



# **NGAC Comments on FY 2022 FGDC Summary of GDA Annual Reports**

A Report of the National Geospatial Advisory Committee  
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## 1.0 Overview

The Geospatial Data Act of 2018 (GDA) outlines annual reporting responsibilities for Federal agencies, including a summary and evaluation of the achievements of covered agencies and lead covered agencies. “Covered agencies” are defined in the GDA as having specific geospatial management responsibilities, and “lead covered agencies” are defined as ones that also have lead responsibility for coordination and management of National Geospatial Data Asset (NGDA) data themes. Specifically, the covered agencies and lead covered agencies are required to report on whether they:

- Meet expectations;
- Have made progress toward expectations; or
- Fail to meet expectations.

The covered agencies report on thirteen (13) agency responsibilities found in GDA section 2808(a), while the lead covered agencies report on the status of each NGDA data theme as defined in GDA section 2805(b)(3).

The Federal Geographic Data Committee (FGDC) developed a summary of these annual reports detailing the status of each covered agency and each NGDA data theme for fiscal year (FY) 2022. As required under GDA Section 2802(c)(11)(A), the FGDC provided this summary report to the National Geospatial Advisory Committee (NGAC) for review and comment. The NGAC commends that all covered agencies and lead covered agencies complied with the reporting requirements.

For the Covered Agencies, the number of “Fail to meet expectations” entries decreased from four to three entries from 2021 to 2022. The Department of Transportation and Housing and Urban Development both improved to meeting expectations for the requirements where previously they failed to meet expectations. The Department of Labor no longer meets expectations for Requirement 5 – allocate resources for geospatial data management responsibilities. The Department of Homeland Security and the Department of Energy continue to fail to meet expectations for Requirement 10 – declassified data.

This paper provides the NGAC’s comments on the FY 2022 FGDC summary report. The comments are organized the comments in four categories. The first reflects positive elements or improvements from last year. Several improvements to the report itself follow recommendations from the NGAC that were successfully incorporated by FGDC in their guidance to the various agencies and that have improved the value of the summary report. The second category addresses areas needing improvement. The third category provides recommendations for future reports. The final category covers other feedback like formatting and rewording changes as well as general content questions to the authors for consideration.

The NGAC established a GDA Reporting Subcommittee to review the FGDC annual reports and compile the comments and recommendations included in this paper. In 2022, the NGAC also established a GDA Implementation Subcommittee to review the overall implementation of the GDA since 2018, assess progress toward the aspirational outcomes of the GDA, and develop recommendations for improvement. The report developed by the GDA Implementation Subcommittee, "Evaluation of Geospatial Data Act Implementation," is available at [<https://www.fgdc.gov/ngac/meetings/april-2023/ngac-paper-evaluation-of-gda-implementation-april-2023.pdf>]. The recommendations from the GDA implementation report are included in the Appendix of this paper.

## **2.0 Positive Elements / Improvements from Last Year**

Several of this year's NGAC reviewers also participated last year's review and were pleased to see that their recommendations resulted in an improved report, reflecting growing maturity in the reporting process by both the agencies and the FGDC.

### **1. Executive Summary**

- Lead Covered Agencies showed significant progress toward meeting expectations of 86%.

### **2.2 FGDC Reporting Approach**

- Improvement in consistent reporting is a result of implementing online tools that use standardized criteria.
- FGDC has improved the FGDC and agency reporting process based on experience from previous reporting processes.

### **2.4 Changes to GDA Annual Reporting**

- Reviewers noted that the report incorporated feedback from agencies in order to make improvements to online reporting tools, including additional space for agencies to highlight GDA-related accomplishments.
- Reviewers noted that the lead covered agency reporting template was changed to a survey-based environment.
- Reviewers noted that the reporting dashboards were expanded.
- FGDC incorporated changes to reporting processes and reports based on feedback from the NGAC. FGDC also noted they will continue to work with NGAC concerning our comments and recommendations.

### **3.1 Overview**

- Reviewers noted that the IG audits resulted in recommendations and corrective action plans.
- Reviewers noted that four agencies highlighted achievements.

### 3.2 Summary

- The table is easy to read, and you can quickly see where progress was made or a decrease in rating.

