DISCUSSION Michael J. Flax, The Urban Institute

Mr. Chairman: I want to begin by stating that I am doing research at one of the institutions that was formed in an attempt to cope with the rapid changes occurring in information technology which Dean Kozmetsky was talking about. The Urban Institute is a problem oriented, multidisciplinary research organization investigating urban problems. Many of the staff, including myself, have had experience in the "systems approach" which was used so extensively by defense research agencies.

In general, I don't go along with the pessimistic tone of Dean Kozmetsky's paper. Even though it is true that we need a lot more long term research, I think we must also seek short-term, interim improvements and keep constantly making incremental adjustments to our institutions. This is necessary for two reasons: First, with our imperfect knowledge, we are only capable of "muddling through" from crisis to crisis in order to keep our society from going under. Secondly, we have to keep making attempts at improvement in order to keep our citizens from giving up hope and turning in despair to the radical methods of the left or the right.

I think some progress, imperfect though it is, is taking place in many areas. If there were more time it would be possible to give numerous examples.

With regard to the Johnson-Ward paper, I believe they are suggesting an initial approach to a very important area. We are only just beginning to attempt to collect and interpret data on the physical aspects of the socio-economic conditions of cities.1/ The work in measuring attitudinal data with regard to different cities is in an even earlier stage of development.2/ So there is no doubt, in my mind, that this is an area that needs further innovative exploration. The paper rightly points out the need for more information by the Lindsay Administration, for example, as well as the fact that there is reason to believe that the attitudes of citizens do not correspond with either those of the activists that claim to represent them or the planners who feel they know what is good for them.

The approach suggested is an innovative one. A panel which will permit longitudinal data to be gathered from a representative cross section of the population. Also, a feeding back to the panel of their responses in order to change the perceptions of the panel members themselves. I'd like to see this concept tested experimentally. Can peoples attitudes be changed in this manner? Can the results be replicated more than once? Will this procedure result in constructive improvements or merely raise the expectations and the frustration level of the participants?

While I think the concept is an interesting one, I want to offer several suggestions re-

garding future work in this area. My suggestions are in three areas.

First, concerning the details of the approach suggested.

Second, regarding the use of computers and other elements of the new information technology, and

Thirdly, regarding the explaining of the proposal to the public.

First, I would like to see much more detailed information concerning this proposal. How large would the panel be? How would you involve a representative sample of the community? How would this compare with sample survey work in this area? Who would conduct this panel and who would pay for it? Would it be a research tool or an aid to city administrators?

Such information is needed in order for me to understand exactly what is being proposed and how, when, and by whom it might be implemented.

Secondly, I would opt for a more gradual approach to the use of computers. I have worked with complex computer systems in the defense department and I know how time consuming and expensive the implementation of even simple systems can be. Implementing mixed, conditional and adaptive models into a system that can be used by poor folks, the young, and middle America, seems to me a herculean task.

I don't believe adequate models exist, so their generation would comprise a substantial project. Even computerizing such models once they were developed and tested would be a difficult endeavor. Design of the man-machine interface necessary for their use by the proposed inner city population would be a third very difficult task. I'd prefer a much more modest and incremental approach. Specifically, I'd like to advance step-by-step, gradually increasing the sophistication of the computer techniques used. I'd also go slow with the multi-media approach. If we carefully define what we wish to communicate we can often select the most efficient medium for our particular message. Multi-media may not be the most practical method of reaching the proposed audience.

Regarding the Delphi method, I think you should distinguish between the "Delphi Exploration" and the "Delphi Technique" developed at RAND. The second, consults experts and feeds their opinions back to them. It is not computer based. The "Delphi Exploration" being developed at the University of Illinois, is probably what was referred to in the Johnson-Ward paper. A detailed study of this preliminary experimental application of computerized sampling and subsequent feedback to the participants may indicate that it could be modified for use by inner-city

citizens instead of University students. It is worth further future exploration.

Finally, I'd like to say a word about the relationship of this proposal to the public. Insisting that all results be available to the public does not assure that this activity would be carried out in "goldfish bowl". The way it is presently written, I'm sure the public would not understand what is going on. I think much more clarity in presentation is needed so that city officials, let alone the average citizen, can understand just what you are proposing. In order to be useful, I believe that research proposals and results must be written in a manner that is clearly understandable to the people who must use them as well as the people who must pay for them.

Your report is titled "An Exploration." I hope you will continue your explorations in some of the directions I have suggested.

REFERENCES

- Jones, Martin V. and Flax, Michael J, "The Quality of Life in Metropolitan Washington (D.C.): Some Statistical Benchmarks" Working Paper 136-1, The Urban Institute, Washington, D.C. 20037, March 1970.
- Lester Milbrath, of the New York State University at Buffalo and Winston Franklin at the Sloan-Kettering Foundation in Dayton, Ohio, are doing work in this area.

(The papers by Kosmetsky and Johnson-Ward, discussed above by Mr. Flax, were not sent for inclusion in this Proceedings volume.)