

STATE OF SOUTH DAKOTA CLASS SPECIFICATION

Class Title: Resource Biologist

Class Code: 090350

Pay Grade: GH

A. Purpose:

Accumulates and summarizes fisheries and wildlife data and conducts established research projects to meet management objectives.

B. Distinguishing Feature:

Resource Biologists support established research projects and programs by gathering and summarizing data, monitoring project activities, performing fish culture activities and fish stocking, and maintaining aquaculture equipment and facilities.

Wildlife Biologists function primarily as research biologists and plan, implement, and coordinate research activities.

C. Functions:

(These are examples only; any one position may not include all of the listed examples nor do the listed examples include all functions which may be found in positions of this class.)

1. Collects scientific data to meet management goals.
 - a. Uses various types of sampling gear and procedures related to the harvest, marketing, and protection of fish and wildlife resources.
 - b. Coordinates work efforts with other department personnel.
 - c. Prepares routine operational reports concerning activities, time, equipment, and expenses.
2. Performs statistical analyses such as calculating means, medians, modes, and standard deviations to ensure research findings are validated and documented.
 - a. Compiles and summarizes data.
 - b. Collects specimens.
 - c. Prepares reports on species inventories, surveys, and research studies.
 - d. Makes recommendations relative to findings.
3. Monitors and maintains ongoing research projects and operations to carry out and document activities.
 - a. Submits progress reports, data summaries, papers, and other documentation for assigned projects.
 - b. Recommends continuation or expansion of projects by providing justification to project leaders.
 - c. Assists in writing project study proposals by listing problems, objectives, current status, and project justification.
 - d. Provides summarized data to be implemented into the management of fish or wildlife resources.
4. Conducts surveys and investigations dealing with the harvest, recreational use, health, and habitat of fish and wildlife species to ensure department goals are met.

5. Prepares for and makes public presentations to inform the public of departmental activities.
 - a. Reads literature.
 - b. Writes outlines and draws charts and graphs.
 - c. Arranges for films, slides, and video equipment.
 - d. Answers questions pertaining to department policies and regulations, hunting seasons, and other programs.
 - e. Attends department booths and displays at shows and fairs.
6. Fish culture and stocking.
 - a. Performs routine fish culture operations, such as spawning, egg incubation, disease treatments, fish feeding, tank cleaning, egg and fish inventories, and fish health sampling.
 - b. Stocks fish and maintains stocking equipment.
 - c. Maintains hatchery production and stocking records.
 - d. Trains interns and volunteers.
 - e. Collects water samples for discharge permit compliance and completes DMRs.
 - f. Performs routine water chemistry.
7. Performs facility maintenance and repair.
 - a. Maintains and repairs aquaculture and stocking equipment, such as pumps, plumbing, and laboratory equipment.
 - b. Performs grounds maintenance.
8. Maintains, operates, and constructs equipment, tools, and other gear used in the performance of duties to ensure an adequate inventory of operable equipment and supplies.
 - a. Tracks inventory.
 - b. Orders supplies.
9. Performs administrative tasks.
 - a. Completes vehicle reports.
 - c. Prepares requisitions and vouchers.
 - d. Coordinates repair and maintenance of fleet vehicles.
10. Performs other work as assigned.

D. Reporting Relationships:

Typically reports to a Hatchery Manager, Wildlife Program Administrator, or Regional Supervisor. Does not formally supervise, but may provide work direction.

E. Challenges and Problems:

Challenged to gather complete and accurate fish and wildlife data. This is significant because improper data can have an adverse effect on management objectives across the state.

Further challenged to recognize signs of fish stress during culture activities and take appropriate action to alleviate such stress as quickly as possible and being knowledgeable of the diagnoses and treatment of fish diseases. This is vital to minimize fish losses.

Problems include keeping current with new methods and techniques; managing and prioritizing a variety of time-sensitive tasks; having sufficient time to collect and analyze data; correcting misconceptions about projects, studies, and policies; adjusting work to coincide with work schedules of other staff; and being flexible and resourceful when maintenance or repair issues arise.

F. Decision-making Authority:

Decisions include methods to use in completing lake surveys, compiling and summarizing survey data, which agencies and individuals to contact regarding specific job assignments, appropriate treatment procedures for fish diseases, organization of sampling techniques, and format for summarizing and reporting data.

Decisions referred include changes in project direction; study strategies; documentation procedures; changes to sampling techniques; project deadlines; projects to be conducted; spawning, fish culture, and stocking protocols; and approval of expenditures.

G. Contact with Others:

Daily contact with other department staff to provide information on programs and studies; with landowners and sportsmen to exchange information; with other state and federal agencies to coordinate sampling schedules; and with hatchery managers and wildlife biologists to discuss fish culture, stocking, maintenance, and record-keeping activities.

H. Working Conditions:

Works outdoors collecting data over rough terrain and on lakes, reservoirs, and streams during all types of weather. Work is performed around power tools and electrical and heavy equipment, and from boats and airplanes. Incumbents will move and lift heavy loads of fish in slippery conditions and may be exposed to bacteria and viruses when collecting sick and diseased fish or wildlife, chemicals, and noise.

I. Knowledge, Skills, and Abilities:

Knowledge of:

- principles used in the management of wildlife and fish populations;
- physical, chemical, and biological characteristics of lakes, ponds, and streams;
- research, laboratory, and statistical methods as they relate to wildlife and fisheries management;
- fish culture techniques, including recirculating aquaculture systems;
- water chemistry, as it relates to aquaculture;
- facility, grounds, and equipment maintenance;
- basic principles and terminology of data processing;
- technical report writing.

Ability to:

- calculate chemical treatments for fish health and water processes;
- recognize signs of fish stress and take corrective action;
- perform routine maintenance of aquaculture and stocking equipment;
- keep records and reports;
- read and comprehend technical material;
- organize and present information effectively and in a logical sequence;
- establish and maintain effective working relationships with coworkers, other agencies, and the public.