The Nevada Agency for Nuclear Projects appreciates the opportunity to again inform the Surface Transportation Board (STB) of Nevada’s opposition to the Application filed March 17, 2008 by the U.S. Department of Energy (DOE) seeking authority to construct and operate a 300 plus mile rail line in the state of Nevada, commonly referred to as the Caliente Rail Line. We request that our full written comments be accepted for the record of this proceeding.

Nevada’s Position

As previously stated, Nevada believes that DOE’s Application fails to provide sufficient detailed information regarding key elements of the proposed transaction to allow stakeholders and the Board to fairly and critically evaluate the actual railroad construction and operation plans for a certificate of public convenience and necessity (CPCN) under 49 USC 10901 or undertake a “hard look” environmental impact analysis under the National Environmental Protection Act, (NEPA), 42 USC 4332 and related acts, and thus, urges that DOE’s application should be rejected as presently filed, or otherwise require that it be appropriately supplemented. To proceed without supplementation would result in a premature decision based on speculation.

In response to comments critical of the fact that DOE “did not include the appropriate level of detail regarding the design, construction and operation of the railroad, and consequently impacts analysis were inadequate”, DOE’s record of decision
(ROD), filed October 6, 2008, expressly acknowledges and excuses the inadequacy, stating the Rail Alignment EIS is based on a “conceptual design” made necessary by NEPA analysis required “early in the process of developing a proposed Federal project.” ROD, p. 31. DOE stated “the conceptual design will advance through preliminary to final decision during which time many of the details requested will become available” and that there will be “additional refinements before construction.” Id.

After several decades of planning it is difficult to conceive of a competent agency failing to consider all the ramifications and requirements of its mission to transport spent nuclear fuel and high level nuclear waste from origins nationwide to a geologic repository at Yucca Mountain, NV, a unique and first-of-its-kind in the world facility. The lack of sufficient detail in DOE’s Application and supporting NEPA documentation evidences that failure in planning.

**Public Convenience and Necessity (PCN)**

DOE, as a non-carrier applicant, has not demonstrated that it is a proper party for a CPCN. As an agency, DOE is not organized for, or capable of, undertaking the implementation, maintenance, supervision or monitoring of the construction and operation of the proposed railroad in Nevada, the sole purpose of which is to facilitate transport of DOE-owned spent nuclear fuel (SNF) and high-level radioactive waste (HLW) from 76 sites in 34 states to the proposed geologic repository at Yucca Mountain, Nevada. This is especially true since DOE has provided no agreements with contractors or otherwise detailed the actual, necessary transportation arrangements that it proposes to implement if granted a CPCN.

Virtually the entire nation will be affected by the DOE proposal to construct and operate a new rail line in Nevada to transport 70,000 metric tons of spent nuclear fuel and high level radioactive waste, the present legal capacity of the Yucca Mountain repository that DOE now actively proposes to increase more than two-fold. The Global Nuclear Energy Partnership (GNEP) initiative contemplates expanded nuclear energy programs with increased reliance on Yucca Mountain as repository for radioactive waste from domestic and foreign sources.

DOE’s proposal now calls for some 9500 rail shipments and 2700 truck shipments for a sustained period. DOE’s proposed additional shipments dramatically increase the number of shipments of spent nuclear fuel and high level radioactive waste. Recent Congressional testimonies by the National Research Council of the National Academies reported 540 shipments in 1964-2004 and the Association of American Railroads reported 317 shipments in 2003-2007 with only 14 in 2007. Legitimate concerns over public safety and security risks cannot be diminished by measuring the level of DOE’s proposed transportation of SNF and HLW against the totality of general freight traffic as DOE attempts to do.

If the DOE proposal proceeds, one or more shipping casks of SNF or HLW would be moving on a train somewhere in America virtually every day for five decades or
The serious radioactive characteristics of these shipments pose a unique combination of impacts and risks to employees and the public from routine operations, transportation accidents, and acts of terrorism and sabotage. Every rail cask would contain one hundred times the dangerous radioactive cesium and strontium released by the Hiroshima bomb. Spent fuel from civilian nuclear power plants, which would comprise 90 percent of the shipments, is so radioactive that even after 10 years of cooling, unshielded exposure could deliver a lethal dose of radiation in 1-2 minutes. The radiation from spent fuel shipping casks in routine transit can endanger workers and the public. A severe accident involving release of radioactive materials could cost $10 billion to cleanup, and cleanup after a successful terrorist attack could cost many tens of billions of dollars.

To make matters worse, DOE opposes mandatory shipment of older spent fuel first, which could reduce radiological hazards by 65-85 percent. To support a canistered repository system for transportation, aging and disposal (TAD), DOE proposes to employ a TAD canister for which there is presently no actual design, no testing plan, and no approval for use. Significantly, DOE opposes mandatory full-scale testing of shipping casks. DOE also opposes mandatory use of dedicated trains for rail shipments. DOE fails to provide details of required intermodal handling, storage, and rail interchanges in transit. The Board must weigh the DOE claims of public convenience and necessity against this lack of information and its risks and effects.