### 4.1 Overview

- Reviewers recognized cross agency efforts to analyze GDA requirements and develop work between FGDC agencies.

### Table 3

- Table is easy to read and clearly conveys status of progress.
- Having this dashboard is helpful. It is encouraging that there are no "F" ratings.

### General Comments

- Reviewers commended the easy to follow explanations, especially the addition of the dashboard summary for the NGDA datasets.

## 3.0 Areas Needing Improvement

The NGAC reviewers noted additional points that would further improve future versions of this summary report.

### 1. Executive Summary

- Reviewers noted that only 14% of lead covered agencies reported "Meets Expectations."

### 2. Changes to GDA Annual Reporting

- The reporting dashboards are very helpful. Recommendations for improvements include: 1) Have a pop-up load when a visitor comes to the page that explains how to interact with the dashboard. 2) Consider renaming the tabs to the subjects they refer to; rather than the US Code sections they pertain to ("2805(b)(3)(C)" is not very intuitive). "Standards", "Completeness", "Goals", etc. could be alternatives titles for the tabs rather than the section numbers.
- On the reporting dashboards, the purpose of the "Appendix A: Survey Picklists" tab is not clear at first read through. It appears to list all possible values that can be selected in the General Information tab "Meeting General Responsibilities" section. Consider adding text at the top of the Appendix A entry to explain it shows the possible options that can be chosen for meeting general responsibilities.
- On the reporting dashboards, the presentation could be improved. Currently, there are tabs for "LCA Reporting: Introduction", "LCA Reporting: Executive Summary", and "Appendix A: Survey Picklists" that never change, and then a series of tabs whose content does change depending on the selected theme.

- On the reporting dashboards, the "Key" entry shown in some of the tabs should be consolidated to the Appendix A tab to make the screens they are currently on cleaner.
- The dashboards have an overall feel which is dry and difficult to interpret. Consider having someone trained in data visualization offer feedback on how to present the information in a more engaging manner.
- The reporting dashboards don't appear to be Section 508 ADA compliant (WCAG 2.1 Level AA).
- On the reporting dashboards, the status reports are written in an impersonal manner and would benefit from making the text more plain language and approachable.

### **3. General Comments**

- It would be useful to compare the percentages of meet/pass/fail in the executive summary to the 2021 values (they are indicated as +/- in the table later in the report, but it would be good to have that info as a percentage comparison up front in the executive summary).

## **4.0 Recommendations for Future Reports**

NGAC's confidence in the FGDC's intent to improve the Summary Report based on changes implemented this year encouraged us to make recommendations for the future reports.

### **1. Executive Summary**

- The Executive Summary describes changes in the reporting process and the results of the performance and statistical accomplishments of meeting the requirements for reporting, but the importance is unclear. Suggest adding the benefit of this information for Congress to understand the value of geospatial information. Something like, "This report offers information on the nation's readiness to maintain existing programs dependent on geospatial information and the readiness of the nation to respond to new circumstances impacting the nation".

### **2. Introduction**

- The Introduction should have a brief statement about what the NSDI is and why it is important or relevant for Congress to know how agencies are doing in meeting their geospatial responsibilities.

### **2.2 FGDC Reporting Approach**

- Add that this improved approach has reduced the reporting burden on agencies.

### **2.4 Changes to GDA Annual Reporting**

- For 2023, recommend action to communicate the availability of the agency reports in a proactive way to show the nation how much effort is devoted to geospatial data readiness.

### **3.1 Overview**

- Suggest adding language to the Executive Summary to discuss key takeaways and overall results relating to changes in ratings for Covered Agency and Lead Covered Agency.
- In the second paragraph of "Common Reporting Process," in the second to last line. The comma should be a period and the "they" should be "They".

### **4.1 Overview**

- Suggest adding an example or two that address the changes made in 2022 referenced in paragraph 2.
- Suggest adding brief language to Section 4.1 discussing ratings changes from prior years, in addition to key takeaways in Executive Summary.

### **5.1 Key Observations**

- The first bullet should be one of the first statements in the Executive Summary.
- Suggest providing data/evidence to prove basis of Key Observations.

