Item 18
Consideration of Malibu Lumber LLC and City of Malibu's Malibu Lumber Yard
Response to Written Comments

Author	Date	Comment Summary	Response
Heal the Bay	Nov.19, 2008	1. Findings not consistent with decision to issue WDRs and recommendation at recent Board hearings. 2.Any new discharge to the Civic Center is inappropriate 3.Zero discharge is not possible to reasonably attain	(For full text of comment, please see comment letter) 1. Staff has placed limits in the permit to ensure that discharge will not be allowed if subsurface discharge occurs when effluent limits are not met. If subsurface discharge does not occur, especially at low flows or high flows where the system is not expected to operate, sewage will be stored in the trash trap and equalization tank until removal by pumper truck, and the project will not impact the water quality because the effluent will be removed from site. The conditions of this permit are consistent with staff's recommendation at the previous Board hearing on the City of Malibu's MOU. 2. The goal of the WDR is to ensure that discharge, if it does happen, does not deleteriously affect water quality and beneficial uses. Staff does not agree that all discharges will have an impact, but does agree that under some conditions and at some locations additional subsurface discharge will cause increased impairments. 3. Zero discharge is required as a condition of the WDR for periods when additional subsurface flows could impact water quality or beneficial uses. This can be attained through mechanisms identified by staff in the WDR and the Dischargers in their comments on the Draft Tentative. The WDR states that the new permit to discharge is not to be interpreted as the right to discharge at all times, especially when water quality impairments are predicted to result. In this case, discharge is only allowed when specific groundwater conditions are present. The Discharger describes conservation efforts in the attached comments which can be implemented to reduce the discharge when groundwater levels rise and immediately reduce the underlying elevated mound of groundwater. Another Malibu discharger reduced effluent flows by 60% through changed kitchen practices alone. The Discharger may choose to develop reclaimed/recycled water disposal through which waste could be consumed and not discharged. Staff presented the option to close the restaurants during winter periods of high groundwater level, and decreased customer demand, during a meeting with the Discharger in April 2008. An adjacent project proposes storage of water onsite for later irrigation disposal or sale.
		4.Draft WDRs state unresolved concerns about a water imbalance, and critical effects, 5. A moratorium on new septic systems	4.See response #1 5. The Regional Board has directed staff to work with due diligence in the renegotiation of the MOU and evaluation of a septic system prohibition. Further, the Board's concern about the continued use of septic systems was clearly stated for the City, future dischargers and the public. The City has stated its plans to build a centralized treatment system. See further

		should be in place until the City makes a legal commitment to a centralized treatment plant. 6. A review of the WDR is not appropriate at this time. Insufficient information is presented or available for public review. 7. Effluent limits are inappropriate and all should be revised to zero. 8. Monitoring frequencies should be increased.	comments on staff actions to expedite the evaluation of the septic system prohibition as described in the attachment. 6. Board staff has brought forward the material which is available as of this date and asked for additional materials from the Discharger. Staff has sought to balance many aspects of public benefit in bringing forward the WDR to the Board at this time. See comment #1 above. 7. The WDR effluent limits are expected to improve the groundwater in the Civic Center Basin, if subsurface discharge occurs. Some of the limits are for constituents for which there is no impairment. 8. Staff agrees. Staff will recommend that effluent monitoring frequencies will be increased to daily during the first 6 months of the permit and weekly thereafter until revised by the Executive Officer. The ground water sampling will be weekly when effluent enters the leachfields during the first 6 months.
Santa Monica Bay keeper	Nov. 20, 2008	1.Findings not consistent with recommendation and information presented at recent Board hearings 2. Insufficient information is provided to properly address the WDR. Technical information is not provided. The Board recently directed staff to develop a prohibition, a situation which makes it difficult for decision makers to evaluate the true impacts of the project. 3. Fix the existing problems before allowing new discharge. Zero discharge does not exist. The water quality impairments are too extensive to add any discharge.	(For full text of comment, please see comment letter) 1. See comment 1 for Heal the Bay. 2. See comment 2 for Heal the Bay. See additional information provided in the attachment concerning upcoming staff actions. See comment 5 for Heal the Bay. 3. Staff is working with the City to remedy existing problems. Staff agrees that irrigation does not prevent discharge because it is impossible to ensure the plant needs for nutrients and water exactly balance effluent supplied. However, subsurface piezometers or groundwater monitoring wells can quantify impacts to the water table and, where continuous monitoring is required, rapidly identify when irrigation changes are necessary. With sufficient oversight, impacts to water quality can be minimized and assessed. Staff agrees that the management responsibilities borne by the Dischargers, City and State are dramatically larger than would be required for a centralized system. Further, the public benefits of a centralized system are much easier to quantify and reliance on a structural remedy, instead of a management remedy, has a greater chance of success as agency priorities change. Staff agrees that numerous studies demonstrate the link between septic systems and water quality impairments, including those listed in the comment; 1999 URS Greiner study, RWQCB and EPA TMDL technical analyses, 2004 Questa Engineering study, and the 2005 Stone Environmental Engineering Study. Further, staff agrees that Even if groundwater conditions are improved by discharge of high quality effluent, the groundwater volume and flow are also related to the movement of pollutants into surface water bodies. However, staff believes that the addition of discharge under certain conditions and in certain locations can be

