Project Title: Professions Seminar on "Machine-Made America: Technology and Democratic Ideals"

Project No: G-43-616

Project Director: Dr. Melvin Kranzberg

Sponsor: National Endowment for the Humanities; Washington, D.C. 20506

Agreement Period: From 12/01/78 Until 8/31/79 (Grant Term)

Type Agreement: Grant No. FP-0024-79-205 (thru GIT)

Amount: $45,029 NEH Funds (G-43-616)
940 GIT Contribution (G-43-320)
$45,969 Total Funds

Reports Required: Participant Info; Final Performance Report

Sponsor Contact Person(s):

**Technical Matters**

Dr. Julian F. McDonald
Mail Stop 101
National Endowment for the Humanities
Division of Fellowships
Washington, D.C. 20506

**Contractual Matters**

Mr. David J. Wallace
Mail Stop 200
National Endowment for the Humanities
Grants Office
Washington, D.C. 20506

Defense Priority Rating: n/a

Assigned to: Department of Social Sciences (School/Laboratory)

COPIES TO:

Project Director
Division Chief (EES)
School/Laboratory Director
Dean/Director—EES
Accounting Office
Procurement Office
Security Coordinator (OCA)
Reports Coordinator (OCA)

Library, Technical Reports Section
EES Information Office
EES Reports & Procedures
Project File (OCA)
Project Code (GTRI)
Other
Date: April 7, 1980

Project Title: Professions Seminar on "Machine-Made America: Technology and Democratic Ideals"

Project No: G-43-616

Project Director: Dr. Melvin Kranzberg

Sponsor: National Endowment for the Humanities; Washington, D. C. 20506

Effective Termination Date: August 31, 1979

Clearance of Accounting Charges: August 31, 1979

Grant/Contract Closeout Actions Remaining:

- Final Invoice and Closing Documents
- Final Fiscal Report
- Final Report of Inventions
- Govt. Property Inventory & Related Certificate
- Classified Material Certificate
- Other

Assigned to: Department of Social Science (School/Laboratory)

Copies To:

Project Director
Division Chief (EES)
School/Laboratory Director
Dean/Director—EES
Accounting Office
Procurement Office
Security Coordinator (OCA)
✓ Reports Coordinator (OCA)

Library, Technical Reports Section
EES Information Office
Project File (OCA)
Project Code (GTRI)
Other: C. E. Smith
### Georgia Institute of Technology
Atlanta, Georgia 30329

#### Programs/Functions/Activities

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#### Status of Funds

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#### Financial Status Report

**Programs/Functions/Activities**

1. **Net outlays previously reported**
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2. **Total outlays this report period**
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3. **Net outlays this report period (Line b minus line a)**
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4. **Net outlays to date (Line a plus line d)**
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5. **Less: Non-Federal share of outlays**
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6. **Total Federal share of outlays (Line e minus line f)**
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7. **Total cumulative amount of Federal funds authorized**
   - $ 45,029.00 (Line g)
8. **Unabligated balance of Federal funds**
   - $ 256.37 (Line h)

#### Certification

I, David V. Welch, Manager of Grants & Contracts Accounting, certify to the best of my knowledge and belief that this report is correct and complete and that all outlays and unliquidated obligations are for the purposes set forth in the award documents.

**Signature of Authorized Certifying Official**

David V. Welch, Manager
Grants & Contracts Accounting

**Date Report Submitted**

12/15/78 - 8/31/79

**Telephone**

(404) 894-6024

**FEDERAL SHARE**

- **Type of Rate**: (Place "X" in appropriate column)
  - 76%
- **Rate**: 76%
- **Total Amount**: $8,719.48
- **Federal Share**: $8,719.48

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**Note:** Attach any explanations deemed necessary or information required by Federal sponsoring agency in compliance with prevailing legislation.
INSTITUTION: Georgia Institute of Technology
Atlanta, Georgia 30332

PROJECT DIRECTORS: Dr. Melvin Kranzberg (Director)
Callaway Professor of the History of Technology

Dr. August Giebelhaus (Associate Director)
Assistant Professor

Department of Social Sciences
Georgia Institute of Technology
Atlanta, Georgia 30332

PROJECT TITLE: "Machine-Made America: Technology and Democratic Ideals"

GRANT NUMBER: FP-0024-79-205 (Georgia Tech Project No. G-43-616)

