STATEMENT TO THE U.S. DEPARTMENT OF ENERGY'S OFFICE OF CIVILIAN RADIOACTIVE WASTE MANAGEMENT REGARDING THE DRAFT ENVIRONMENTAL IMPACT STATEMENT FOR A GEOLOGIC NUCLEAR WASTE REPOSITORY AT YUCCA MOUNTAIN, NEVADA

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My name is Allan Turner, I am a Captain in the Colorado State Patrol and co-chair of the Western Interstate Energy Board's High-Level Radioactive Waste Transportation Committee. The Western Interstate Energy Board (WIEB), composed of energy advisors to the governors of eleven western states, created the High-Level Radioactive Waste Transportation Committee almost two decades ago in recognition of the possibility that spent nuclear fuel and high-level radioactive waste might be stored or disposed of at a facility in the West. Since that time, the Committee has consistently provided the Department of Energy (DOE) with western state perspectives on federal policies impacting the transportation of radioactive waste. The Committee's membership consists of state nuclear waste transportation experts from Arizona, California, Colorado, Idaho, Nebraska, Nevada, New Mexico, Oregon, Utah, Washington, and Wyoming. I am pleased to be here today on behalf of the Committee to present comments on the Department of Energy's recently released Draft Yucca Mountain Environmental Impact Statement.

In my capacity as a Captain in the Colorado State Patrol and commander of the Patrol's Hazardous Material Section, I have witnessed and participated first hand in a variety of DOE radioactive and hazardous waste shipping campaigns. Through my personal experience with DOE's Waste Isolation Pilot Plant (WIPP) shipping program I have seen firsthand an example of a DOE radioactive waste shipping program which has, by and large, been a success. The WIPP program represents a positive example of a federal agency working in concert with affected state agencies and other stakeholders to develop transportation plans and to identify transportation routes well in advance of radioactive waste shipments. This successful planning effort culminated with the opening of the WIPP facility this year.

In direct contrast to this experience, however, as a member and current co-chair of the WIEB High-Level Radioactive Waste Transportation Committee, I have witnessed a DOE civilian radioactive waste program which has failed to make any tangible progress in working with affected states and tribes to develop a transportation plan or to identify shipping modes and routes to be utilized by contractors for Nuclear Waste Policy Act (NWPA) shipments. The Committee, with the support of western governors, has consistently provided DOE with clear input on the priorities of western states regarding an NWPA transportation program, including among others: 1) full scale cask testing; 2) mode and route analysis; 3) implementation of a program to provide financial and technical assistance to states and tribes under Section 180(c) of the NWPA; 4) concerns over the potential privatization of key transportation responsibilities; 5) the use of the WIPP program as a model in radioactive waste transportation planning; and 6) the

assessment of terrorism concerns.

However, the Office of Civilian Radioactive Waste Management's (OCRWM) record in addressing the concerns of western states has been extremely poor. Included as an attachment to my testimony today is a report card developed by the Committee on OCRWM's progress to date in developing an NWPA transportation program.

With OCRWM's poor past record in mind, western states are gravely concerned that the current draft Yucca Mountain EIS does not meet the requirements of the National Environmental Policy Act (NEPA) in assessing the transportation impacts involved with shipping radioactive waste to Yucca Mountain under the NWPA. The Committee will submit more detailed comments on the draft Yucca Mountain EIS in the near future. Today, however, I would like to focus my comments on one of the most crucial aspects of the EIS, which is the analysis and selection of transportation modes and routes for shipments of spent nuclear fuel and high-level radioactive waste under the Nuclear Waste Policy Act. I would add that the importance of timely mode and routing analysis and selection in an NWPA shipping campaign is also reflected in a comprehensive nuclear waste transportation resolution passed this June by western state governors through the Western Governors' Association. I have brought a copy of this resolution to be included as part of my comments on the record.

1) <u>DOE Needs to Conduct Route-Specific Analyses for NWPA Shipments</u>

The Committee is extremely disappointed that the Department of Energy appears to be breaking the promise it made years ago to stakeholders that it would conduct comprehensive assessments of potential transportation routes to be used in transporting spent nuclear fuel and high-level radioactive waste to any potential repository. Specifically, in Volume III of DOE's Yucca Mountain Environmental Assessment, which was conducted in 1986, DOE stated that " [t]he DOE believes that the general methods and national average data used are adequate for this stage of the repository-siting process. Route-specific analyses and an evaluation of the impacts on host States and States along transportation corridors will be included in the environmental impact statement. The route-specific analyses to be performed in the future will proceed in the following sequence: (1) define important parameters; (2) gather data; (3) develop models as required; (4) perform analysis; (5) consider mitigating measures; (6) report results."

