

SCOTT RIVER WATERSHED COUNCIL

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May 9, 2006

Attn: Song Her, Clerk to the Board State Water Resources Control Board

1001 I Street

Sacramento, CA 95814



Dear Board Members;

Thank you for the opportunity for additional public comment on the proposed amendment to the Water Quality Control Plan (Basin Plan). In regards to flow options for the Scott River watershed, we have discussed this issue for several years and have moved quickly in a very short period of time in support of the recommendations identified in the implementation plan developed by the North Coast Regional Water Quality Control Board staff.

The Scott River Watershed Council (SRWC) recently re-affirmed its goal for developing strategies to achieve adequate flows necessary to sustain viable fisheries and agriculture within the watershed. In 1995, the SRWC first adopted the goal, to "Work for adequate flows in the Scott River system to protect the migration, spawning, and rearing needs of the salmon and steelhead stocks while also protecting other beneficial uses." A specific objective of that goal was to "Increase fall flows for fall chinook salmon", since that species was of the most concern during the early 1990s, and multiple drought years contributed to inadequate flows during the fall migration period. As a result of this goal, the development of a structure for local management of the Scott Valley watershed has been a recurring topic of discussion for the last several years. One of the greatest obstacles to developing management alternatives that will allow communities in the watershed to attain this goal is the near absence of information about factors controlling water table fluctuations, and the impacts of temporal variations and magnitudes of change in water table levels to river flows and quality.

Efforts to resolve this obstacle began in 2005 when the SRWC organized a community-based groundwater monitoring effort to observe static water level fluctuations in the floor of the Scott Valley, with work beginning in April of 2006. The purpose of this effort is to develop long-term data on recharge/discharge dynamics of the aquifer, which may, in time, provide a basis for more specific investigations of water management strategies in the valley.



Attached is a document which describes the program and its benefits to flows. The duration of this program is indefinite. It will take 5-10 years to establish what the typical ranges in water table level fluctuations are by month and geographic location, and ongoing monitoring will be necessary to detect significant changes in these levels.

It is our recommendation that the State Water Resources Control Board agree to the proposed amendment to the Basin Plan. We feel the response of the community to work towards improving flow in the Scott River has proven to be positive and will continue effectively, and in compliance with the implementation actions, under volunteer efforts having the support of the Siskiyou County Board of Supervisors and the North Coast Water Board staff.

Respectfully yours,

Rhonda Muse

Planning and Council Coordinator

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Scott River Watershed Council

A First Step In Groundwater Studies

An Overview of the Community Approach to Understanding the Hydrology of the Scott River Watershed

May 2006

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This program is supported by the following:

Scott River Watershed Council (SRWC)

Groundwater Sub-committee Members:

Mike Bryan, SRWC Executive Committee
Sari Sommarstrom, SRWC Executive Committee
Liz Bowen, SRWC Executive Committee
Rick Gilbert, SRWC Executive Committee
Ernie Wilkinson, SRWC Executive Committee
Mary Roehrich, SRWC Executive Committee
Ken Maurer, SRWC Groundwater Sub-Committee
Marcia Armstrong, Siskiyou County – District 5 Supervisor
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Klamath Basin Watershed Team, USDA-NRCS
William Waggoner, Hydrologist –
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Steve Orloff, Farm Advisor, County Director – UC Cooperative Extension

Scott Valley Groundwater Oversight Committee:

Vernon Smith, Scott Valley Water User
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Rick Gilbert, Scott Valley Water User
Dan Hayden, Scott Valley Water User
Patrick Griffin, Siskiyou County Ag Commissioner
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Siskiyou Resource Conservation District

Siskiyou County Board of Supervisors

U.C. Cooperative Extension – Groundwater Program, U.C. Davis: Dr. Thomas Harter

Introduction

The supply of water in the Scott River watershed is critical for many beneficial uses including fish habitat and agriculture. Today the current focus for this water resource is directed towards water quality and quantity needed to support threatened and endangered salmon populations within the Klamath River Basin. Due to the limited information about the Scott's hydrological system, more accurate knowledge of how and when water moves through the Scott Valley will assist water users in making decisions about water management necessary for the survival of both salmon and the rural economy.

A Voluntary Program for Obtaining Groundwater Data

With the assistance of the Scott River Watershed Council (SRWC) and the USDA Natural Resources Conservation Service – Klamath Basin Watershed Team, water users in the Scott Valley have established a Community-based Groundwater Measuring Program to collect baseline data on water table fluctuations and address groundwater issues in the valley.

Process and Background:

The SRWC assigned a Groundwater Sub-Committee to develop an approach to groundwater studies. The sub-committee determined hypothesis testing would provide the necessary means for better understanding the hydrology of the system. After listing several hypotheses it was determined that before answers could be found we needed a broader scale of groundwater table measurements to obtain baseline data.

The SRWC held 2 community workshops and 1 water user meeting to present the need for collecting baseline data and shared the program concept. The community looked into the program by Glenn County, which began its own groundwater management program with a volunteer effort to collect baseline data and determine the capacity and water exchange dynamics of the aquifers available for large-scale use. This effort progressed into a county-wide monitoring program that targeted specific areas of concern and resulted in the development of management planning activities. Since the economy of Glenn County is dominated by agriculture, to a degree similar to Siskiyou County, we felt their model would be a good fit for Scott Valley.

Once water users had a better understanding of the importance and need for such a program, the creation of the Community-based Groundwater Measuring Program unfolded and became widely supported throughout the community, Siskiyou Resource Conservation District and Siskiyou County Board of Supervisors.

