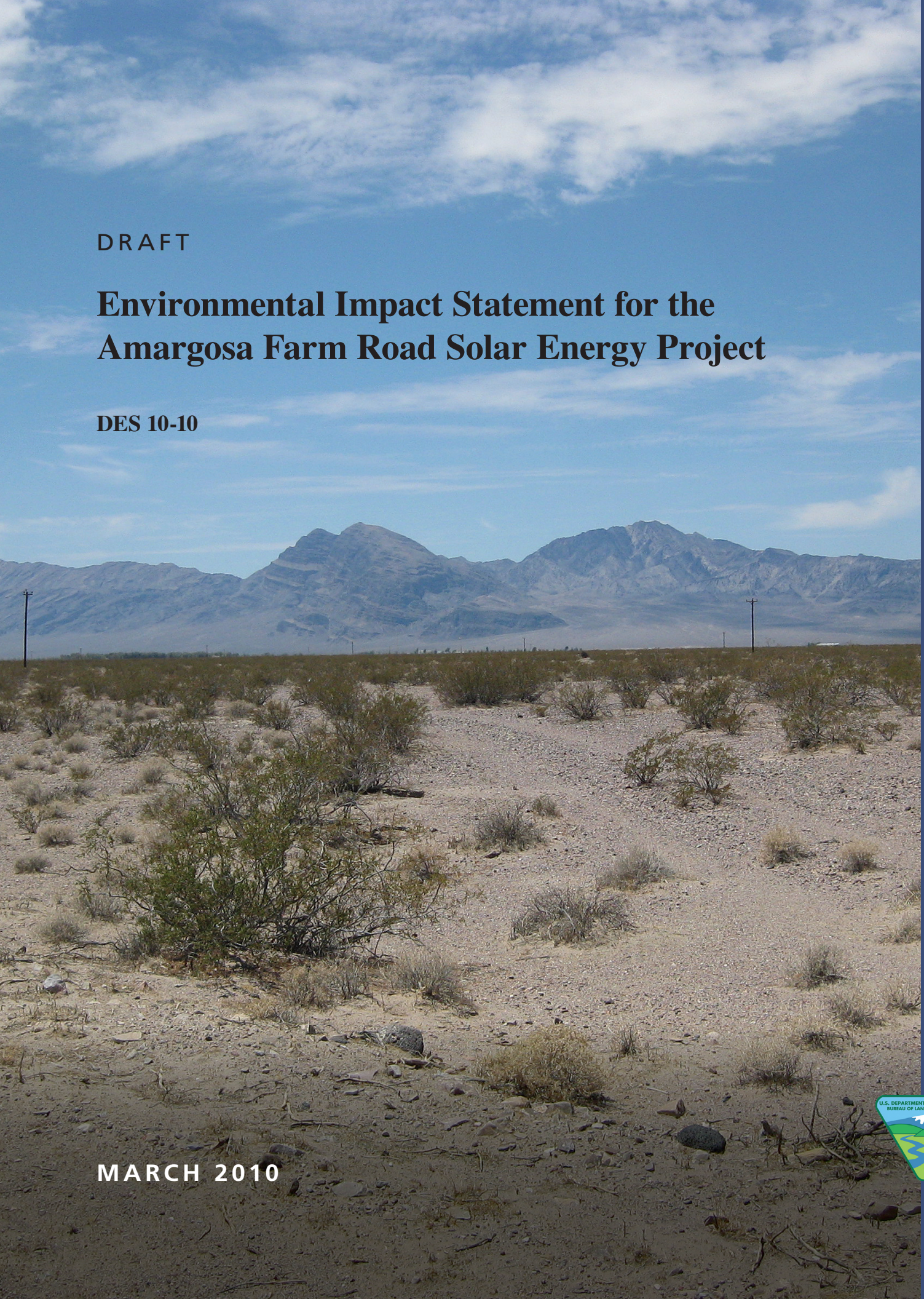

DRAFT

Environmental Impact Statement for the Amargosa Farm Road Solar Energy Project

DES 10-10

MARCH 2010

BLM

Pahrump Field Office

DRAFT ENVIRONMENTAL IMPACT STATEMENT

FOR THE

AMARGOSA FARM ROAD

SOLAR ENERGY PROJECT

(NVN-084359)

Prepared for and under the Direction of:

Bureau of Land Management

Pahrump Field Office

Prepared by:

EPG, Inc.

On Behalf of:

Solar Millennium, LLC

March 19, 2010

BLM/NV/LV/ES-10/16+1793

BLM Mission Statement

It is the mission of the Bureau of Land Management to sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations.