GRANT PERIOD: December 1, 1978 through August 31, 1979

AMOUNT OF GRANT: $45,029

DATE OF REPORT: January 29, 1980

SIGNATURES OF DIRECTORS

Melvin Kranzberg
August Giebelhaus
BACKGROUND:

From June 25 to July 20, 1979, Georgia Tech for the second time hosted a seminar for journalists as part of the Professions Program sponsored by the National Endowment for the Humanities. Entitled, "Machine-Made America: Technology and Democratic Ideals," this month-long seminar was one of twenty-five educational experiences organized for business executives, journalists, labor leaders, lawyers, judges, physicians and health care professionals, public administrators, and school administrators. Held on college campuses across the country, the professional seminars are designed to provide the working professional with an opportunity to meet in small groups, away from the work place, in order to reflect upon the historical, philosophical, cultural, and social dimensions of their careers.

The Georgia Tech seminar had as its central focus the relationship between changing technology and American democratic traditions. Two main questions served to guide our inquiry -- To what extent has technology served to democratize society? Why and how has society recently moved to democratize technology? Although the major thrust of the seminar was the history of technology, we also dealt with current issues, particularly during the second two weeks of the program. The directors (Melvin Kranzberg and August Giebelhaus) are both historians within the Department of Social Sciences at Georgia Tech who have specialities in technological history.

The fifteen journalists who attended the Georgia Tech seminar indicated in both their written evaluations and oral comments that the goals of the seminar were carried out successfully. Not only did the participants learn a great deal about a facet of American history that is too often neglected, they found the structure and format of the seminar to be conducive to the free exchange of ideas.

The historical focus of the first two weeks of the seminar enabled the participants to investigate how Americans have confronted technological change in
the past. Readings and discussion topics were designed to investigate both the positive and negative aspects of innovation and technological change in American history. This background was fundamental to the broadened discussion of contemporary technology and society issues that dominated the second half of the seminar.

PROJECT ACTIVITIES:

During the first phase of the grant period (December, 1978 - February 1979), efforts were devoted to planning the seminar and beginning the advertising and promotion of the 1979 program. Since this was the second time around, we were in a position to evaluate the 1978 seminar and incorporate changes that had been suggested by the previous year's participants as well as our own ideas. Preliminary work on local arrangements also had to be undertaken. This involved housing, food service, library utilization, and recreational facilities, all services designed to make our participants' stay at Georgia Tech a pleasant one. The months of March and April were largely taken up with the selection of participants to the 1979 seminar and continued planning. Selection was completed by the first week in May, and from then until June 25, the directors were busy with final seminar planning and individual communication with the participants.

There was a slight decrease in applications to the program this year -- twenty-five compared with thirty-two in 1978. Out of this pool of applicants, however, we were able to select fifteen excellent individuals representing a wide geographic area as well as various job experience within the journalism profession (see attached list of participants). Many of the fifteen were reporters from both large, medium, and small-sized papers, but we also selected a political cartoonist, two editors, a public information officer, two magazine writers, and a free-lance journalist. Assisting professors Kranzberg and Giebelhaus on the local selection panel were Mr. Charles Seabrook, Science Editor for the Atlanta Journal;
Miss Michelle Greene, feature writer for the Atlanta Journal/Constitution (and a "graduate" of the 1978 seminar); and Mr. Charles Harmon, director of the Georgia Tech News Bureau.

Shortly before the seminar began, one of the persons selected was forced to withdraw because of a serious accident. We were able to replace her with an alternate representing a similar geographic and occupational designation (female reporter from a small Southern newspaper). At the end of the first week of the seminar, another participant had to leave due to a serious illness in the immediate family. She received only a pro-rated portion of her alloted stipend, but we did not feel it worthwhile at this point to replace her with an alternate since the seminar was one quarter of the way completed.

Participants arrived on campus on Sunday June 24 to check into reserved dormitory rooms and meet briefly with the directors. Everone stayed in the dormitory with the exception of two individuals who brought their families. Unfortunately, Georgia Tech does not have adequate facilities for family living and they had to be housed in off-campus accomodations. We were very pleased that both of these people were among the most active in the program and their living experience did not detract from their full participation. In general, the directors support the goal of the NEH Fellowship Division to encourage the participants to live on campus. This provides an excellent opportunity for the continuing exchange of ideas outside of the formal seminar meetings.

