

WATERSHED PROJECTS

Watershed projects address major sources of nonpoint source pollution affecting water quality in the watershed. Typically the primary project objective of a watershed project is to reduce the pollutant load entering either surface or ground water from nonpoint sources such that beneficial uses are restored or protected. Watershed projects may focus on developing and implementing TMDLs. A template showing the format for watershed final projects is provided on page 6. The following sections are included in a watershed project report:

EXECUTIVE SUMMARY

The executive summary provides a brief overview of the project with start and finish dates, funding information, and a summary of accomplishments. The summary should outline the goals that were set for the project and include a statement of whether some or all of these goals were met. Project sponsors also might provide information on significant accomplishments and describe how high-priority issues were addressed and what products were produced, new and effective best management practices (BMPs) used, and how the project helped implement state NPS management programs or TMDLs.

1.0 INTRODUCTION

When developing the introduction, project sponsors are encouraged to consider multiple audiences in addition to states and EPA. The introduction should contain background information on the project, any applicable TMDLs, including the project area, HUC number(s), a description of data available from historical reports, rationale for pursuing grant funds, and the NPS problems in the project area.

More specifically, the introduction to a final report should contain the following information:

- Identification of the waterbody or watershed with HUC code if available, including information on location, land use, land ownership, historical data, and the beneficial uses of the waterbody.
- Description of water quality problems, including identification of NPS pollutants of concern and water quality standards that are violated or threatened.
- Description of the TMDL(s) implemented.
- Description of how the project was consistent with the state NPS management program and other state programs including 305(b) reports, Unified Watershed Assessments (UWAs), Total Maximum Daily Load (TMDL) development, or implementation, 303(d) listings, and source water protection reports.

- Maps showing the location and size of the waterbody or watershed with project areas and/or BMP locations indicated.
- A general project description (keeping in mind the following section will explain the goals and objectives).

2.0 PROJECT GOALS, OBJECTIVES, AND ACTIVITIES

It is important to describe goals for the project. In general, the *goals* are broad statements about project needs that are achievable through *objectives*. Examples of goal statements are “to restore the recreational health of the Green River by decreasing nutrient loads by x% that contribute to overenrichment” and “to identify and implement appropriate grazing practices to reduce the amount of sediment and nutrients entering the Green River by x%.”

A description of the objectives and tasks should immediately follow each identified goal. Objectives should provide more detail about the accomplishments that were identified and met for each goal. Examples of objectives are “achieve a biomass concentration of 150 gm/m² as a summertime instantaneous reading and 100 gm/m² as a summertime 60-day average reading in the selected monitoring locations” or “sponsor a demonstration project of seasonal management of livestock on the Clear Fork of the Green River.” Each objective should have a description of the tasks that achieved the objective. Pictures, maps, graphs, or tables are useful to describe a task or objective. Task outputs should be measurable and quantifiable.

2.1 PLANNED AND ACTUAL MILESTONES, PRODUCTS, AND COMPLETION DATES

One method for presenting this information is a milestone table. Each table might list planned and actual milestones and product completion dates and quantities (# BMPs etc.) A brief explanation should be provided when anticipated milestones were not met. A timeline-type figure may also be used to depict schedules and milestones.

2.2 EVALUATION OF GOAL ACHIEVEMENT AND RELATIONSHIP TO THE STATE NPS MANAGEMENT PLAN

In this section, the project sponsor should provide an evaluation of how well the goals were achieved. The report should describe how the project helped implement the state’s NPS management program, and other state program priorities as outlined in 305(b) reports, 303(d) lists, and UWAs. Project sponsors should describe how the project contributed to controlling NPS pollution as part of an integrated, watershed-wide approach.

2.3 SUPPLEMENTAL INFORMATION

Any additional information the sponsor may want to add relating to achieving project goals should be included in this section. Project sponsors are encouraged to include BMP lists and descriptions of projects or programs implemented not already discussed in previous sections of the final project report. Pictures, maps, graphs, or tables may be used to better explain these projects and programs. Graphical elements are strongly encouraged because they help “tell the story” and increase the multi-purpose usefulness of the report.

3.0 BEST MANAGEMENT PRACTICES DEVELOPED AND/OR REVISED

Describe BMPs (plus quantities) implemented, such as the number of acres converted to no-till, or the number of tons per year of sediment reduced. More detail or descriptions can be provided in appendices. Pictures, maps, graphs, or tables can be used to further describe the location, configuration, and performance of each practice.

4.0 MONITORING RESULTS

This section should include a brief discussion of the monitoring strategy, sampling, and analysis techniques used in the watershed project. Descriptions of the models used to analyze data should also be included, if applicable.

