

Mr. VIVIAN. I don't think product cost is necessarily the right word to use, but it is still a very small fraction of your total sales cost. If you were to double your efforts in pollution abatement, this would be approximately another 1- or 2-percent factor of product cost. It could affect your profits slightly more than that, but those would be differential profits across the industry. They would not be necessarily affected very much at all. So, there is much room left in the industry for pollution abatement. I think you will agree with me.

Mr. LOGAN. No question; and your arithmetic is correct; yes.

Mr. VIVIAN. Now, the next question I have is related to the study of massive research. On page 5 of your testimony you refer to the need for evolutionary development from a combination of operating experience and constant research attention. I would agree with that. This is the only way in which most work progresses. But what do you mean by a massive research effort scattered on a broad front? What horrible image did you have here that you were trying to knock down?

Mr. LOGAN. I think the term "massive" was more with reference to a systems-analysis approach. We feel that it is not in all cases in the best interest of society to proceed to carry to the ultimate the control of waste disposal and pollution by existing techniques and by decisions made without the benefit of an analysis that incorporates many factors beyond our control: social, economic, transportation, and so forth. Therefore, we suggest that a systems-analysis approach incorporating not only the factors over which we in the chemical industry have control but other factors—climatic conditions, labor conditions, market conditions, unemployment—a thousand and one. These are the criteria that have to be subjected to an overall attack in order to come up with the best cost-benefit solution to waste disposal. In the long run that will best serve the public interest. We are prepared to provide our contribution to that kind of an attack but we cannot do that ourselves because it involves factors outside our knowledge and outside our control.

Mr. VIVIAN. Are you suggesting then that the Government should carry on what I will call the massive research effort related to a cost-benefit analysis, or are you suggesting that you don't want industry to carry it on? I'm trying to find out what these words mean.

Mr. LOGAN. I'm suggesting that this has to be done, and that since in our opinion it cannot be done by us as an industry, it will be difficult to be done by any other industry involved. Therefore, maybe this is an area where the Government could move forward.

Mr. VIVIAN. On page 5 of your statement, you point out that 95 percent of the daily waste water volume met the public agencies' requirements in effect at that time. Does that suggest that the remaining 5 percent was in violation of the law?

Mr. LOGAN. Either that they were in violation and were working on the problem or that there were no public regulations applicable.

Mr. VIVIAN. I couldn't read the words as meaning that there were no regulations applicable. It sounds as though the 5 percent was in violation of the law.

Mr. LOGAN. I can't answer the details of that question. I'm not certain of that.