## Comments on MAQIP Task Force meeting on June 11, 2007

The following comments are submitted in response to the June 11, 2007 meeting of the Task Force for the Port of Oakland's Maritime Air Quality Improvement Plan. Comments are ordered by topic, not by importance, and "Overall Impressions" are included at the end. These comments are the opinion of Dr. James Fine.

### **Emissions Estimates**

The presentation of the current estimate of Port-related emissions is incomplete. The consultant, Environ, presented an initial emissions estimate at the TF kickoff meeting in January. Though several months have passed since then, the following actions have NOT occurred but are required to give TF members a real understanding of emission estimates:

- A complete emissions profile should to be made available to the general public.
- A complete and detailed report of estimation methods should be made available to the general public and written in terms that can be understood by stakeholders without technical training. A complete emissions estimate in tabular and graphical formats needs to be included with the report.
- The most fundamental lesson learned from 50+ years of air pollutant emissions estimates is that the estimates are quite uncertain. Why aren't the uncertainties and methods being explained to the general public? Furthermore, the implications of these uncertainties need to be considered as we proceed with control strategy development. To date, the consultant has provided very little information about the reliability of the emissions estimates. We need uncertainty information about the overall estimate (i.e., the size of the pie for DPM, NOx and air toxics) and source categories (i.e., the size of each slice of each pie).

# **Guiding Principles**

Any good environmental science textbook<sup>1</sup> will define environment as "where we live, work and play." Environmental stewardship is defined as "a philosophy that holds that humans have a unique responsibility to manage, care for, and improve nature." This philosophy is often distinguished from the preservationist (i.e., biocentric view that all things have a right to exist) and conservationist (i.e., conserve natural resources so they can be used by humans for the greatest good) philosophies. We cannot assume that all at the table share the Port's stewardship philosophy. I question what evidence the Port has to suggest that it has been or will be a good steward of the environment; alas, historical practices provide evidence for quite the contrary conclusion – that the Port has a human-focused, conservationist philosophy.

It is not clear how these principles will be used for decision-making. This list should be titled "Port of Oakland Commitments to Air Quality Planning". Reading down the list of

<sup>&</sup>lt;sup>1</sup> For example, see Cunningham, W. P., M. A. Cunningham, and B. A. Saigo. 2007. <u>Environmental Science, A Global Concern</u>, **9**<sup>th</sup> **Edition**. McGraw-Hill Higher Education Publishers. ISBN 007283089-1. <sup>2</sup> Ibid. Page 594.

commitments, the Port's priority appears to be economic growth, not public health or environmental justice. We must acknowledge that the EXISTING CONDITION in West Oakland is one of environmental injustice and that business-as-usual is not acceptable (e.g., keeping emissions constant even if container movement doubles will NOT be sufficient). We need to establish clearly that the priority principle is one of reducing emissions to levels BELOW current emissions until environmental justice is achieved.

Allowing for voluntary environmental stewardship has yielded a population of wheezing children and environment injustice in West Oakland. Voluntary reductions will NOT be sufficient to achieve air quality standards established to protect health.

There was some discussion of analyzing the cost and benefits of control strategies. Brian Beveridge noted correctly that health benefits need to be quantified. Herein lies a classic problem of environmental economics: health benefits are difficult to estimate and to attribute to emissions controls, whereas those bearing the economic cost of emissions controls have well-documented costs. Uncertainties aside, there is also the equity dimension of costs and benefits. WHO pays? The community has already paid a very high health price whereas precious little has been invested in reductions. When we compare costs and benefits, historic health costs need to be incorporated.

Control strategy selection criteria are discussed in more detail below, but they deserve mention in the context of cost-benefit analyses. Cost effectiveness is NOT the same as cost-benefit. Cost-benefit implies that a balance should be reached whereby costs (= health costs + emissions control costs) do not exceed benefits (= economic growth + improved public health). There is no agreement amongst the TF that this balancing criterion ought to be used for the MAQIP priority setting.

