

## Bob Lynch 4/25/2008 E-mail Statements/Questions

### Statements:

1) The nameplate capacity of the Hoover generating units is 2074 MW.

Response: Correct

2) If necessary or advisable, the units can run at nameplate capacity.

Response: Hoover nameplate capacity is only achievable at or above 1165 ft. lake elevation. The last time Lake Mead elevation was at or above 1165 ft. was 2002.

Current elevation is at 1111 ft.

3) There is no specific Hoover allocation to regulation or reserves.

Response: Correct

4) The Western Area Lower Colorado (WALC) Balancing Authority (BA) regulating reserve capacity requirement, pursuant to Western Electricity Coordinating Council (WECC) guidelines, is 65 MW. The 65 MW is not a specific reservation of Hoover capacity. The 65 MW of regulating reserves is provided by integrating operations of Hoover, Davis and Parker dams power plants. Synchronized capacity from unloaded or motoring (spinning reserve) units at all three dams is integrated. Only unscheduled capacity from Hoover is used. When the three dams' unscheduled capacity is insufficient, capacity purchases are made.

Response: Correct.

### Questions:

1) Is the WALC BA regulating reserve capacity requirement constant under all water conditions?

Response: Yes. Water conditions or generation availability, or lack thereof, do not alter the WALC BA regulating reserve capacity requirement.

2) Are purchases currently the only way to shore up this reserve if necessary?

Response: When additional capacity is needed for regulating up yes, however Western has historically been able to accommodate additional down regulation needs through exchange of services agreements that are mutually beneficial. This down regulation is vital in low load times when the generation output for all units set to regulate is approaching zero.

3) If Option C discussed at the April 24, 2008, Operations/Balancing Authority Consolidation Proposal Customer Meeting held in Denver, Colorado goes forward, does the reserve requirement, its sources or implementation change in any way? If so, how?

Response: Option C does not consolidate balancing authorities, therefore operational variables that contribute to the regulation requirements of the WALC BA remain the same. No reserve requirement, its sources or implementation change in any way.

4) There is ongoing work to improve efficiencies of the power generating units at Hoover Dam. How will that work enhance available capacity after 2017? Will nameplate capacity change?

Response: It is Western's understanding that the U.S. Bureau of Reclamation is performing work to enhance the efficiency characteristics of Hoover. Many times efficiency improvements do not correlate to additional capacity. Such improvements include reduced wicket gate leakage, turbine stainless steel seal rings and reduced penstock pressure relief valve leakage. These improvements will minimize water release without generation. Capacity improvements include stainless steel wicket gates, wicket gate overstroking, and scroll case draft tube coating. The current capacity improvements being conducted at Hoover are fully effective at low lake elevations below 1145 ft., with diminishing returns between 1145 – 1165 ft. It is anticipated that this work will enhance capacity at low lake levels before and after 2017. Nameplate capacity is currently limited by the generator ratings and can only be increased by modifying the generators.