Potential One Year Minimum Storage Approach

	COMPONENT	Volume (acre-feet)	Comments
[A]	INACTIVE STORAGE	(0 - 37,000)	Inactive Storage, or dead pool, is based on the lowest gravity release elevations on lakes Buchanan (937.5') and Travis (535.75'). The low value assumes that all water held below these elevations could be accessed and used, while the high value assumes that no water in the dead pool would be available.
[B]	NET EVAPORATION LAKES BUCHANAN AND TRAVIS	(60,600 - 71,300)	The low value for net evaporation is based on the highest yearly evaporation rate in the period of record (1951; 4.68' for Buchanan and 4.43' for Travis) and assuming a combined storage of 350,000 ac-ft (175,000 ac-ft in each lake). The high value was calculated using the same evaporation rate but assuming 450,000 ac-ft of combined storage divided equally between the two lakes.
[C]	NET EVAPORATION LAKES INKS, LBJ, MARBLE FALLS	(0 - 34,500)	The high value is based on the highest yearly evaporation rates (1951; 4.65' for Inks, 4.56' for LBJ, and 4.59' for Marble Falls) and the surface area of the lakes at their typical operating elevations (Inks = 888'. LBJ = 825', Marble Falls = 738'). The low value of zero is based upon the lakes being at their typical operating elevations at the beginning of the year and an operational decision to not offset evaporative losses for one year. After one year at the maximum evaporation rate (4.6 ft), the lakes would still be at or above the typical lake lowering elevations. If the lakes were already at their typical lake lowering elevations (Inks = 880', LBJ = 820', Marble Falls = 730'), the net evaporation would be 28,021 ac-ft.
[D]	NET EVAPORATION LAKE AUSTIN	(6,600)	The net evaporation was calculated based on the highest yearly evaporation rate (1951; 4.28') and the typical operating elevation (492').
[E]	NET EVAPORATION LADY BIRD LAKE	(2,000)	The net evaporation was calculated based on the highest yearly evaporation rate (1951; 4.28') and the typical operating elevation (428').
[F]	TOTAL CITY OF AUSTIN 2020 DEMANDS	(163,100 - 203,900)	The high value for total City of Austin demand was based on the full 2020 demand. The low value assumes a 20% reduction. (see Table next page).
[G]	ALL OTHER FIRM 2020 DEMANDS	(149,200- 186,500)	These demands include the Fayette Power Project, Sim Gideon Power Plant, HB1437 (Williamson County), City of Leander, City of Pflugerville, Matagorda Industrial, Highland Lakes Local, delivery losses, and Conveyance and Emergency releases. The high value was based on full 2020 demands. The low value assumes a 20% reduction. (see Table next page).
[H]	STORED WATER FOR AUSTIN ENERGY	(0 - 10,800)	Stored water for Austin Energy provides backup for Austin Decker Power Plant and Austin at Fayette Power Project. These firm demands were estimated using a WMP WAM. The model run assumed 2020 demands, no non-Garwood irrigation demands, backup stored water for only Subsistence instream flow criteria, and storable inflows for only Threshold MBHE criteria. The low value was based on model output indicating that in several years no stored water was needed. The high value was the maximum 2020 demand calculated by the model, which occurred in 1954.
[I]	STORED WATER FOR STPNOC	(36,400 - 38,800)	Low value for STPNOC stored water diverted based on Region K 2020 demand data. High value based on STPNOC input in WMP process. Both values include 12% delivery losses.
[J]	IMPACT OF GARWOOD DEMANDS	(0 - 8,400)	Garwood Irrigation Division demands were estimated using a WMP WAM. The model run assumed 2020 demands, no non-Garwood irrigation demands, backup stored water for only Subsistence instream flow criteria, and storable inflows for only Threshold MBHE criteria. The low value was based on model output indicating that in several years, there was sufficient downstream water to meet Garwood demands. The high value was the maximum impact of Garwood demands from the model, which occurred in 1998.
[K]	ENVIRONMENTAL RELEASES	(33,400 - 48,600)	The low value for environmental releases was based on the board approved average of 33,440 ac-ft per year. The high value was estimated using a WMP WAM. The model run assumed 2020 demands, no non-Garwood irrigation demands, backup stored water for only Subsistence instream flow criteria, and storable inflows for only Threshold MBHE criteria. The maximum calculated by the model occurred in 1954.
[L]	HIGHLAND LAKES INFLOWS	237,100	WMP WAM Above Travis inflows. The value shown is the lowest inflow year from the model period of record. The five lowest yearly totals are shown in the Table on the next page.
	TOTAL	(214,200 - 411,300)	Based on quantities listed above. For discussion purposes only.

Tables for Potential One Year Minimum Storage Approach

Firm Reduction Table (ac-ft)					
	Full 2020 Demand	5% Reduction	10% Reduction	15% Reduction	20% Reduction
City of Austin	203,880	193,686	183,492	173,298	163,104
Other Firm	186,461	177,138	167,815	158,492	149,169
Austin Energy	10,789	10,250	9,710	9,171	8,631
Total	401,130	381,074	361,017	340,961	320,904

Lowest Historical Inflows (ac-ft)	
2006	237,115
2008	247,654
1950	265,602
1963	288,206
1954	338,086

This information is for Water Management Plan advisory committee discussion only and represents results from one of the many potential scenarios being evaluated. This is not a forecast of future conditions.