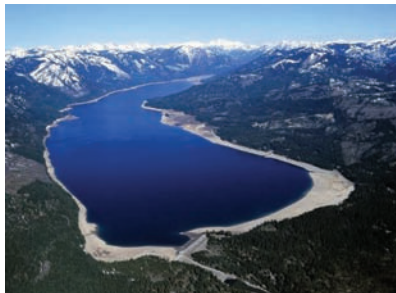




FINAL ENVIRONMENTAL IMPACT STATEMENT

Yakima River Basin Integrated Water Resource Management Alternative

Conducted as part of the Yakima River Basin
Water Storage Feasibility Study



JUNE 2009

Washington State Department of Ecology
Ecology Publication #09-12-009

Final Environmental Impact Statement Yakima River Basin Integrated Water Resource Management Alternative

Conducted as part of the Yakima River Basin Water Storage
Feasibility Study

**This report is available on the Department of Ecology Web site at:
http://www.ecy.wa.gov/programs/wr/cwp/cr_yak_storage.html**

For a printed copy of this report, contact:

Derek Sandison
Washington State Department of Ecology
15 West Yakima Avenue, Suite 200
Yakima, WA 98902
dsan461@ecy.wa.gov
509-454-7673

Publication Number: 09-12-009

*If you need this publication in an alternate format, please call Office of Columbia River at 509-575-2490.
Persons with hearing loss can call 711 for Washington Relay Service. Persons with a speech disability
can call 877-833-6341.*

This document was printed on recycled paper.

**FINAL ENVIRONMENTAL IMPACT
STATEMENT FOR THE YAKIMA RIVER BASIN INTEGRATED WATER
RESOURCE MANAGEMENT ALTERNATIVE
(Conducted as part of the Yakima River Basin Water Storage Feasibility
Study)**

FACT SHEET

Brief Description of Proposal:

The purpose of the Yakima River Basin Integrated Water Resource Management Alternative is to provide water for irrigated agriculture and future municipal needs and improve habitat for anadromous and resident and anadromous fish. The alternative was developed as part of the Yakima River Basin Water Storage Feasibility Study being undertaken by the Washington Department of Ecology (Ecology) and the U.S. Bureau of Reclamation (Reclamation). Ecology and Reclamation released a Draft Planning Report/Environmental Impact Statement (EIS) in January 2008 in which they jointly evaluated a no action alternative and three storage alternatives—Black Rock reservoir, Wymer reservoir, and Wymer reservoir with a Yakima River pump exchange. Ecology evaluated three additional alternatives—enhanced water conservation, market-based reallocation of water resources, and ground water storage. The three State Alternatives were developed in response to comments received during EIS scoping indicating that Ecology should consider a broader range of alternatives, including non-surface storage options, to meet State Environmental Policy Act (SEPA) requirements for identifying and evaluating reasonable alternatives.

A number of the comments received on the Draft Planning Report/EIS asserted that Reclamation and Ecology failed to evaluate an adequate range of reasonable alternatives and that the alternatives that had been evaluated were analyzed outside of the context of fish habitat and passage needs for the Yakima River basin. Ecology consulted with Reclamation concerning whether additional alternatives should be evaluated. Ecology concluded that the scope of the EIS should be expanded; however, Reclamation determined that its congressional authorization precluded it from expanding its analysis under the National Environmental Policy Act (NEPA). Therefore, Ecology decided to separate from the joint NEPA/SEPA process for the study and to pursue completion of a stand-alone SEPA EIS that built on the January 2008 Draft Planning Report/EIS. Ecology prepared a Supplemental Draft EIS, released December 10, 2008, to evaluate additional water supply alternatives together with related fish habitat improvements. The Integrated Water Resource Management Alternative included in the Supplemental Draft EIS included four general elements to improve water resources in the Yakima River basin—fish passage improvements, modifying existing operations and facilities, new storage, and fish habitat enhancement on mainstem rivers and tributaries. The Integrated Water Resource Management Alternative presented in this Final EIS includes the State Alternatives from the January 2008 Draft Planning Report/EIS. These elements are in addition to the alternatives previously considered in the January 2008 document.

Timeline for the Yakima River Basin Water Storage Feasibility Study:

January 29, 2008—Joint NEPA/SEPA Draft Planning Report/EIS on the Yakima River Basin Water Storage Feasibility Study issued jointly by Ecology and Reclamation.

December 10, 2008—SEPA Supplemental Draft EIS issued by Ecology.

December 19, 2008—NEPA Final Planning Report/EIS on the Yakima River Basin Water Storage Feasibility Study issued by Reclamation.