Since September 11, 2001, agencies charged with the safety and security of transportation have been engaged in ongoing series of regulatory efforts to ensure the safe and secure transport of hazardous materials (HM) such as DOE proposes to ship. The Department of Homeland Security (DHS) and the Department of Transportation have entered into cooperative memoranda of understanding (MOUs) for developing requirements for shippers and carriers of HM. Congress adopted the 9/11 Commission Act, which the President signed August 3, 2007, to further ensure the safety and security of HM transportation. DHS’s Transportation Security Administration (TSA) and DOT’s Federal Railroad Administration (FRA) and Pipeline and Hazardous Materials Safety Administration (PHMSA) have cooperatively issued notices of proposed rulemakings (NPRMs) beginning in December 2006 expressly designed to develop HM regulations (HMRs) specifically focused on transportation of DOE material at issue in this case, and continue to do so with Final Rules this month.

Despite Nevada’s urging, DOE has continually refused to engage these agencies as “cooperating agencies” in the development of safety and security plans for inclusion in

longer. The representative rail routes identified by DOE in its environmental impact statement (EIS) would traverse 44 states and the District of Columbia, and 33 Indian nations. Nevada’s analysis shows that selection of the Caliente rail option would affect about 22,000 miles of track in 836 counties with a total estimated 2005 Census population of about 138 million. The shipments would travel through 193 central cities with a total estimated population of about 39 million. See attached maps of counties and cities potentially affected by DOE rail shipment routes to Yucca Mountain via Caliente.
the Application and the supporting NEPA documentation. This Board has likewise refused Nevada’s request to include these agencies, notwithstanding the fact that agency NPRMs, the 9/11 Act and Interim Final Rules (IFRs) were all issued prior to DOE’s Application and final NEPA documentation supporting the Application, and with ample reason to anticipate further additional rules impacting DOE’s nationwide transportation of HM to Yucca Mountain.

The failure to include agencies having expertise and responsibility for safety and security of the rail transportation proposed in this case represents a critical flaw in these proceedings, but one that can be easily remedied without causing undue delay or burden to DOE or the stakeholders.

Environmental Impact Analyses (NEPA)

Should the Board proceed to consider the DOE Application, it cannot adopt the DOE’s NEPA impact analyses and documentation, the Rail Corridor SEIS and especially the Rail Alignment EIS. The Board has an independent responsibility for determining compliance of the DOE Application with the requirements of the National Environmental Policy Act (NEPA). To that end, the Board has not as yet provided stakeholders the opportunity to comment on DOE’s final NEPA documentation under 49 CFR Part 1105. DOE’s environmental analyses fail to meet the requirements of NEPA.

DOE has repeatedly failed to justify selection of Caliente as its preferred corridor. In 2004, the DOE Record of Decision admitted that the “impacts identified in the Final EIS do not provide a clear basis for discriminating among alternative rail corridors…” 69 Fed. Reg. at 18,563. DOE did not consider “the differences among the corridor alternatives to be sufficient to make any of them clearly environmentally preferable.” In 2008, the DOE EIS admitted that “the Mina Implementing Alternative would be environmentally preferable when compared with the Caliente Implementing Alternative…” and would have “fewer private-land conflicts, less surface disturbance, smaller wetlands impacts, and smaller air quality impacts than the Caliente Implementing Alternative.” RA EIS at 2-116. Yet DOE goes on to acknowledge that it could not use the Mina corridor in any event “due to the objection of the Walker River Paiute Tribe….” The basis for DOE’s selection of the Caliente corridor is an illegal comparison with an unacceptable and non-viable alternative and, as such, violates the requirements of NEPA.

The DOE evaluation of preferred alignments within the Caliente corridor also fails to comply with NEPA. In the Rail Alignment EIS, DOE failed to provide the detailed rail alignment design maps and plan views, including vertical profiles and top of rail elevations at specific locations, necessary for the assessment of impacts required under NEPA. In the Rail Alignment EIS, DOE applied an inappropriate, generic methodology to estimate adverse impacts on active grazing allotments and illegally deferred the appropriate assessment of impacts on ranching to future actions. In the Rail Alignment EIS, DOE failed to apply avoidance as the appropriate method of addressing land use conflicts with rail construction and associated quarries that cannot be mitigated.
DOE’s systematic failure to comply with NEPA is well illustrated by its treatment of the “City” sculpture installation along the proposed Caliente alignment in Garden Valley. DOE first failed to discover the existence of “City,” the world’s largest outdoor sculpture installation and a cultural resource of international significance, until after publication of the Yucca Mountain Draft EIS in 1999, although DOE had been studying the corridor since 1990. After discovering “City” in the path of its rail alignment, DOE attempted to diminish the impacts of rail construction by applying an inappropriate visual analysis. DOE ignored noise impacts at key observation points by asserting that NEPA only “requires noise analysis where people sleep.” (CRD3-222) DOE further attempted to discount its significance by arguing City was a “work in progress” and could not be evaluated as a cultural resource because it was less than 50 years old. Finally, DOE failed to select a feasible but more expensive alternative route that would have avoided Garden Valley.