The first seminar meeting took place on Monday morning, June 25, 1979. The group met each morning, Monday through Friday, from 9:00 A.M. until 12:00 noon, took lunch together in a private dining room, and gathered for occasional field trips and special programs in the afternoon. The syllabus listed reading assignments and daily topics for discussion (see attached copy). Reading came from four books purchased at the Georgia Tech bookstore and from supplementary hand-outs on
special topics. There was a presentation each morning by one of the directors that was followed by a coffee break. Following this short break, there was a discussion of the day's topic, including both the reading assignment and the morning presentation.

In actual practice, the seminar ran far more informally than it may sound here, but a strong effort was made not to let discussions drift too far afield. This had been an early criticism made by some of last year's seminar members, and in general, we found it possible to strike a good balance between free inquiry and directed learning.

We invited Georgia Tech colleagues to address the seminar on five occasions. These individuals were specialists in subjects related to the seminar, including slavery, technology, and the Civil War, communications technology, alternative technology, solar energy, and appropriate technology for the third world. These guest speakers were able to remain and contribute to our general discussion. In addition to these formal visitations, we also invited several of our colleagues to join us at lunch during the course of the month-long program. Some of these people were selected by the directors based on positive evaluations of their contribution to last year's program. Other guests, however, came at the request of seminar members. Among those who joined us for lunch and gave informal presentations were experts in nuclear energy, civil liberties, biomedical ethics, and international relations.

As in the previous year's experience, we found that our participants had both eclectic interests as well as a voracious appetite to learn about a variety of new subjects, many of them technical ones. Although these "add-ons" were only a peripheral part of the seminar experience, we found them to be a great success. Our faculty colleagues who participated also spoke very highly of their seminar contact.
Based upon very favorable evaluations of last year's seminar, we also arranged some afternoon fieldtrips. The group visited a General Motors assembly plant in Atlanta, solar energy experimental facilities at Georgia Tech, the Georgia Tech nuclear test reactor, and the student-operated textile mill located in the school of textile engineering. All proved valuable, but the G.M. and nuclear reactor trips were highlights. The visit to the assembly plant and subsequent meeting with plant executives was a superb culminating activity to our class discussions of mass production, the factory system, and the effect of technology on the workforce. The tour of the nuclear facility, conducted by Georgia Tech colleagues who were supremely pro-nuclear, served as a provocative point of departure for discussion. We feel that this component of the seminar experience was most successful.

As we had done last year, the directors made every effort to adjust the focus of the seminar to the interests of the participants. For example, after the initial two weeks of inquiry into the interaction of technology and American society in our past, the seminar voted on topics to focus on during the second half of the program. This procedure was announced in the beginning of the seminar and topic selection took place at the end of the second week. We also adopted a recommendation that grew out of last year's experience -- the assigning of individual seminar reports. During the final week separate people took responsibility to give a presentation and lead the discussion for part of the morning's meeting. In this way we were able to more formally tap the many experiences and extensive knowledge of our participants. When we discussed "technology and the environment," for example, three seminar members gave brief, informed reports on aspects of the environmental issue that they had previously worked on.
As one may gather from above, the Georgia Tech seminar was very tightly organized and jam-packed with activity. Both directors and participants confessed to a certain exuberant exhaustion by July 20. Yet, there was also much time for informal contact and relaxation. On most afternoons (when no fieldtrip was planned) many seminar members could meet individually or in small groups with the directors in their offices. A picnic held during the first week served as a very successful ice breaker" and other social activities took place during the month. Many friendships were made and groups of seminarians were able to take advantage of free week-ends to travel to areas of interest outside of Atlanta. The culmination of social activities came during the final week of the seminar. The official seminar softball team, "The Ramblin Hacks," played a rematch with the Atlanta Constitution team. We lost again, but there was much fun and friendship when all of those journalists got together. On the last night of the seminar, the participants held a farewell party at the dormitory at which all had an excellent time.

Even though the seminar came to a formal end on July 20 when our journalists left Atlanta to return to their papers, stations, or magazines, its activities have continued. We have been in continuing contact with our "graduates" (as well as with the graduates of 1978). In some cases they will write to ask for help with specific stories or projects; at other times they will call just to talk. In this sense therefore, the activities of both the 1978 and 1979 seminars on "Machine-Made America: Technology and American Ideals" are ongoing.

