Re: Clarification of 2009 NMMA Annual Report

Dear Mr. Miller,

Thank you for the opportunity to review the draft report produced by the Nipomo Mesa Management Area Technical Group (NMMA TG). On behalf of the Northern Cities Management Area Technical Group, I recognize the substantial effort involved in preparing the report and appreciate the considerable documentation of groundwater conditions and the NMMA water supply and demand situation. In my professional opinion, however, the report fails to present salient findings and provide adequate discussion of key issues of concern to the Northern Cities.

The purpose of this letter is to communicate these major statements of concern. As outlined below, each statement is a basic finding that has not been expressed clearly in the draft NMMA Annual Report, but can be derived readily from technical information presented in the 2009 NMMA Annual Report, with some reference to the 2008 Annual Report.

1) Recharge to NMMA is a fraction of total groundwater use and consumption. Groundwater recharge or inflow to the NMMA represents the available supply and has been quantified by DWR, as referenced in the 2009 draft report. The “Dependable Yield” for the NMMA determined by DWR is between 4,800 and 6,000 acre-feet per year (AFY).

In comparison, the current groundwater production is quantified as follows:
   a) The 2009 water demand was 12,200 AF, which is over 200 percent of the maximum Dependable Yield.
   b) The 2008 water demand was 12,600 AF, which is 210 percent of the maximum Dependable Yield.

   This substantial and chronic imbalance of groundwater use over supply has resulted in a large groundwater depression in NMMA.

2) The expanding groundwater depression in NMMA intercepts subsurface groundwater flow that otherwise would flow to NCMA. This contributes to lowered groundwater levels and increased risk of seawater intrusion in NCMA. The 2002 DWR water balance for the NMMA area indicated a subsurface outflow from NMMA to NCMA of 1,300 AFY for the ten-year period from 1986 through 1995; the 2008 NMMA Annual Report confirmed the historical inflow from NMMA to NCMA.
both the 2008 and 2009 Annual Reports, NMMA has indicated that there is currently no subsurface flow to NCMA.

3) Urban/industrial groundwater production increased by 140 AF from 2008 to 2009.

4) Future planned NMMA groundwater production is triple the Dependable Yield estimate:
   a) NCSD production is projected to increase from 2,700 AF in 2008 to a future rate of 6,300 to 7,900 AFY; this is a 245 to 310 percent increase from current production.
   b) Golden State production is projected to increase from 2009 use of 1,290 AFY to 1,940 AFY, an increase of 150 percent.
   c) Woodlands production is projected to increase from the current 810 AFY to 1,600 AFY, an increase of 198 percent.
   d) ConocoPhillips is planning to potentially increase production from 2009 use of 1,200 AFY to 1,400 AFY, an increase of 117 percent.

No projection has been presented for Rural Water Company. If Rural Water Company production remains the same, then groundwater production for the water purveyors and ConocoPhillips is estimated to increase to between 12,120 and 13,720 AFY, as compared to their 2009 demand of 6,740 AFY. Assuming that water demand from rural landowners and agriculture remain at 2009 levels, the total projected water demand for NMMA will be between 17,620 and 19,220 AFY, three to four times the Dependable Yield. The potential growth will increase the NMMA demand by 144 to 157 percent above the current level, which is already producing chronic groundwater level declines.

5) Increased NMMA pumping to satisfy this potential future demand would likely result in seawater intrusion into NCMA, a matter of great concern to NCMA.
   a) The cause of the pumping depression under the NMMA is NMMA pumping.
   b) The report implies that the depression could expand to the west as easily to the north. In fact, the available NMMA groundwater elevation maps indicate that expansion to the northwest (into our Arroyo Grande Plain) is more likely.
   c) The report appropriately addresses the risk of seawater intrusion to NMMA. For example, the report considers the potential for a breach in the divide that would allow seawater to flood into NMMA. Before this point, the NCMA groundwater supply already would be destroyed. The response of NMMA to such a scenario, i.e., to “carefully research it,” is inadequate.

6) NMMA management must restore subsurface inflow to NCMA and maintain a well-documented groundwater ridge between the NMMA pumping depression and NCMA.

7) Rural Water Company (RWC), which is situated along the NCMA boundary, apparently is not participating fully in NMMA water management actions, including provision of required data to the NMMA TG for preparation of the annual report. RWC must participate actively in NMMA monitoring, data sharing, water conservation, development of supplemental supply, and management of groundwater levels.

8) Even if you succeed in acquiring about 3,000 AFY from the City of Santa Maria, that would not be sufficient to reverse the current (6,200 to 7,400 AFY) or future groundwater imbalance (projected to be 11,620 to 14,420 AFY). The NMMA needs to immediately decrease pumping, increase water conservation, and plan for other sources of supplemental supply, such as water recycling.
The intent of the NCMA Technical Group is to establish a straightforward and mutual understanding of water supply and demand conditions in NMMA and NCMA that will serve as the foundation for effective and timely management. We request a prompt written response followed by a teleconference or meeting to discuss resolution of this serious threat to our water supply.

Sincerely yours,

[Signature]

TODD ENGINEERS
Iris Priestaf, PhD
President