### **5.2 Challenges and Observations**

- Consider why there is only a reference to the FY 2020 GDA Report to Congress for the Challenges. The implication is that those challenges remain - which may be true but some explanation about how they are being tackled would be important. In addition, since that Report, clearly there have been some new Challenges: Why FGDC is not making satisfactory progress with the standards efforts, how the revision to OMB Circular A-16 relates to the GDA reporting process, etc.
- This refers actually to Table 4, which is not a designated "Report Section." It is believed that "bi-annual" is intended to be "biennial" for the IG Reports and the FGDC report from 2802c11c.
- Suggest adding examples that could address each of the challenges listed. For example, list one challenge in maintaining data and/or service required of the GDA.

### **General Comments**

- For the next reporting period, it would be helpful if FGDC provided some commentary on the covered agency self-evaluations that have ratings inconsistent with the Inspector General reports. To be specific, in several cases, the IG finds that meeting the 13 requirements is "making progress" and the covered agency acknowledges and concurs with the IG findings and yet its report to FGDC often claims that it "meets requirements." Timing may be one issue but the inconsistencies (from few to many) between covered agency response to IG and covered agency report to FGDC should have some explanation.

### **Table 1**

- Suggest moving the Key to the bottom of the table.

### **Table 2**

- If a self-evaluation with a "-" indicates a lower rating than in the past year, it would help to know why an "M" was replaced with a "P" or why an "F" was introduced. The covered agency summary reports did not include an explanation. It could be as simple as having a new evaluator, who reviewed more than the previous evaluator or had a different perspective within the organization. It could be as simple as having milestones that were met in the previous evaluation but were missed for FY22. It might be that the influence of the IG findings altered the rating. It could be as difficult as going from a funded effort to an underfunded effort. At any rate, having some insight into the cause of the decrease in the rating would be helpful.
- Three of the cells indicate failure to meet expectations. Two of the three were "failing" in 2021 while the other presumably moved from "making progress" to failing in 2022. Consider the question: Are these misses significant enough to warrant a paragraph of brief explanation in this section of the report?

## **5.0 Other Comments**

### **1. Executive Summary**

- For the ratings in the report, consider changing tenses from (Meets, Made, Fails) to (Meeting, Making, Failing).

### **2.3 Content of Summary Report**

- Question: Have there been any inquiries or comments from the public on the reports, the reporting process, or general reactions? If so, it would be beneficial to have a summary of any comments in a statement or two.

### **2.4 Changes to GDA Annual Reporting**

- Question: Are there federal directives or legislation that compelled changes in the GDA Annual Reporting to demonstrate compliance or benefits of the reporting process?

### **3.1 Overview**

- The description of the process in 3.1 duplicates language that is in the Section 2.

### **4.1 Overview**

- Duplicate wording from Section 2&3 found also in Section 4.1 describing transition to survey-based environment.



## 4.2 Summary of Results – Lead Covered Agency Annual Reports

- Observation: There is a discrepancy between data theme ratings and progress ratings for geospatial data standards. For instance, should it be possible for a data theme to have a higher rating of completeness for population of the data theme than its rating for data standard completeness?

### 5.1 Key Observations

- Third bullet notes the amount of agency resources needed to support of the volume and the frequency of reports.
- NGAC 2020 recommendation is included in the report concerning the streamlining of reporting process.
- Question: How does the user community provide feedback on the reports (5th bullet)?

### 5.2. Challenges and Observations

- Question: Has the first challenge (first bullet) been achieved as part of the improvements to the reporting process? If so, this should be in the report. If not, then what falls short and add that as an example from the comment above.
- Suggest adding language to the Challenges section to discuss the need for a 'standards baseline' in order to effectively measure progress of GDA Implementation. Consider adding a section focused on “FGDC Challenges to Advance the GDA”.

### Table 2

- While the dashboards present the reporting information in a simple manner, they do not clearly convey the status of the effort due to subjectivity in how ratings are defined and applied.

### Table 3

- Due to the large number of datasets for many of the themes, it is possible that the status of some key aspects, such as the standards requirement, is not clear.
- The ratings may not be the most effective means of conveying status of requirements for the themes. A different rating summary notation to the dashboards may be more effective for communicating status.