BLM/NV/LV/ES-10/16+1793

DOI No. DES 10-10

United States Department of the Interior

BUREAU OF LAND MANAGEMENT
Southern Nevada District Office
4701 N. Torrey Pines Drive
Las Vegas, NV 89130
http://www.blm.gov/nv/st/en/fo/lvfo.1.html

In Reply Refer To:
N-084359
2800 (NVS3100)

Dear Reader:

Enclosed for your review and comment is the Draft Environmental Impact Statement (EIS) for the Amargosa Farm Road Solar Energy Project. The Bureau of Land Management (BLM) Pahrump Field Office has prepared this Draft EIS in response to a right-of-way application submitted by Solar Millennium, LLC to construct and operate two concentrated solar thermal parabolic trough power plant facilities on public lands in Amargosa Valley, approximately 80 miles northwest of Las Vegas, in Nye County, Nevada. Cooperating Agencies for this Draft EIS include the Department of Defense, Department of Energy, National Park Service, U.S. Army Corps of Engineers, Nevada Department of Wildlife, and Nye County. The purpose of this review is to assist BLM in its decision-making process with respect to the requested right-of-way.

This Draft EIS considers the expected environmental effects associated with granting the right-of-way on public land and subsequent construction and operation of the Amargosa Farm Road Solar Energy Project. The BLM is interested in your review and comment on the accuracy and completeness of this document. The Amargosa Farm Road Solar Energy Project Draft EIS will be available for review for 45 calendar days from the date the U.S. Environmental Protection Agency publishes the Notice of Availability in the Federal Register.

The BLM intends to hold four meetings in Nevada during the 45-day comment period, one each in Beatty, Amargosa Valley, Pahrump, and Las Vegas. The BLM will announce all public meeting times and locations at least 15 days in advance through public notices, media news releases, or mailings. In addition, information will be posted online at the BLM website: http://www.blm.gov/nv/st/en.html.

Comments should be sent to:

BLM, Pahrump Field Office
Attn: Greg Helseth
Renewable Energy Project Manager
4701 N. Torrey Pines Drive
Las Vegas, NV 89130
FAX: 702.515.5023
Email: solar_millennium@blm.gov

A Final EIS will be prepared that will consider comments received during the 45-day comment period. For more information, please contact Greg Helseth at (702) 515–5173.

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Environmental Impact Statement
for the Amargosa Farm Road Solar Energy Project

(X) Draft **( ) Final**

Lead Agency:	United States Department of the Interior Bureau of Land Management
Cooperating Agencies:	Department of Defense Department of Energy National Park Service United States Army Corps of Engineers Nevada Department of Wildlife Nye County
Counties Directly Affected:	Nye County, Nevada

Environmental Impact Statement Contact:

Greg Helseth
Renewable Energy Project Manager
4701 N. Torrey Pines Drive
Las Vegas, NV 89130

Date Draft EIS filed with U.S. Environmental Protection Agency: 3/12/10

Abstract

The Bureau of Land Management (BLM) Pahrump Field Office has prepared this Draft Environmental Impact Statement (EIS) in response to a right-of-way application submitted by Solar Millennium, LLC (Applicant or Proponent) to construct and operate the Amargosa Farm Road Solar Energy Project (Project). The proposed project would be located on BLM-administered lands, approximately 80 miles northwest of Las Vegas, in the Amargosa Valley in Nye County, Nevada. Some portions of the proposed project would be located on private lands including a 40-acre parcel at the south end of the project area and possibly the water pipeline(s) that would supply water to the project site.

The project area is located approximately five miles south of U.S. Highway 95 and five miles west of State Highway 373. The majority of the proposed project area would be located north of Amargosa Farm Road and east of Valley View Road. The Proponent's original right-of-way request of 7,670 acres was refined to include only 6,320 acres based on biological and cultural

resources surveys conducted during the spring 2009. Because the studies did not find anything of significance in the primary location, the secondary location was released. Project facilities would be located on approximately 4,350 acres and would include the solar fields, power blocks (one power block located in the center of each solar field), an office and maintenance building, parking area, lay-down area, stormwater detention basin, and switchyard.

The Proponent is evaluating two water supply options including: 1) purchase or lease of existing water rights and moving the point of diversion to the power block area; which would require construction of a new well(s); or 2) purchase or lease of existing water rights and construct a water pipeline from existing well(s) to the project site. Both options are currently being evaluated.

This Draft EIS considers the expected environmental effects associated with granting a right-of-way on public land and subsequent construction and operation of the proposed Project. The BLM will use the EIS, when rendering a decision about granting the requested right-of-way. The BLM's decision will be to grant, grant with modifications, or deny the request for right-of-way through public lands administered by the BLM. This Draft EIS satisfies the requirements of the National Environmental Policy Act, which mandates that federal agencies analyze the environmental consequences of major federal actions.