			accomplished without increasing water quality impairments.
		4. The system proposed is seriously undersized. Expectations for irrigation effluent consumption are optimistic. Zero discharge is not possible.	4. The Discharger's comments contain an analysis of predicted discharge as a function of restaurant seating, but the source of the new reference datum was not provided so its accuracy cannot be confirmed. However, the WDR requires an influent meter and only allows 17,110 gpd to flow into the treatment system. Staff agrees that construction of winter storage would prevent discharges during periods of high groundwater and allow business operation during a wider range of conditions, without pumping of the effluent. However, the WDR only provides limits on the treatment system proposed by the Discharger and does not dictate the method of treatment. At small flows and high flows, this treatment system may function only as a holding tank for sewage which is periodically removed by pumper trucks. Staff believes that this solution requires greater agency oversight and may have a greater risk to public health resulting from local releases of sewage not treated or disposed through mechanical means. The consumption of effluent by irrigation will be evaluated during the completion of a Final Title 22 Engineering Report. See comment 3 above.
		5. The Board should require effluent storage between first rain and April 30. 6. Adopt a moratorium until a centralized system is built. 7. The proposed effluent limits are not appropriate 8. The monitoring frequencies should be increased.	5. Staff agrees that the prohibition of winter septic discharge is likely to allow additional development in the Civic Center and utilize remaining summer assimilative capacity, with minimal effects predicted on water quality. This method of system operation and management has not been proposed by the Discharger 6. See comment 6 for Heal the Bay. 7. See comment 8 for Heal the Bay 8. See comment 7 for Heal the Bay
Latham & Watkins	Nov. 20, 2008	A water imbalance and groundwater mounding may limit other Civic Center facilities, but not the Lumber Yard 1. Malibu's specific build-out plan has not been implemented since 1991 and so future developments should not influence this WDR, 2. The pending City groundwater study will answer questions about critical or cumulative effects, and ensure future	(For full text of comments, please see comment letter) 1-3. Mounding is a local effect which occurs beneath every leachfield and is not precluded in this case, nor sufficiently modeled by the application materials. The City of Malibu has a public planning document allowing further development, the execution of which may preclude the successful operation of Malibu Lumber or existing businesses.

		projects do not cause a problem, so this request need not be met for this WDR.	
		3. The WDR language should be changed to reflect that RWQCB understood on November 30, 2007, that this WDR would not adversely affect water quality	4. Regional Board letters to the City of Malibu on the EIR for Malibu Lumber during 2007 clearly state staff's concern about water quality impacts due to cumulative and critical effects related to the WDR. The groundwater modeling was proposed to quantify the problems, and as discussed at the meeting in question, was assumed to reach completion before Malibu Lumber yard opened.
		5. The WDR language should be changed to reflect that RWQCB agreed that no hydrogeological or geological evidence was required if the City stated that the WDR coexisted with Legacy Park.	5. The Engineering material presented in support of the WDR contains little information concerning the manner of integrating the WDR with Legacy Park. Staff would prefer more complete supporting hydrogeological and geological evidence, especially concerning variations in water table and subsurface materials, and does not agree that a future study will suffice However, the material presented is sufficient for Board review.
		6. The geology report submitted by the Discharger sufficiently addresses concerns about the separation between the groundwater and leachfield base. Further, additional studies are being completed by the City and RWQCB staff knew they would not be completed in time for the opening of the Lumber yard.	6. See response to comment 4 above. Staff's WDR/WRR requirements are based on more evidence than included in the document cited, especially the Discharger's original geologic report submitted for this WDR by Van Beveren and Butelo, Sept, 26, 2007, showing that 6.5 feet of separation was present between the surface and the water table under the leach field in 1992. The report included a description of borings LB-3, CPT-13,14,15, PCPT-16, CPT 19, 20 and PCPT 21, drilled in 1992, which show 6.5 to 7 feet of separation. The 1992 wells predict the groundwater would lie at 5 feet below the base of leachfield with a base at 1.5 feet.
		7. Regional Board staff knew that the groundwater study would not be completed before the opening of the facility. Concerns about shallow groundwater are true of other facilities, but not for the WDR.	7. See response to comment 4 above. Board staff advised the Dischargers to design a system to prevent future violations based on existing data.
		8. The Discharger prepared water conservation plans, ensured operator certification, included a groundwater level monitoring plan, committed to connect to a future sewer and will treat wastewater	8. The Discharger did provide a letter committing to make these engineering enhancements on May 6 and 7, 2008. The final WDR does not include several of these enhancements which were not developed by the Discharger. The Discharger's final engineering plan provides no explanation of how Title 22 disinfected waste will be achieved at flows which are too small to meet the minimum process flows for the plant. The Engineering documents show that low flows will not be treated by the system, but will enter the trash