## 6.0 Conclusion

The NGAC acknowledges the complex and daunting coordinating effort that goes into producing both each year’s agency reports, the FGDC summary report, and the dashboards. Designing, refining, and using a template approach helped considerably. There is significant advantage to a consistent reporting mechanism, as it resulted in organized covered agency and lead covered agency (NGDA Theme) reports. The dashboards were well received by the NGAC National Geospatial Advisory Committee ([www.fgdc.gov/ngac](http://www.fgdc.gov/ngac))

membership and these recommendations include feedback on how they can be further refined.

The NGAC would like to thank the FGDC for the opportunity to review and comment on the summary report and it continues to applaud the thoroughness and completeness of the GDA reporting. The results of these individual reports will inform NGAC, Congress, and the broader geospatial community on the future of the National Spatial Data Infrastructure (NSDI). The NGAC plans to spend additional effort in the future to review the individual agency reports and NGDA reports in more depth and to identify additional recommendations for enhancement.

## **Acknowledgments**

This paper was developed by an NGAC subcommittee consisting of Mark Meade (Chair), Chad Baker (Vice Chair), Lynn Dupont, Bobbi Lenczowski, Cy Smith, and Gary Thompson.

## Appendix

In 2022 the NGAC established a GDA Implementation Subcommittee to review the overall implementation of the GDA since 2018, assess progress toward the aspirational outcomes of the GDA, and develop recommendations for improvement. The report developed by the subcommittee, “Evaluation of Geospatial Data Act Implementation,” is available at [<https://www.fgdc.gov/ngac/meetings/april-2023/ngac-paper-evaluation-of-gda-implementation-april-2023.pdf>]. The recommendations in the GDA implementation report, which complement the feedback in this paper, are as follows:

### **NGAC Paper, “Evaluation of Geospatial Data Act Implementation,” Recommendations:**

1. The FGDC should participate in ongoing efforts to design a national organizational framework that will facilitate greater collaboration and coordination on the NSDI. All stakeholders would be represented in the design process and in the national organizational framework. The design process should be informed by the results of previous FGDC NSDI governance studies and activities.
2. The FGDC should re-examine the process for identifying NGDAs. NGAC recommends a tiered approach that would identify NGDAs based on priority, scope, and value of the data.
3. FGDC member agencies should define and agree on comprehensive best practices and capabilities required to establish, enable, and sustain mature data governance and management programs for geospatial data.
4. FGDC member agencies should comply with all applicable international, national, sector, and voluntary standards and best practices for making geospatial data, information, and assets Findable, Accessible, Interoperable, and Reusable (FAIR), to ensure maximum use and value from agency geospatial programs, and work with the rest of the community to develop and advance relevant standards, specifications, community standards, profiles, good practices, and de facto standards.
5. NGAC and FGDC leadership should institute a comprehensive review and evaluation of the business case and existing governance and management practices of the GeoPlatform to ensure alignment with GDA requirements and benefit to the national geospatial community of users and the larger user community dependent on geospatial information.
6. The FGDC should work with Congress to modify the GDA reporting requirements to include criteria for collaboration, governance, benefits, and outcomes, shifting the focus from reporting about general process-oriented compliance to an outcome-oriented reporting process that identifies and encourages collaboration among geospatial data providers, data managers, disseminators, and users of geospatial data. This kind of reporting would require explaining how an agency has coordinated with non-federal entities, with the NGDA elevation theme annual reports used as an example.
7. The FGDC should require agencies to conduct full baseline reports every 2 years, with any change to particular datasets reported annually, working with Congress to modify the GDA for this purpose if necessary. Significant changes by an agency in collecting, managing, and disseminating geospatial information rarely occurs during a single reporting period. Establishing a baseline often reflects a similar state of progress with negligible changes from year to year. Having

agencies report on annual changes within a timeframe that the agency specifies for particular data sets and activities before requiring a subsequent baseline full report adds to efficiency in reporting.

8. The FGDC should work with Congress to change GDA requirements to have each respective Inspector General conduct program evaluations of an agency's performance every two years rather than full audits. Full audits should be only done every four years, not every two years as currently required. While external reviews of geospatial data responsibility of an agency are beneficial, the extent to which the review occurs will have an impact on limited agency resources. This change will meet the intent of external reviews while potentially reducing resource requirements for both the agency and its Inspector General's Office.