

Methodology Documentation Format

Environmental Reports

1. Introduction

Briefly describe the objectives and scope of the environmental study. Outline the context and need for the methodologies used.

2. Study Area and Period

Define the geographical location, boundaries, and timeframe for which the data and assessments apply.

3. Data Collection Techniques

1. **Primary Data:** Describe field surveys, sample collection, monitoring equipment, and observation procedures.
2. **Secondary Data:** List sources of secondary information (e.g., published reports, databases, satellite images).

4. Sampling Strategy

Explain sampling locations, schedules, parameters measured, and rationale for sample site selection.

5. Analytical Methods

- Laboratory analysis protocols and standards followed
- Quality assurance and quality control procedures
- Calibration and validation steps for instruments

6. Data Analysis and Interpretation

Detail statistical methods, models, and software used for processing and analyzing data. Include description of data normalization, outlier handling, and error estimation processes.

7. Assumptions and Limitations

State key assumptions made during methodology formulation and acknowledge limitations or constraints affecting results.

8. References

List all documents, methods, guidelines, and standards referenced in the methodology.

Important Notes:

- Clear, transparent, and systematic documentation of methodology supports report reliability and reproducibility.
- Always update methodology to reflect advances in scientific practices and regulatory requirements.
- Properly cite all external data sources, standards, and analytical methods referenced.
- Address ethical and safety considerations in field and laboratory work.