		to tertiary standards, as requested by Board staff. Each of these requests has been met.	trap and equalization tank, which act as holding tanks, for frequent removal by pump truck. As a minimum, staff estimates that 2000 gpd discharge will require pumping twice a month, increasing to every few days at higher flows. The Discharger's proposed water conservation plans are equivalent to those already created by the City and was not enhanced for this WDR.
		9. Concerns about assimilative capacity, existing businesses, and future disposal in the Civic Center are not of a concern for this WDR. The mounding study will address future problems and state-of –the-art system will ensure protection water quality.	9. See response #4 and # 8. Clear scientific evidence has been developed that links septic discharges and to the impairment of adjacent water bodies in Malibu. The volume and flow rate of groundwater transporting that discharge to adjacent water bodies is directly proportional to the pollutants which enter the surface water body. Additional discharge of water at any location in the Civic Center area has the potential to exacerbate existing problems. A partial list of the scientific studies quantifying the relationship between septic discharge and groundwater flows in the Civic Center areas with impairments in adjacent waterbodies would include the following. The **1992** Warshall Report highlighted deficiencies of commercial and multi-family residential septic systems throughout the City. The report further recommended the establishment of a wastewater assessment district, creation and the use of package plants that utilize evapotranspiration and advanced onsite treatment with denitrification and disinfection technology to address Malibu's septic problems. These recommendations were specifically made in regards to the Civic Center Area and in other areas of commercial, residential, and multifamily development throughout the City. A **1996** epidemiological study found that Malibu Surfrider Beach was consistently polluted with fecal microorganisms and that swimming in polluted water dramatically increased the risk of getting sick. It also named nearby septic systems as a likely source. The **1999** URS Greiner Study established a hydrologic connection between wells in the commercial facilities in the Civic Center where there are septic leach fields and Malibu Creek and Lagoon. Additionally, unnaturally high enterococcus, fecal bacteria, nitrates and phosphate concentrations were found in groundwater well samples near the Colony and the Civic Center. In **2000** RWQCB began an investigation of the groundwater in Malibu, including elevation data which shows that groundwater in the study area is in hydraulic connection with, and flows into, Malibu Creek, Malibu Lagoon, and the near shore zone, such as Surfrider Beach. Sample analysis shows that the constituents typical of sewage were present in the groundwater adjacent to septic system leachfields, Malibu Creek, Malibu Lagoon, and the near shore zone. In the bacteria and nutrient Total Maximum Daily Loads (TMDLs) for Santa Monica Beach and Malibu Creek and Lagoon, adopted by the Regional Board and approved by the USEPA, the septic systems in the Malibu Study area were found to contribute to the pollution of groundwater, Malibu Creek, Malibu Lagoon, and the near shore zone.