A crucial part of a watershed final report is an analysis and summary of the data collected using tables, graphs, or charts that may show trends in water quality. The section should also describe any surrogate measures (i.e. environmental indicators) that were used to measure existing conditions and progress in controlling NPS pollution. Examples of effective graphs, tables, and other data presentation methods are shown in Section 3 of this notebook—*Final Project Examples*.

The monitoring results should be separated into the following categories:

- TMDL implementation effectiveness (4.1).
- BMP effectiveness evaluations (4.2).
- Surface water improvements, including separate sections for chemical, biological, and physical/habitat (4.3).
- Groundwater improvements, including separate sections on metals, chemistry, nutrients, and sediment (4.4), if applicable.
- Other monitoring (4.5).
- Quality assurance reporting (4.6). If there is an EPA-approved Quality Assurance Project Plan (QAPP) or Sampling and Analysis Plan (SAP) for the project, describe briefly how the monitoring was consistent with the QAPP or SAP.

- Results of BMP operation and maintenance (O&M) reviews (4.7). This section should describe how project sponsors assured proper O&M of the BMPs. The discussion should include the frequency of on-site O&M evaluations, identification of the organization(s) who did the evaluations, and the frequency of state reviews of O&M procedures. If problems with O&M procedures occurred, follow-up procedures should be described. Also, if landowners abandoned any section 319-funded BMPs, a description of actions taken by the project sponsor should be included.

5.0 COORDINATION EFFORTS

This section describes coordination efforts with different agencies, entities, and the public. It includes the following sections:

5.1 COORDINATION FROM OTHER STATE AGENCIES

This section identifies any cooperating state agencies and describes their role in implementing the project.

5.2 OTHER STATE ENVIRONMENTAL PROGRAM COORDINATION

This section identifies any cooperating state environmental programs and describes their role in implementing the project.

5.3 FEDERAL COORDINATION

This section identifies any cooperating federal agencies, such as the U.S. Geological Survey, Natural Resources Conservation Service, and Fish and Wildlife Service and describes their role in project implementation.

5.4 USDA PROGRAMS

This section identifies cooperation with U.S. Department of Agriculture programs such as the Environmental Quality Incentives Program (EQIP), Hydrologic Unit Funding, Buffer Initiative, or Conservation Reserve Program. The section should include a description of each program's role in project implementation.

5.5 ACCOMPLISHMENTS OF AGENCY COORDINATION MEETINGS

This section should provide a summary of agency coordination meetings, participants lists and meeting outcome may be included. Details or transcripts from the meetings may be attached as an appendix in the final report.

5.6 RESOURCES/COORDINATION FROM FEDERAL LAND MANAGEMENT AGENCIES

This section identifies coordination with federal land management agencies, if applicable. Included would be each agency's role in project implementation, and information on resources provided by the agencies.

5.7 OTHER SOURCES OF FUNDS

If the project received funding through other sources such as non-federal match from state and local funds, volunteer labor, and other federal funds, this section should provide a description of those sources. A budget table may be a useful to present this information.

6.0 SUMMARY OF PUBLIC PARTICIPATION

This section describes public participation and other local support for project implementation.

7.0 ASPECTS OF THE PROJECT THAT DID NOT WORK WELL

This section should provide an explanation of elements of the project that did not work out as planned. For instance, this section may include a discussion of why milestones were difficult to meet. Was the failure due to lack of good data, inadequate funding, lack of sufficient technical resources, or "circumstances of nature?" Was there a need for a more thorough assessment and targeting, or more advanced technology? This section can help others to avoid similar problems in the future.

8.0 FUTURE ACTIVITY RECOMMENDATIONS

This section should be used to describe any programs, activities, and/or assessments that are or should be planned for the area of concern based on the results of the project. Plans for future coordination with other agencies should be indicated. If the project is continuing anticipated funding sources and continuation of the section 319 funding should also be discussed. This section provides an excellent opportunity to informally propose new projects that will continue to address NPS problems in the watershed or other area of concern.

SECTION 319 NONPOINT SOURCE POLLUTION CONTROL PROGRAM
WATERSHED PROJECT FINAL REPORT

(Project Title Here)

by

(Author and Project Sponsor Here)

(Date Here)

This project was conducted in cooperation with the State of _____ and the United States Environmental Protection Agency, Region 8.

Grant #

EXECUTIVE SUMMARY

PROJECT TITLE _____

PROJECT START DATE _____

PROJECT COMPLETION DATE _____

FUNDING: TOTAL BUDGET _____
 TOTAL EPA GRANT _____
 TOTAL EXPENDITURES
 OF EPA FUNDS _____
 TOTAL SECTION 319
 MATCH ACCRUED _____
 BUDGET REVISIONS _____
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