Official responsible for the environmental impact statement:

Patrick Putnam

3-3-2010

Date

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ACRONYMS AND ABBREVIATIONS

AADT	Annual Average Daily Traffic
AC	alternating current
ACEC	Area of Critical Environmental Concern
afy	acre-feet per year
AHC	Average hourly controlled emissions
AHU	Average hourly uncontrolled emissions
APE	Area of Potential Effects
APVE	Area of potential visual effect
ARRA	American Recovery and Reinvestment Act
BAPC	Bureau of Air Pollution Control
BLM	Bureau of Land Management
BMP	Best Management Practices
CEQ	Council on Environmental Quality
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
CO	carbon monoxide
CWA	Clean Water Act
dB	Decibel
dBA	A-weighted decibel
DC	direct current
DCS	Distributed Control System
DOD	Department of Defense
DOE	Department of Energy
DOI	Department of the Interior
DVRFS	Death Valley Regional Flow System
EDR	electrodialysis reversal
EIS	environmental impact statement
EPA	Environmental Protection Agency
EPAct	Energy Policy Act
et seq.	"and the following"
FLPMA	Federal Land Policy and Management Act
FSC	Field Supervisor Controller
GIS	geographic information system
HCEs	heat collection elements

HTF	heat transfer fluid
IMV	Industrial Mineral Ventures
IPCC	Intergovernmental Panel on Climate Change
kV	kilovolt
LPG	Liquefied petroleum gas
MDC	Maximum daily controlled emissions
MDU	Maximum daily uncontrolled emissions
mg/L	milligrams per liter
MHC	Maximum hourly controlled emissions
MHU	Maximum hourly uncontrolled emissions
MMBtu/hr	British thermal units per hour
MTBA	Migratory Bird Treaty Act
MW	megawatt
NAAQS	National Ambient Air Quality Standards
NAC	Nevada Administrative Code
NBMG	Nevada Bureau of Mines and Geology
NDEP	Nevada Division of Environmental Protection
NDOT	Nevada Department of Transportation
NDOW	Nevada Department of Wildlife
NDWR	Nevada Division of Water Resources
NEIC	National Earthquake Information Center
NEPA	National Environmental Policy Act
NNHP	Nevada Natural Heritage Program
NO_2	nitrogen dioxide
NO2	nitric oxide
NOI	Notice of Intent
NOx	nitrogen oxide
NPDES	National Pollutant Discharge Elimination System
NPS	National Park Service
NRCS	Natural Resources Conservation Service
NRS	Nevada Revised Statutes
NV	Nevada State Route
NWR	National Wildlife Refuge
O_3	ozone
OSHA	Occupational Safety and Health Administration
OHV	off-highway vehicle

pb	lead
PFYC	Potential Fossil Yield Classification
PL	Public Law
PM_{10}	particulate matter less than 10 microns
$PM_{2.5}$	particulate matter less than 2.5 microns
POD	Plan of Development
PPE	personal protective equipment
PRPA	Paleontological Resources Preservation Act of 2009
PSD	Prevention of Significant Deterioration
PSPP	Palen Solar Power Plant
PV	photovoltaic
Qai	intermediate alluvial deposits
Qay	Young alluvial deposits
QTm	marl deposits
R	Range
RCRA	Resource Conservation and Recovery Act
RMP	Resource Management Plan
RO	reverse osmosis
ROD	Record of Decision
ROI	Region of Influence
ROS	Recreation Opportunity Spectrum
SCAs	solar collector assemblies
SEGS	solar energy generating system
SLRU	Sensitivity Level Rating Units
SO_2	sulfur dioxide
SPCC	Spill Prevention, Control, and Countermeasure
SQRU	Scenic Quality Rating Units
SSG	solar steam generator
STG	steam turbine generator
SVP	Society of Vertebrate Paleontology
SWPPP	Stormwater Pollution Prevention Plan
T	Township
TDS	total dissolved solids
TMDL	Total Maximum Daily Loads
TWA	Time weighted average
USACE	U.S. Army Corps of Engineers

USC	United States Code
USDA	U.S. Department of Agriculture
USDOT	U.S. Department of Transportation
USFS	U.S. Forest Service
USFWS	U.S. Fish and Wildlife Service
USGS	U.S. Geological Survey
VOC	volatile organic compounds
VRIC	Visual Resource Inventory Classes
VRM	Visual Resource Management
WEG	wind erodibility group
WEI	wind erodibility index