June 2009—SEPA Final EIS issued by Ecology. This document incorporates substantive information from the preceding documents and responds to comments on the January 2008 Draft Planning Report and the December 2008 Supplemental Draft EIS.

June 30, 2009—Reclamation and Ecology initiate a comprehensive water resource management implementation planning process.

Proposed or Tentative Date for Implementation:

Ecology and Reclamation are convening a work group to help develop an implementation plan for the Integrated Water Resource Management Alternative. The work group will use this Final EIS as a framework for a comprehensive implementation plan. Ecology anticipates that consensus will be reached on a plan within one year. At this time no specific projects have been identified for implementation in this Supplemental Draft EIS. Implementation of specific future projects will require additional environmental review and permitting.

Proponent:

Washington State Department of Ecology in cooperation with the U.S. Bureau of Reclamation

State Environmental Policy Act (SEPA) Lead Agency Responsible Official:

Derek I. Sandison, Director
Office of Columbia River
Washington State Department of Ecology
15 West Yakima Avenue, Suite 200
Yakima, WA 98902
Email: dsan461@ecy.wa.gov

Permits, Licenses, and Approvals Required for Proposal:

Because the specific nature of projects that will be proposed under the Integrated Water Resource Management Alternative is not yet known, it is not possible to present a complete list of permits, licenses, and approvals that may be required for future projects. It is possible, however, to identify a number of the most common types of permits, licenses, and approvals associated with water resources and habitat that would generally be required for the projects presented in this document. These permits, licenses, and approvals are listed below by the jurisdictional agency:

Federal Permits, Licenses, and Approvals

Section 404 permit – U.S. Army Corps of Engineers
Section 10 permit – U.S. Army Corps of Engineers
Endangered Species Act consultation – NOAA Fisheries
Endangered Species Act consultation – U.S. Fish and Wildlife Service
Special Uses Permit – U.S. Forest Service

State Permits, Licenses, and Approvals

Water use permit/certificate of water right – Department of Ecology
Reservoir permit/aquifer storage and recovery – Department of Ecology
Dam safety permit – Department of Ecology
National Pollutant Discharge Elimination System permit(s) – Department of Ecology
Section 401 water quality certification – Department of Ecology
Shoreline conditional use permit, or variance – Department of Ecology
Water system plan approval – Department of Health
Hydraulic project approval – Department of Fish and Wildlife
Forest practices approval – Department of Natural Resources

Local Permits, Licenses, and Approvals

Critical areas permit or approval – Appropriate local jurisdictional agency
Floodplain development permit – Appropriate local jurisdictional agency
Shoreline substantial development permit, conditional use permit, or variance –
Appropriate local jurisdictional agency
Building permit – Appropriate local jurisdictional agency
Clearing and grading permit – Appropriate local jurisdictional agency

Authors and Contributors to the Supplemental Environmental Impact Statement

The following **Department of Ecology** individuals were reviewers or contributors to the preparation of the Supplemental Draft EIS:

Derek Sandison – All chapters
Bob Barwin – Water-based reallocation of water resources sections

The following **contract** individuals were contributors to the Supplemental Draft EIS:

ESA Adolfson – Principal Author, Climate Change, Vegetation and Wildlife,
Recreational Resources, Land and Shoreline Use, Air Quality, Noise, Visual
Resources, Transportation, Public Health and Safety
Anchor Environmental – Surface Water, Hydropower, Fish and Aquatic Resources,
Public Utilities
Cascadia Law Group – Water Rights
EcoNorthwest – Climate Change and Socioeconomics
Golder and Associates – Earth, Ground Water, Water Quality
Paragon Research Associates – Cultural Resources

Timing of Additional Environmental Review:

This SEPA analysis is programmatic in nature and has been prepared to generally address probable significant adverse impacts associated with projects proposed to improve water resources in the Yakima River basin. Any individual projects that are carried forward will require additional environmental review when they are proposed; these projects may require SEPA compliance, NEPA compliance, or both, depending on the implementing agency, source of funding, and/or types of permits required. Projects will be evaluated as they are developed and ready for environmental review, this could occur within the next few years for some items, or as long as several years in the future for other projects.

Date of Issue of the Supplemental Draft Environmental Impact Statement

December 10, 2008

Public Comments on the Draft Supplemental EIS

In accordance with WAC 197-11-455, Ecology conducted a public comment period from December 10, 2008 to January 26, 2009. Ecology received written comments from a total of 71 persons or agencies, including 27 identical emails.

Document Availability

The Final EIS is available for review.

