

TERMS OF REFERENCE FOR THE R&D PROJECT

1. Title : Study of Data Management Practices at Block and Panchayat Level Sectional Committee : Software and Systems Engineering, LITD 14

2. Background:

- a) In the field of IT, a lot of data is being collected by various private and public organizations. These organizations manage data based on certain guidelines provided to them from time to time. At various levels, there are no guidelines about the process to manage data. In order to review the adequacy and quality of data being collected by various organizations, Bureau of Indian Standards (BIS) has developed an Indian Standard which helps in identifying the adequacy of Organizational Data Governance & Management Practices.
- b) In order to take a holistic view on the subject and to formulate an indigenous Indian Standard, a detailed study of already developed standards was done. Based on the study, a Indigenous standard, IS 18838 Adequacy of Data Governance and Data Management practices” was published in 2024. This standard specifies the practices that are needed for an organization to effectively govern and manage the data in digital form under its control. It also specifies the method of assessment and outcomes to be achieved for these practices to be considered adequate. This standard is generic and is intended to be applicable to all organizations, regardless of type, size or nature. Considering the importance of the Digital Personal Data Protection Act in force, this standard will be of utmost importance in future.
- c) The grass root entity in India’s administrative ecosystem is Block and Panchayat. A lot of Personal Data is being collected at these levels using different software with minimal central correlation. The hardest challenge for adoption and implementation of any IT standard lies at this level. In order to ensure the adoption and implementation of the proposed standard, there is a need to carry out a study to understand the data collection and data management practices in Panchayats and Blocks. The Panchayat and Block Data needs to be collected and reviewed on the basis of following parameters:
 - a) Governance and Planning
 - b) Data Value Delivery Enablement
 - c) Data Protection and Risk Management
 - d) Data Foundation

(for Details, refer IS 18838 Adequacy of Data Governance and Management practices)

Based on the outcome of study, another part of this standard will be developed which will provide guidelines on Adequacy of Data Governance & Management Practices for Panchayats and Blocks considering best practices and technological advancements.

3. Objective:

To collect and study the relevant data and information from both block and Panchayat level with reference to Data management practices for management and governance of Data as listed in IS 18838. The study shall include review of data collected by Block and Panchayats under following categories:

Practice Group Data Management Practices

Governance and Planning	Data Governance Practice
	Data Planning Practice
Data Value Delivery	Decision Management Practice
	Data Architecture Practice
	Data Integration and Interoperability Practice
	Master and Reference Data Management Practice
	Document and Content Management Practice
	Data Storage & Operations Practice
Data Protection and Risk Management	Data Classification Practice
	Data Privacy Practice
	Data Confidentiality Practice
	Data Integrity Practice
	Data Availability Practice
	Data Regulatory Compliance Practice
Data Foundation	Metadata Management Practice
	Data Quality Practice

The reviewer shall identify whether Panchayats and Blocks collect Data as per above given practices. Once the essential data is collected, the reviewer is expected to provide the analysis and any other essential practices to be considered.

4. Proposed Scope of the Project :

The project shall cover on-site visits to blocks and panchayats (two districts in each of the north , south, east , west and central region) (as given in Sampling Plan) to evaluate their Data Management Practices as per IS 18838. The study includes collation of data and finding the trend in terms of outcomes and providing necessary recommendations for increasing the adoption of IS 18838 at Panchayat and Block level.

5. Methodology:

The research methodology involves the following:

- a) Framing of Survey Questionnaire: The reviewer shall frame the necessary survey questionnaire for panchayats and blocks to collect the necessary information. The questionnaire shall help in identifying data management practices for the practices given in IS 18838.
- b) Discussions: As part of the conversation with the panchayat and Block leaders, the reviewer shall grade the achievement of Data management practices as per IS 18838 on difficulty level (from easier to higher).
- c) Collating the data and finding the trend in terms of outcomes and providing necessary recommendations for increasing the adoption of IS 18838 at Panchayat and Block level.

Based on the above data, an analytical report needs to be created, which will help in identifying the other practices to be included as part of the standard.

6. Sampling Plan :

- 1) 20 Panchayats from 10 districts (two districts in each of the north, south, east, west and central region) shall be visited.
- 2) 10 Blocks from 10 districts (two districts in each of the north, south, east, west and central region) shall be visited.

7. Deliverables:

- 1) Datasheet along with response to Questionnaire sought from Panchayat Office.
- 2) Analytical Report with analysis of Data managed at Panchayat level vis-à-vis parameters given in IS 18838.

8. Requirement of the CV :

- 1) Understanding of Data Standard being developed.
- 2) Understanding of Local Language

9. Timeline & Progress Review :

- a) Month 1 – Preparation of Questionnaire and Data to be collected. The Questionnaire alongwith Sampling Plan shall be approved by BIS
- b) Month 2 - Preparation & Liaison with District Magistrate Office of each district
- c) Month 3 & 4 – Site Visits
- d) Month 5 – Report Compilation & Submission.

A monthly review meeting with the member secretary will be scheduled to track the progress of R&D project.

10. Support from BIS:

- 1) BIS will provide access to the latest available editions of Indian standards and/ or international standards relevant to the project, on request.
- 2) Facilitation/Introduction of the project leader/organization to relevant Industry and Industry association, State Govt offices

11. Nodal Point:

Ashish Tiwari, Director and Member Secretary of LITD 14 , BIS, may be contacted at ashishtiwari2205@bis.gov.in for any queries on the research project.