## Goals

This is a very fuzzy list and it cannot be used to determine if planned reductions will be sufficient. Thus, when the TF is presented with a list of priority ranked control strategies, we will have no idea how far down on the list to go (and when to go there). That is, we need to know how much reduction is needed, both today and in the future, but the goals as stated provide no guidance.

But there is opportunity for clarity in the second bullet. It should be rewritten as: Define a clear set of plan objectives. Then the Port needs to create a clear list of objectives that are essentially marching orders for all Port-related emissions sources. The TF will critically evaluate the objectives. Well-defined objectives are S.M.A.R.T.

- Specific
- Measurable
- Achievable
- Realistic
- Time-delimited

The discussion of standards suffered from ill-informed comments. I must clarify the TF comment that standards will undermine R&D investments. This is not necessarily the case and there are myriad examples of standards that provide the impetus for R&D.

There are three types of standards: performance, technology and ambient. All have pro's and con's that need to be explained to the TF.<sup>3</sup> TF members also need a chance to understand the recent history of successes/failures of command-and-control policies and how the preferred policy mechanism depends on the characteristics of the emissions sources. Last, the standards-based policy approach needs to be juxtaposed with incentive-based policy mechanisms, with clear explanation of how incentive-based policies might be preferred for some types of emissions sources.

Chris Ferrara was wise to insert alternative fuels into the conversation. It is a control strategy that offers potentially the greatest near-term prospect for getting cheap reductions. It was unfair to squelch his suggestion and in the interest of being proactive about control options, it ought to be given serious consideration. To the extent that funding will determine control options, it is clear that alternative fuels have an institutional disadvantage because CARB's Carl Moyer Program funds equipment, not fuels. The key point is that we have a chance to do something really special (by American, not Worldwide) standards in the realm of oil independence via biofuels. Through the MAQIP, we might demonstrate how biofuels will achieve several goals, but to do so we have to be courageous leaders, not followers. It is possible to develop a leading-edge biofuel program that includes both biodiesel (from waste grease, used vegetable oil and raw feedstocks for trucks, marine vessels, and cargo handling equipment) and natural gas (from manure for trucks and cold ironing). However, the evaluative criteria appear to be set up to disadvantage a fuel-based control strategy, due largely to the lack of (local) experience and unclear funding sources. Funding for biofuels is available, most recently from venture capitalists, and without question those same capitalists are salivating over the huge fuel demand associated with Port operations. Furthermore, biofuels already have broad community support in Oakland, as demonstrated by the oil independence campaign being lead by Nancy Nadel and the Apollo Alliance.

### **Decision Criteria**

Screening criteria need clarity via more precise definition. Screens are intended to keep things out, but we need to be inclusive from the outset. Something seemingly unheard of today might be the next best option tomorrow. Thus, the criteria need to consider space (and incentives) for new ideas and control strategies, including strategies that have not

<sup>&</sup>lt;sup>3</sup> Most environmental economics textbooks clearly describe these pro's and con's. I'd suggest Anderson, D.A., Environmental Economics and Natural Resource Management. 2004. ISBN: 0-324-13382-0. Thomson South-Western Publishers.

yet be tested or envisioned. There is a lot more to say about both the screening and evaluative criteria, but comments at this juncture would be premature.

### **Parameters**

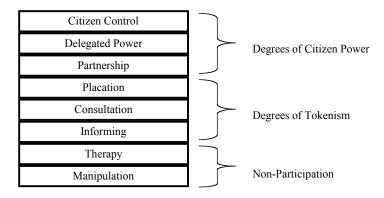
This list reads as "Port reserves the right to change its mind." Seems that the West Oakland community and other stakeholders similarly need a set of parameters. Here's a starting list for the WO community:

- WO community reserves the right to pursue legal remedies if the Port continues harmful and thus illegal business practices
- WO community reserves the right to dissent to both the MAQIP process & resultant decisions; Participation by the WO community does not guarantee consent.
- WO community has the right to share its full opinion about the planning process, roles of process participants, goals, objectives (or lack thereof), decision criteria or stakeholder comments with the general public thru the popular media and any other means necessary.
- WO community will continue with other ongoing collaborative efforts to reduce toxic exposure and, if it so determines, to emphasize these other efforts over the MAQIP.