It is available on line and can be viewed at:

http://www.ecy.wa.gov/programs/wr/cwp/cr_yak_storage.html.

The documents can be obtained in hard copy or CD by written request to the SEPA Responsible Official listed above, or by calling 509-454-7673. Persons with disabilities may request this information be prepared and supplied in alternative formats.

The document was distributed through the state library system. Copies are also available for review at any Department of Ecology Yakima office located at 15 West Yakima Avenue, Suite 200 Monday through Friday from 8 a.m. to 5 p.m.

ACRONYMS AND ABBREVIATIONS

AID	Ahtanum Irrigation District
ATVs	all-terrain vehicles
BCAA	Benton County Air Authority
BMPs	best management practices
BPA	Bonneville Power Administration
C	Celsius
CBA	cost/benefit analysis
CBFWP	Columbia Basin Fish and Wildlife Program
CBP	Columbia Basin Project
CBSP	Columbia Basin System Planning
CELP	Center for Environmental Law and Policy
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
CFR	Code of Federal Regulations
cfs	cubic feet per second
CHU	Critical Habitat Unit
CRMP	Cultural Resources Management Plan
CTED	Department of Community, Trade, and Economic Development
cy	cubic yards
DAHP	Department of Archaeology and Historic Preservation
DEIS	Draft Environmental Impact Statement
District	Yakima County Flood Control Zone District
DO	dissolved oxygen
DPS	distinct population segment
EA	Environmental Assessment
Ecology	Washington State Department of Ecology
EES	Economic and Engineering Services, Inc.
EIS	Environmental Impact Statement
EPA	U.S. Environmental Protection Agency

ESA	Endangered Species Act
ET	evapotranspiration
F	Fahrenheit
FCRPS	Federal Columbia River Power System
FERC	Federal Energy Regulatory Commission
FHA	Federal Highway Administration
gpm	gallons per minute
HB	House Bill
GIS	Geographic Information System
HPA	hydraulic project approval
hwy	highway
IPCC	Intergovernmental Panel on Climate Change
KAF	thousand acre-feet
KCCD	Kittitas County Conservation District
KID	Kennewick Irrigation District
KRD	Kittitas Reclamation District
LWD	large woody debris
mg/L	milligrams per liter
Mgd	million gallons per day
mi	miles
msl	mean sea level
MW	Megawatts
MW-hrs	Megawatt-hours
NEPA	National Environmental Policy Act
NMFS	National Marine Fisheries Service
NOAA	National Oceanic and Atmospheric Administration
NPCC	Northwest Power and Conservation Council
NPDES	National Pollutant Discharge Elimination System
NRCS	Natural Resources Conservation Service
NRHP	National Register of Historic Places

NTU	nephelometric turbidity units
NWI	National Wetland Inventory
OHWM	ordinary high water mark
PCBs	Polychlorinated biphenyl
PHS	Priority Habitats and Species
PIA	Practically Irrigable Acreage
PIT	Passive Integrated Transponder
Plum Creek	Plum Creek Timber Company
PM10	particulate matter 10 microns or less
ppm	parts per million
RASP	Regional Assessment of Supplementation Project
RCW	Revised Code of Washington
Reclamation	U.S. Bureau of Reclamation
RM	River Mile
SASSI	Salmon and Steelhead Stock Inventory
SEPA	State Environmental Policy Act
SMA	Shoreline Management Act
SOAC	System Operations Advisory Committee
SRFB	Salmon Recovery Funding Board
Storage Study	Yakima River Basin Water Storage Feasibility Study
SWE	Snow Water Equivalent
TCPs	traditional cultural properties
TDG	total dissolved gas
TDS	total dissolved solids
TMDL	total maximum daily load
TMT	Technical Management Team
Tri-County	Tri-County Water Resource Agency
TWSA	Total Water Supply Available
USFWS	U.S. Fish and Wildlife Service
USFS	U.S. Forest Service

USGS	U.S. Geological Survey
VQO	Visual Quality Objective
WAC	Washington Administrative Code
WDFW	Washington Department of Fish and Wildlife
WEC	Washington Environmental Council
WIP	Wapato Irrigation Project
WRATS	Ecology Water Rights Application Tracking System
WRIA	Water Resource Inventory Area
WSDOT	Washington State Department of Transportation
YBFWRB	Yakima Basin Fish and Wildlife Recovery Board
YKFP	Yakima/Klickitat Fisheries Project
YRBWEP	Yakima River Basin Water Enhancement Project
YSPB	Yakima Subbasin Planning Board
YSS	Yakima Subbasin Summary
YTAHP	Yakima Tributary Access and Habitat Program