Ongoing Program Management:

The program is directed by an oversight committee made up of local water users, Siskiyou County representatives and technical specialists from the USDA-NRCS. The primary task of this committee is to give direction to the collection and analysis of water table data. The committee will report to the Siskiyou Resource Conservation District

and Siskiyou County Board of Supervisors as appropriate. It may take a decade or more to adequately characterize the range in water table level fluctuations by month and geographic location, and ongoing monitoring will be necessary to detect departures from these baseline levels. Initiating a systematic monitoring program is a critical first step towards the sustainable management of this economically and environmentally important resource. The SRWC and Siskiyou County recognize that it will be less expensive to discover and prevent problems before they occur than to deal with them after they reveal themselves.

The groundwater program currently monitors approximately 35 wells that have been volunteered for this purpose by local residents. Static water levels are being measured on a monthly basis throughout the year (4 are measured semi-annually). Wells have been selected on the basis of their geographical distribution and depth. Both shallow (domestic) and deep (irrigation) wells were included in as many areas as possible, and wells were selected so as to represent the entire central area of the Scott Valley, from Callahan north to Fort Jones. The only other long-term monitoring of groundwater has been conducted by the Department of Water Resources (DWR), which has records that date to the 1950's. However, DWR has historically operated only four or five wells in the valley, making water level measurements twice per year (spring and fall). The number, geographical distribution and frequency of measurement of the DWR wells is inadequate for generating the data necessary for understanding aquifer recharge and discharge characteristics. It is the intention of the SRWC to continue this monitoring indefinitely, so long as funds can be found to continue its operation.

Objective:

The objective of the Scott Valley Groundwater Program is to collect baseline data on static water level fluctuations and understand changes in the recharge/discharge balance in the Scott Valley aquifer, particularly how this balance changes by location in the valley, by season of year, and as a result of climatic variations.

Scope of Work:

The geographic scope of the Program is limited to the floor of the Scott Valley. In this first phase of the project, the emphasis will be on the central and south portion of the valley (between Fort Jones and Callahan). As resources allow, the project may be extended into Quartz Valley and valley floor areas extending north-northeast and north-northwest of Fort Jones. If successful, this program, or future extensions of it, will continue indefinitely from April 2006. The scope of the investigation is limited to estimations of rates and extents of aquifer discharge/recharge, to the extent that this can be estimated from water table fluctuations in existing wells. Aquifer balance will be evaluated spatially (by geographic location) and temporally (seasonally within and across years).

Participant Roles:

University of California Cooperative Extension, Groundwater Program -- UC Davis Faculty:

 Hydrology Faculty have agreed to provide a repository for data, provide guidance and technical assistance for the collection and analysis of data, and as funding becomes available they may perform more advanced analyses to develop/refine and test specific hypotheses.

County of Siskiyou

 Siskiyou County representatives will participate in the Scott Valley Community Groundwater Measuring Program by providing Siskiyou County Natural Resource Specialist and Agriculture Commissioner as representatives to the Oversight Committee.

Natural Resource Conservation Service-Klamath Basin Watershed Team (NRCS Team)

 Members of the NRCS Team have provided technical assistance throughout the development of the program. Their commitment to continue sharing their expertise as part of the Oversight Committee will be invaluable for conducting the program.

Scott River Watershed Council (SRWC)

The SRWC will continue to support a groundwater sub-committee that is to act on behalf of local community interests, to develop and suggest hypotheses to test, and make recommendations to the Oversight Committee and Siskiyou RCD on matters related to community and water user perspectives on groundwater issues when they arise. As the voice of the community, the SRWC will work to further refine the program and identify high priority actions that relate to the program.

Siskiyou Resource Conservation District (RCD)

 The RCD provides fiscal administration of funding contracts used to contribute to the program. Their role is to ensure the program is carried out by overseeing data collection efforts as long as funding persists.

Benefits of the Program

Improve effectiveness of future water projects

This Program will provide the baseline data necessary to determine the best approach for designing and implementing water projects that meet the goal to "work for adequate flows in the Scott River system to protect the migration, spawning, and rearing needs of the salmon and steelhead stocks while also protecting other beneficial uses".

Improve Water Management Efforts

With a better understanding of seasonal, annual and spatial groundwater fluctuations, water users will be better able to select among management alternatives that allow for environmental needs while providing for the needs of agricultural operations.

Facilitate Study and Development of Management Alternatives

The key to the protection of Scott River fisheries and the economic survival of environmentally-friendly enterprises is the development of effective surface and groundwater management strategies that address the needs of both fish and farms. Measuring static water levels alone will not lead to effective management strategies. These will require much more specific investigations and testing. A long-term record of basin-wide water level fluctuations is essential for discovering and testing management strategies that have the best potential for achieving watershed objectives.

Summary

The Scott Valley Community Groundwater Measuring Program has been successfully organized in large measure because the confidentiality of private landowners has been a primary consideration of the Siskiyou Resource Conservation District and Siskiyou County Board of Supervisors. We are confident that the continued community-based efforts to improve hydrologic management in the watershed will enable communities to expand their knowledge and facilitate the investigation and development of improved management strategies. The formation of a community oversight committee for the program, as well as numerous community workshops and discussions and collaboration with federal and academic specialists, has engaged water users in the process and has been extremely effective for allowing the community to have a sense of program ownership.

As a first step to groundwater studies, this program will leave many specific questions about valley hydrology unanswered, but it will lay the foundation that may make it possible to begin answering other questions in the future.