			In **2004** Malibu and the RWQCB entered into an MOU allowing Malibu to permit septic systems producing less than 20,000 gpd of waste or that discharge waste from non-food related commercial facilities that generate 2000 gallons per day or less, and from single family residences. A key objective was to update septic discharges to allow the City to meet the load allocations in the TMDLs. The City of Malibu completed the **2005** Risk Assessment Study and 2005 Questa Engineering Wastewater Management Feasibility Study which recommend once again that advanced treatment with denitrification and disinfection is necessary for the Civic Center area, Malibu Colony, the commercial and multifamily area east of the lagoon and in Serra Retreat. They also calculated that 42% of the existing groundwater in the study area is composed of OWTS flows. Numerous groundwater wells that were sampled had higher than allowable bacteria and nutrient concentrations. Malibu is currently alleged to be in violation of bacterial water quality standards due to septic discharge as documented in our **2008** Notice of Violation to the City for failure to comply with their MS-4 storm water permit.
		10. Dischargers have the option to identify a 100% replacement area for the leachfield within the proposed leachfield with mechanical changes.	10. The Discharger's engineering design does not meet the 100% replacement requirement for the leachfield. If water quality evidence from groundwater monitoring wells shows that the existing leach field is failing, discharge will not be permitted.
		11. The assimilative capacity of the Civic Center is 160,000 gpd.	The document referenced by the Discharger also states that this is the assimilative capacity for summer discharge and the year-round discharge is less (page 6-1).
		12. The Discharger states that equalization tank pumping should be allowed with written notification to the RWQCB EO, as opposed to EO approval. Further, no limits should be applied to the system influent. The Discharger states that reducing restaurant use is not feasible.	Agreed. The modification has been made.
		13. Nutrient limits should be 3 mg/L when the average groundwater separation is 5 feet. A minimum of 6 feet is necessary to meet TMDL surface water limits and will be present at all times.	The end of pipe limit is 3 mg/L when the additional subsurface treatment of nitrogen is present to meet the EPA TMDL numeric target of 1 mg/L. No discharge, and no end-of –pipe discharge should be taking place when there is less than 5 feet of separation, so the 1 mg/L limit can be left in place should other treatment processes be added or low nitrogen waste be produced.
		14. Existing groundwater may	14. None of the water quality samples submitted exceed the WDR limits, except for pathogens, and the highly treated

		exceed limits and Discharger should not be required to meet the limits under such conditions.	effluent should improve groundwater conditions. Influent sampling will ensure that an accurate representation of WDR performance is available to staff and the public
		15. Recycled and reclaimed water limits should include nitrogen limits of 3 mg/L	Agreed. The modification has been made.
		16. Deed restriction findings should be made by the City	Agreed. It is the City's responsibility to interpret the Deed, so the change has been made.
		17. Groundwater monitoring wells should not be required around Legacy Park	The WRR allows future disposal in Legacy Park, the future area must be surrounded by groundwater monitoring wells.
		18 100% leachfield replacement will be met through operations	18. See Response # 10.
		19. The Discharger should not be required to meet future TMDL requirements	19. All WDRs must comply with changes in regulations.
		20.Financial harm may come from RWQB termination of a permit.	20. Comment noted.
		21. The original Lumber leachfield was in failure when the facility was closed.	21. RWQCB has no evidence to support this assertion and none is provided by the commenter.
		22. Various administrative/langua ge changes	22. Agreed. The modification has been made.
		23. The existing technical information is sufficient and failing systems are a concern.	23. The technical information is not sufficient to define impacts from the WDR. Failing systems can contribute to water quality problems. The WDR language will not be changed.
		24. No groundwater monitoring wells are necessary on Legacy Park	24. See comment #17.
		25. Caffeine should not be used to track effluent discharges.	25. Caffeine is characteristic of domestic waste water and is a good indicator of water source.
		26. Remove lease provisions as options for tenant education.	26. Agreed, the modification has been made.
		27. Average daily use should be provided in monthly water bills.	27. Agreed, note that an influent meter is required by the WDR.
		28. No groundwater wells at Legacy Park	28. See comment #17
		29. There shall be no change in restaurant	29. Discharge is prohibited when the groundwater separation from the base of the leachfield is less than five feet. There are

		operation based on groundwater levels.	no operations which are allowed if they result in discharge when sufficient groundwater separation is not present.
		30. Reclaimed water requirements should apply only if the Discharger chooses to proceed with its use.	30., Agreed. The modification has been made.
		31. No groundwater monitoring is necessary at the edges of Legacy Park.	31. See comment #17.

Attachment:

Preliminary Regional Board Schedule for MOU re-negotiation and consideration of a septic prohibition through a Basin Plan amendment within one year

Date
Action

Nov. 20 2008
Board directs re-negotiation of MOU and septic prohibition with milestones (MSPM)
Begin preparation of septic prohibition with milestones (SPM) and re-negotiation of MOU to include identification of a water management plan in the Civic Center area including Malibu Colony. This timeline is for a WWTP as a reference

Nov. 2008
RWQCB creates staff team
Begin assessment of enforcement problems in the Civic Center. Identify staff experts and begin compilation of existing septic prohibitions and review requirements. Begin solicitation of stakeholder recommendations for requirements for MOU re-negotiation and septic tank prohibition requirements.