## **Overall Impressions**

The Port's has done an excellent job of providing meeting materials, and Concur has upheld its promise of producing summary documents and providing well-mediated meetings. Alas, the process is overwhelmed with boundary-ordering lists and Concur has failed to create a safe setting for meaningful, collaborative, consensus-building because all stakeholders are not equally empowered.<sup>4</sup>

<sup>&</sup>lt;sup>4</sup> There is a well-developed scholarly literature on what makes for open, honest and effective collaboration. For examples, see Judith Innis' work on "communicative" planning processes. Also, as show below, Arnstein (1969) describes a hierarchy of participation in community planning. Science-led planning can limit the public to various degrees of tokenism. "Meaningful" participation requires a citizenry empowered with the understanding necessary to critique the scientific bases of decisions.



See also, Marsh, Eric. Office of Environmental Policy Innovation. U.S. Environmental Protection Agency. Washington, D.C. (Discussing cross-cutting lessons from their study of a decade of documented

There is no clear explanation of how the several lists we discussed today will interplay, or how specifically they will be used to guide decision-making. The list of lists is mind numbing:

- Goals
- Guiding principals
- Parameters
- Screening criteria
- Evaluation criteria
- Rules of process
- Roles of participants
- Milestones

What is needed is a road map that shows how each list influences the process. And oh what a process it is! This TF has grown into a crowd (32 task force members + ~3 mediators + 3 consultants + 32 alternates + general public + Port staff + BAAQMD staff). Combined with the Ports many boundary lists, the TF is now a tangled social construct. The set up might be conducive to plan production but is NOT an appropriate way to meaningfully engage the public. Fortunately, Concur can clarify these lists and bring along this group of the willing. Unless clarity is provided quickly, I fear that future meetings will devolve due to confusion.

SUPERFUND law says that corporations that soil the ground must pay to clean it up. The same standard should be applied to those who pollute the air. The fair share concept makes logical sense but ought to be rewritten as "whoever pollutes should pay to clean up their pollution." Fair share also needs to be recast to consider who enjoys their "fair share" of burden and profit from the Port's maritime operations. Indeed, landlords are responsible for their tenants – today, tomorrow and yesterday. Though the Port requests that the TF not look backward, we must to remain wisely skeptical of voluntary targets and self-enforcement.. We cannot forget failed promises and the Port's lack of effective environmental stewardship. We are reminded literally with every breadth of the insults of fuel-injected air and the cowardice of money-minded malfeasance. I'll trust the Port to act as an environmental steward only once it demonstrates so through action, and I'll trust that promises will be kept only when all parties have significant incentives to comply. Currently, the Port has an incentive only to produce a plan that competes for an I-Bond infrastructure grant, and little incentive to ensure that all residents of Oakland have a right to a clean, healthy and safe environment in which to live, work and play.

participatory processes conducted by the EPA, "Often, data credibility depends upon whether the data can be produced or confirmed by an outside source... Without outside expertise, groups with non-technical backgrounds can be significantly disadvantaged in their ability to participation effectively in decision-making...EPA has made strides to improve in this area, however, by enabling participants in multistakeholder processes easier access to technical experts.") (Internal cite omitted.) 6<sup>th</sup> Biennial Conference on Communication and Environment. Aepli, M-F., Delicath, J.W., and S.P. Depoe, Eds. Center for Environmental Communication Studies. University of Cincinnati. July 27-30, 2001. Pg. 157.