The draft EIS completely fails to meet the promise made in the 1986 Environmental Assessment, and provides no route-specific analyses and no specific evaluation of the impacts on states along transportation corridors. Instead, the draft EIS states only that "[a]t this time, about 10 years before shipments could begin, DOE has not determined the specific routes it would use to ship spent nuclear fuel and high-level radioactive waste to the proposed repository...this analysis used current regulations governing highway shipments and historic rail industry practices to select existing highway and rail routes to estimate potential environmental impacts of national transportation. Routing for shipments of spent nuclear fuel and high-level radioactive waste to the proposed repository would comply with applicable regulations of the Department of Transportation and the Nuclear Regulatory Commission in effect at the time the shipments occurred..." (EIS, Appendix J, J-23)

2) DOE Needs to Designate SNF/HLW Shipment Corridors to Allow States and Tribes to Properly Focus Training and Emergency Response Resources

As the Committee has stated to DOE numerous times in the past, western states believe that reliance on current highway routing regulations and historical rail routing practices to determine transportation routes will jeopardize the health and safety of its citizens and would promote higher costs and reduced efficiency. Highway routing regulations, for example, would allow the use of virtually the entire Interstate highway system for nuclear waste shipments to Yucca Mountain. Especially when shipments cover long distances, as would be the case with NWPA shipments, multiple combinations of Interstate highways would be allowable under the DOT regulations. Forcing states and tribes to prepare for nuclear waste shipments along multiple routes would be extremely costly and inefficient and could hinder the effectiveness of emergency response in the event of a transportation accident.

The importance of reducing the total number of highway routes which can be utilized for shipments under the NWPA has also been recognized by the Committee's counterparts from across the country, including the Council of State Governments' Midwestern High-Level Radioactive Waste Committee and Northeastern High-Level Radioactive Waste Transportation Task Force; and the Southern States Energy Board's Advisory Committee on Radioactive Materials Transportation and Transuranic Waste Transportation Working Group. Together these groups include radioactive waste transportation experts representing more than forty states.

With regard to routing, the groups issued a consensus letter in 1998 to the Department of Energy stating that "the multiplicity of available routes, coupled with the scarcity of resources for training state and local personnel, makes it imperative that the Department adopt a more coordinated approach to selecting the routes for these shipments." The letter also outlined a routing approach that is aimed at achieving three primary goals, including: 1) making the federal government, rather than a private carrier, ultimately accountable for route selection; 2) permitting the most efficient use of federal and state training resources by reducing the total number of routes; and 3) providing states and communities sufficient time to prepare for shipments by identifying national routes well before shipments begin. I am including a copy of the consensus letter to be added to the record of today's comments as well.

With regard to rail routing, the historical route selection practices of railroads are primarily based on commercial needs and not necessarily on safety concerns. For example, in order to maximize revenues, it is standard industry practice for an originating railroad to maximize the distance a shipment will travel on its system before transferring the shipment to the next railroad. Western states do not believe that reliance on such practices will result in the safest routes being selected.

3) DOE Needs to Analyze and Select the Transportation Mode for NWPA Shipments

The draft EIS also fails to appropriately analyze and select a preferred transportation mode for NWPA shipments. The choice between the use of rail (and type of rail service) or truck for the transport of nuclear waste under the NWPA will have a major impact on the number of

shipments which will traverse western states. Assuming, for instance, that DOE operates under the capabilities currently available, an estimated 79,300 legal weight truck casks and 12,600 rail casks would be shipped on the nation's highways and railroads. Were DOE to rely heavily on rail, however, highway shipments could be significantly reduced to approximately 1,150 high-capacity cask shipments.[1]

Modal selection also fundamentally affects the choice of routes which will be used and populations affected. For instance, in many cases the West's major urban areas grew around rail centers. If rail is selected as the mode of choice, it is likely that thousands of nuclear waste shipments will pass through some of the region's most heavily populated areas, with limited alternatives for avoiding these areas.

The analysis in the draft EIS, however, is limited to two generic analyses, including a " mostly legal-weight truck" and "mostly rail" scenario. The EIS acknowledges its own limitations in somewhat peculiar fashion by stating that "the Department does not anticipate that either the mostly legal-weight truck or the mostly rail scenario represents the actual mix of truck or rail transportation modes it would use. Nonetheless, DOE used these scenarios as a basis for the analysis of potential impacts to ensure the analysis addressed the range of possible transportation impacts." (Draft EIS, 6-18) Given the fact that modal selection will have a major impact on routing decisions and on the populations impacted by NWPA shipments, western states believe it to be extremely poor judgement to attempt to base the analysis of NWPA modal selection on data which, admittedly, has very little basis in reality.

Instead, western states recommend that DOE abandon its generic assessment of transportation impacts and revise the current draft EIS to include route and mode-specific analyses and an evaluation of the impacts on states along transportation corridors. Without such route and mode-specific assessments, the Committee believes that the draft EIS fails to meet the requirements of NEPA to properly assess the transportation-related impacts of potential radioactive waste shipments under the NWPA program.

Conclusion

Thank you for allowing me the opportunity to provide the Department with comments on the draft Yucca Mountain EIS. As I mentioned earlier, the Committee will submit more detailed comments in the near future. We are hopeful that this input will aid the Department in producing a much improved EIS.

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[1] *The Transportation of Spent Nuclear Fuel and High-Level Waste: A Systematic Basis for Planning and Management at National, regional, and Community Levels*, Planning Information Corporation (September 1996).