Dec. 2008
Stakeholders input sought on MSPM for use in public meetings
Stakeholders input gathered.
1 week needed to prepare CEQA notice. RB staff begins preparation of SPM and negotiation of MOU with City of Malibu.

Dec. 11, 2008
Regional Board hearing on Malibu Lumber

Dec. 19 2008
Notice CEQA Scoping meeting for MSPM
1 month notice required

Jan. 19 2009
CEQA scoping meeting

Jan. 26 2009
Tentative MSPM drafted

Feb. 26 2009
Public Notice of MSPM

April 12, 2006
Preliminary results from City Groundwater Study

Apr. 13 2009
Close of Public Comments
After 46 days

Apr. 25 2009
Mail Board package
After 12 days for response to comments and 12 days before the meeting

May 7 2009
Board considers adoption of re-negotiated MOU and Septic Prohibition with Milestones

June 1 2009
If adopted by RB, mail State Board Basin Plan amendment package for consideration by State Board of septic system prohibition.
After 1 month to prepare administrative record

August 2009
Regional Board hearing on Malibu La Paz

Nov 2009
SWRCB adoption
After 5 months to notice and hear

Dec. 2009
OAL approval
After 30 days and holidays to approve

Draft Tentative Milestones will be developed during December 2008 in consultation with stakeholders. Possible Milestones are listed below,

Dec. 31. 2009
Prohibition in effect unless these milestones met

(a) Long-term solution identified
(b) RFP issued by City and design engineer hired
(c) Legacy Park construction completed
(d) Satisfactory progress on MOU permitting of residential systems

Begin first year of MSMP on Dec. 31 2009

Year 1 task
Complete WWTP design
(end 6 months-June 30, 2010)

Year 1 task
Complete WWTP financial plan
(end 8 months=September 30, 2010)

Year 1
Task
Purchase or allocate property
(end 1 year-December 31, 2010)

Dec. 31. 2010
Prohibition in effect unless these milestones met

(e) Design 100 % complete
(f) Financial plan 100% complete
(g) Property acquired
(h) Satisfactory progress on MOU permitting of residential systems

Year 2 Task
WWTP CEQA review
(end 6 months=June 30, 2011)

Year 2
Task
WWTP Coastal Commission
(end 6 months-June 30, 2011)

Year 2
Task
Public Meetings on grinder pumps and public use of leach fields
(end 1 year-December 31, 2011)

Year 2 Task
Establish WWTP sewer districts
(end 1 year-December 31, 2011)

Dec. 31. 2011
Prohibition in effect unless these milestones met
(i) CEQA finalized
(j) Coastal Commission approval
(k) Sewer Districts established and begin funding
(l) Satisfactory progress on MOU permitting of residential systems

Jan. 23 2012
Santa Monica Bay Bacteria Load Allocations must be met

Year 3 Task
Notice to Proceed on Construction
(end 6 months preparation of civil, architectural, structural, mechanical, process engineering documents- June 30, 2012)

Year 3
Task
Submit ROWD for WDR/WRR
Jan. 23, 2012.

Year 3 Task
Permitting
(end 8 months for City, County construction permitting-September 30, 2011)

Year 3
Task
Authority to Construct
(Begin 18 months construction including excavation, dewatering, tank construction, mechanical, electrical and building construction on September 30, 2011 and end construction on March 31, 2013.

Dec. 31. 2012
Prohibition in effect unless these milestones met

(m) Plant 25% complete (excavations and tanks)
(n) Collection system 25% complete (all commercial and residential grinder pumps installed)
(o) Disposal system 25% complete (all commercial connected

Year 4 Task
Continue construction

Dec. 31. 2013
Prohibition in effect unless these milestones met

(p) Plant 100% complete (excavations and tanks)
(q) Collection system 100% complete
(r) Disposal system 100% complete

Year 5 Task
WWTP Commissioning
(End 5 months-July 1, 2013)

Year 5 Task
WWTP Startup
(End 4 months- December 31, 2013)

Dec. 31. 2013
Prohibition in effect unless these milestones met

(s) WWTP operational, meeting NPDES or WRP permitting requirements.