FY 2024.
Architecture
- UFGS 08 51 13 Aluminum Windows
- UFGS 09 72 00 Wallcoverings
- UFGS 09 84 20 Acoustical Wall Panels
- UFGS 10 14 00.10 Exterior Signage
- UFGS 12 50 00.13 Furniture and Furniture Installation
- UFGS 12 59 00 Systems Furniture
- UFGS 13 34 19 Metal Building Systems
- UFGS 02 05 33 Landscape Establishment
- UFGS 32 92 19 Seeding
- UFGS 32 92 23 Sodding
- UFGS 32 93 00 Exterior Plants
- UFGS 02 81 00 Transportation and Disposal of Hazardous Materials
- UFGS 02 82 00 Asbestos Remediation
- UFGS 02 83 00 Lead Remediation
- UFGS 02 85 00 Mold Remediation
- UFGS 09 62 38 Static-Control Flooring
- UFGS 09 64 29 Wood Strip and Plank Flooring
- UFGS 09 64 66 Wood Athletic Flooring
- UFGS 09 66 23 Resinous Matrix Terrazzo Flooring

Civil Engineering
- UFGS 32 16 19 Concrete Curbs, Gutters and Sidewalks
- UFGS 33 30 00 Sanitary Sewerage
- UFGS 33 11 13 Potable Water Supply Wells
- UFGS 46 30 00 Water and Wastewater Chemical Feed Systems
- UFGS 46 31 11 Chlorine Gas Feed Equipment
- UFGS 32 31 26 Wire Fences and Gates

Construction
- UFGS 01 33 00 Submittal Procedures

Control Systems
- UFGS 23 09 00 Instrumentation and Control for HVAC
- UFGS 23 09 23.01 Lonworks Direct Digital Control for HVAC and Other Local Building System
- UFGS 23 09 23.02 BACnet Direct Digital Control Systems for HVAC and Other Building Control Systems
- UFGS 25 05 11 Cybersecurity for Facility-Related Control Systems
- UFGS 25 10 10 Utility Monitoring and Control System (UMCS) Front End and Integration
• UFGS 26 51 00 Interior Lighting
• UFGS 23 09 23.02 BACnet Direct Digital Control Systems for HVAC and Other Building Control Systems

**Electrical**
• UFGS 27 05 29.00 10 Protective Distribution System (PDS) for SIPRNET Communication Systems
• UFGS 27 05 26 Grounding and Bonding for Communications Systems

**Fire Protection**
• UFGS 21 30 00 Fire Pumps

**Fuels**
• UFGS 33 52 23.15 POL Service Piping Welding
• UFGS 33 52 40 Fuel Systems Piping (Non-Hydrant)
• UFGS 33 57 55 Fuel Systems Components (Non-Hydrant)

**Geotechnical**
• UFGS 31 05 19.13 Geotextiles for Earthwork
• UFGS 31 32 19.13 Geogrid Soil Stabilization
• UFGS 31 32 19.16 Geotextile Soil Stabilization
• UFGS 31 32 39 Bioengineering Practices for Stream Bank and Shoreline Stabilization
• UFGS 31 35 19.13 Geogrid Slope Protection

**Installation Resiliency**
• UFGS TBD Microgrid Controllers
• UFGS 25 10 10 Utility Monitoring and Control System (UMCS) Front End and Integration
• UFGS 26 13 00 SF6/High-Firepoint Fluids Insulated Pad-Mounted Switchgear
• UFGS 26 13 01 Pad-Mounted Dead-Front Air Insulated Switchgear
• UFGS 26 31 00 Facility-Scale Solar Photovoltaic (PV) Systems
• UFGS 26 32 15.00 Diesel-Generator Set Stationary 15-2500 KW, with Auxiliaries

**Mechanical**
• UFGS 14 21 13 Electric Traction Freight Elevators
• UFGS 14 21 23 Electric Traction Passenger Elevators
• UFGS 14 24 13 Hydraulic Freight Elevators
• UFGS 14 24 23 Hydraulic Passenger Elevators
• UFGS 23 21 23 Hydronic Pumps
• UFGS 22 31 00 Water Softeners, Cation-Exchange (Sodium Cycle)
• UFGS 23 64 10 Water Chillers, Vapor Compression Type
• UFGS 22 31 00 Water Softeners, Cation-Exchange (Sodium Cycle)
• UFGS 23 03 00.00 20 Basic Mechanical Materials and Methods
• UFGS 23 44 00.00 10 Chemical, Biological and Radiological (CBR) Air Filtration System
• UFGS 23 65 00 Cooling Towers and Remote Evaporatively-Cooled Condensers
• UFGS 40 60 00 Process Control

Medical
• UFGS 22 00 70 Plumbing for Healthcare Facilities
• UFGS 22 60 70 Gas and Vacuum Systems for Healthcare Facilities

Pavements/Airfields
• UFGS 32 01 19.61 Sealing of Joints in Rigid Pavement
• UFGS 32 11 13.16 Bituminous-Stabilized Subgrade
• UFGS 32 11 26 Hot-Mix Bituminous Base Course for Roads and Streets
• UFGS 32 11 26.19 Bituminous-Stabilized Base and Subbase Course
• UFGS 32 12 16.16 Road-Mix Asphalt Paving
• UFGS 32 12 36.26 Polymer Concrete-Micro-Overlay (PCMO) for Fuel and Abrasion Resistant Wearing Surfaces

Specifications
• UFGS 01 42 00 Sources for Reference Publications

Structural
• UFGS 03 30 00 Cast-In-Place Concrete
6 CRITERIA CHANGE REQUESTS (CCRS)

6.1 Introduction

CCRs provide a process whereby users of UFCs, FCs, and UFGSs can submit commentary on DoD criteria documents. Such commentary may warrant corrections to the documents that reflect lessons learned and/or current industry standards and work practices. Anyone with access to the internet may use CCRs to document and submit comments on a UFC, FC, or UFGS. The CCR database is part of the Criteria Management System so as to improve working group notification, execution, and tracking of CCRs. The CCR commenting system is an open system. The system handles thousands of queries and comments a year.

6.2 CCR Status

CCR status provides a means to manage and track submitted CCRs until they are completed and incorporated into UFC, FC or UFGS documents or disapproved. Depending on the potential impact of an approved CCR, consideration is given to the urgency of the requested change. In some instances, the approved CCR change may occur quickly, and necessary changes or revisions are made to UFC, FC or UFGS documents. In other instances, where the change is not urgent, but necessary, the CCR will be incorporated into the criteria documents at the next scheduled revision to the document during the normal revision cycle. Once reviewed and approved, a CCR remains in an 'Approved' status until it is incorporated into the criteria documents at which time it is marked ‘Complete/Incorporated.’

In FY 2022, the CP developed the CCR quarterly reporting system developed to track CCR status by DWG. Figure 6-1 shows a typical quarterly report. For each DWG, the chart shows total number of CCRs, the percentages awaiting review, in review, approved for next document change or for next document revision.

In FY 2023, approximately 1,500 CCRs were submitted.
Figure 6-1
Quarterly Report for CCR Health