DOE’s failure to comply with NEPA is further illustrated by its inconsistent application of a key measure of radiological impacts to Las Vegas and Clark County. In its Rail Alignment EIS, DOE defines the regions of influence (ROIs) for radiological impacts of incident-free transportation (0.8 kilometers or 0.5 mile on either side of the transportation route centerline) and for the radiological impacts of transportation accidents and sabotage (80 kilometers or 50 miles on either side of the transportation route centerline). According to the DOE shipment estimates, about 8 percent of the rail casks shipped to Caliente would travel through downtown Las Vegas. Analyses prepared for the State of Nevada show that under certain circumstances 40-80 percent of the rail shipments to Caliente could traverse Las Vegas. DOE failed to provide population and dose information for the ROIs along rail routes in the Las Vegas metropolitan area.

Analyses prepared for the State of Nevada, based on 2005 Bureau of Census estimates, concluded that about 95,000 residents currently live within one-half mile of the Union Pacific rail route in Las Vegas. There are also 34 hotels with 49,000 hotel rooms located within one-half mile of the rail route in Las Vegas. The State of Nevada estimates that more than 1.8 million residents live within the 50 mile region of influence for accidents and sabotage in southern Nevada and adjacent areas of Arizona, California and Utah.

Critical to the failure to demonstrate public convenience and necessity, and the failure to comply with NEPA, Nevada believes the Board should reject the DOE Application because it fails to adequately address the security risks of terrorism and sabotage against DOE rail shipments to Yucca Mountain and the communities and populations along the affected rail routes nationwide. The urgency of addressing risks of terrorism and sabotage is underscored by the U.S. Departments of Homeland Security and Transportation recent adoption of Final Rules regarding Rail Transportation Security. 73 Fed. Reg. at 72,129-72,194.

Concerning DOE’s railroad operations in Nevada, there is serious question whether and how DOE can comply with the Final Rules as they relate to risk analysis for safety and security, route options in Nevada, storage and delays in transit, inspections and
interchange agreements, rail security coordination/RCS, and chain of custody requirements, none of which elements are detailed in DOE's Application filings with the Board.

On a national basis, DOE as a shipper will have to arrange shipments that reflect consideration of those same Final Rules with any railroad carriers, none of whom are identified with detailed arrangements in DOE's filings. So far only CSX and NS have raised the issue of the nature of rail service nationwide, i.e., dedicated train service (DTS) or general freight service (GFS). DTS responds favorably to several FR issues, GFS does not and raises serious concerns on critical questions for routing options, handling, storage and delays in transit, inspections, interchange agreements, rail security coordination/RSCs, and chain of custody/control requirements.

In considering DOE’s Application, the Board must address the following issues regarding the new Final Rules for Rail Transportation Security:

1. Department of Homeland Security’s Transportation Security Administration (TSA) and Department of Transportation’s Federal Railroad Administration (FRA) and Pipeline and Hazardous Materials Safety Administration (PMHSA), which have not been accorded "cooperating agency" status, acting within their primary responsibilities for transportation safety and security, have determined that transportation of materials that DOE proposes presents the greatest rail transportation safety and security risks and the most attractive targets in a target rich environment of an exposed rail infrastructure in densely populated areas as weapons of opportunity or mass destruction, and the Final Rules represent their continuing, collective efforts to ensure safe and secure transport of DOE's materials;

2. DOE's Application does not provide the details necessary for evaluation of a 10901 application with regard to the Final Rules, critical of which are the absence of coordinated security plans of carriers DOE intends to utilize and the failure to describe first-responder communication plans with fusion centers in Nevada and other affected states;

3. The Board is the only Federal agency expressly responsible for national rail transportation policy, and it is not appropriate for the Board to limit its consideration of DOE's application to Nevada activity since the proposed transaction is an integral part of an overall, integrated national transportation scheme for the transport of SNF & HLW; and

4. It would be inappropriate to approve DOE's application and expect to hold DOE accountable to implement railroad construction and operations, and any appropriate conditions or mitigation based on DOE's non-informative application and subsequent filings under regulations that require full detailed disclosure and transparency.
Finally, it is important to recognize that the sabotage and terrorism events occurring today may not be the same potentially carried out over the next 50 years of DOE’s transportation plan which risks we must consider today and anticipate for the future. DOE’s application is woefully inadequate regarding consideration of sabotage and terrorism risks.

**Conclusion**

DOE has made no reasonable effort to provide a sufficiently detailed Section 10901 application that complies with the information requirements of 49 CFR Parts 1105 and 1150. Nevada contends that DOE’s Application and supporting NEPA documentation do not presently provide an adequate basis for the Board to grant the Application, and it should be denied without prejudice.

###