DISCLAIMER

Electronic versions of the exhibits in these minutes may not be complete.

This information is supplied as an informational service only and should not be relied upon as an official record.

Original exhibits are on file at the Legislative Counsel Bureau Research Library in Carson City.

Contact the Library at (775) 684-6827 or library@lcb.state.nv.us.

PROPERTY RIGHTS ON WESTERN RANCHES: FEDERAL RANGELAND POLICY AND A MODEL FOR VALUATION

BY

ANGUS PERRY McINTOSH II, B.S., M.S.

A dissertation submitted to the Graduate School
in partial fulfillment of the requirements
for the degree

Doctor of Philosophy

Major Subject: Range Science

Minor Subject: Agricultural Economics

New Mexico State University

Las Cruces, New Mexico

December 2002

© 2002 by Angus Perry McIntosh, II

ORIGINAL EXHIBIT ON FILE AT THE LEGISLATIVE COUNSEL BUREAU LIBRARY

ASSEMBLY NATURAL RES., AGRICULTURE & MINING DATE: 03/05/03 ROOM: 3/6/ EXHIBIT 61-6
SUBMITTED BY: Dr. Angus Mc Intosh

C1-6

ABSTRACT

PROPERTY RIGHTS ON WESTERN RANCHES: FEDERAL RANGELAND POLICY AND A MODEL FOR VALUATION

BY

ANGUS PERRY McINTOSH II, B.S., M.S.

Doctor of Philosophy

New Mexico State University

Las Cruces, New Mexico, 2002

Dr. Jerry L. Holechek, Chair

Although numerous authors have speculated about permit-value, leasehold interests, and production-input costs above grazing-fee costs, federal policy as to what constitutes property value on federal land ranches has never been fully examined. Federal laws and policy were analyzed to determine what basis exists for property rights claims on Western ranches. Laws from the 1800s and 1900s granted split-estate interests in water rights, rights of way, improvements and grazing values. Later statutes provided for the issuance of permits authorizing development of additional improvements, water rights, and rights of way. FLPMA repealed earlier statutes, protected prior rights, and required compensation for ranchers' improvements, water rights, forage, and rights of way when grazing permits are cancelled.

Conventional appraisal methods fail to consider highest-and-best use and replacement cost when evaluating split-estate ranches. A five variable valuation

model incorporating: 1) water rights, 2) rights of way, 3) range improvements, 4) grazing value, and 5) patented lands, was developed. The model was applied using the case study approach to a controversial ranch in central Nevada. The model, emphasizing highest-and-best use and the replacement cost depreciated approach, was compared to the conventional valuation method that emphasizes sales comparison and income capitalization. The model indicated a fair market value from 4.5 to 150 times greater than that derived from the conventional valuation approach. The difference in values appears primarily due to the failure of conventional appraisal methodology to consider alternative highest-and-best use value of water rights (in this case for quasi-municipal use). Conventional appraisal methods also fail to consider the value of ranchers' range improvements and rights of way associated with the water rights, range improvements and patented lands. It also appears that government regulatory actions may be exerting undue stimulus to create artificially low market values.

TABLE OF CONTENTS

	Page
LIST OF TABLES	xii
LIST OF FIGURES	xiii
Chapter	
1. INTRODUCTION	1
Problem Statement	1
Objectives and Hypothesis	3
2. LITERATURE REVIEW	6
Property, the Bundle of Rights, and Split-Estate Concepts	6
Property Value on Western Ranges Recognized but Misunderstood	11
Property Rights on Western Range Defined	11
Permit-Value Analysis Literature	15
Lease-Hold Value Analysis Literature	18
Non-Fee Costs & Local Value Analysis Literature	22
Federal Grazing Rights Policy Analysis: Origins and Progressive Development of Property Rights on Western Rangelands	23
Spanish and Mexican Roots of Western Range and Water Law	23
Congress Confirms and Grants Split-Estate Property Rights	30
Stock Raising Homesteads and Range Allotments: The Sum of the Parts	52
Grazing Fee and Permit Explained: Ranchers are Owners Not Rentersix	71

3.	THE STUDY AREA	92
	Location and Description: Pine Creek Ranch	92
	History of the Area	92
	Topography and Climate	93
	Vegetation	94
4.	METHODS	96
	Ranch Appraisal Methods	96
	Proposed Model: Highest-and-Best Use and Replacement Cost Depreciated, Emphasized	104
	Model Development	106
	Water Rights	106
	Rights of Way/Ingress Egress Rights	106
	Forage Crops and Grazing Value	108
	Range Improvements	109
	Patented Base and Commensurate Lands	109
5.	RESULTS AND DISCUSSION	111
	Model Application	111
	Water Rights	111
	Rights of Way/Ingress Egress Rights	115
	Forage Crops and Grazing Value	120
	Range Improvements	124
	Patented Base and Commensurate Lands	128
	Economic Analysis: Model Approach vs. Conventional Approach	129

6.	CONCLUSIONS	135
7.	IMPLICATIONS	141
App	endices	145
A.	GLOSSARY OF SPLIT-ESTATE RANCH TERMS	146
В.	MAPS: SHOWING THE EARLIEST GRAZING CLASSIFICATION, WATER RIGHTS, RIGHTS OF WAY, IMPROVEMENTS, AND PATENTED LANDS OF THE PINE CREEK RANCH	150
C.	CONGRESSIONAL RECORD EXPLAINING THE PURPOSE OF SECTION 10 OF THE STOCK RAISING HOMESTEAD ACT	156
LITE	RATURE CITED	158