**Results:**

It is difficult to accurately judge the results of a program such as this. In the short run we have both the evidence of very positive written evaluations (attached) as well as the good will expressed by the participants at the end of the
month-long program. The fifteen journalists who arrived at Georgia Tech on June 25 rapidly molded themselves into an exciting and effective seminar. The directors naturally found themselves comparing the group with "last year's gang."

Although the 1978 seminar was very successful and contained several outstanding individuals, this year's mixture seemed to have jelled more as a cohesive group. The members learned from each other as well as from the syllabus and there was an open exchange of ideas among all.

One indication of the continuing results of the program has been the contact that the directors have had with the participants since last summer. Many of them have called or written to seek information, elicit opinions, or simply to talk. We have received copies of many stories and columns written since the seminar that indicate a great deal of thought about topics discussed last summer. Since our seminar members were all journalists, we have had perhaps more contact with "graduates" in pursuit of factual information as they research stories. This is particularly true in terms of energy and environmental issues. Although providing material for stories was not the goal of the journalism seminars, it has become an unavoidable and generally positive outcome. If our graduates are now better informed and more reflective in their daily work we feel that it is all to the good. Most of the journalists at Tech also agreed that it would be sometime before they could assess the effect of the seminar on their attitudes and outlook.

It is in this area of long-term benefits where assessment becomes very difficult. How will this NEH experience have influenced general views and perspectives on man and his technological society? Many participants have mentioned specifically the value of historical perspective gleaned from the seminar. Others praised the opportunity that they had last summer to challenge their preconceptions both in class discussions and during late night sessions in the dormitory. This last point,
simply the opportunity for professionals to come together for a month on a university campus and engage in free discussion was an obvious but still very important strength of the program.

From the perspective of the seminar directors the experience was a success in every way. We learned much from our fifteen journalists, found them to be cooperative and intellectually curious, and made lasting friendships in many cases. Our department, Social Sciences, and Georgia Tech as a whole benefited from having these outstanding people with us for a month. If one uses the yardstick of how effectively the seminar has furthered a general appreciation of the humanities, we feel that the 1979 Georgia Tech seminar has come off well indeed. The participants benefited from a intense month of historical study and problem-oriented discussion. Both from their evaluations of that month and our own assessment of their work, we feel that the journalists left Georgia Tech with a great deal of information as well as a deeper and more reflective attitude toward many contemporary issues arising from the interface of technology with society. Similarly, the program meshed well with the directors' continuing efforts here at Georgia Tech to further studies of the social implications of technology. It is our goal to insure that the humanities live in this engineering institution and the seminar experience was valuable in keeping our own energy levels high as we labor in this task.

EVALUATION AND RECOMMENDATIONS FOR CHANGE:

We benefited greatly from the participant evaluations of our 1978 seminar by incorporating suggestions into this year's program. We plan to do the same if we have the opportunity to run a similar program in the future. Our initial decision to maintain a flexible posture in the daily planning of the seminar proved to be a wise one. The participants appreciated the chance to have a voice
in the selection of topics for the last part of the seminar. The adoption of oral seminar reports this year was also a success. On balance the fieldtrips and lunch-time discussion sections were also very successful.

We mentioned above that in some respects this seminar functioned in a more cohesive way than last year's. In many respects this had as much to do with the efforts of the directors as it did with the internal dynamics of the group. Quite frankly, we benefited from some of last year's criticism that we let some individuals dominate discussions too much. Although we were again sensitive not to restrain anyone's freedom of expression, we did do a somewhat better job of keeping the discussions on the topic and moving along.

Some changes were made in the reading assignments from last year, and we would make some additional changes if the seminar is offered again. This past summer we had dropped one book for another and made additional changes in the supplementary reading. Our decision to include more specific material on the subject of "energy and society" turned out successfully and student evaluations suggest that this should be continued in the future. The written evaluations of both our field-trips and lunch-time speakers indicate that most should be retained and some dropped. The General Motors and nuclear reactor visits, for example, were highly successful while the textile engineering tour was only of marginal interest.

Comments on the physical arrangements at Georgia Tech, as last year, were mixed. Everyone enjoyed the eating arrangements, but there was some mild displeasure with the dormitory accommodations. Frankly, although our dorms are not that bad, the transition back to this type of living is just too much for some people. Others, however felt that the dormitory experience was good. All commented on the very helpful student staff in the housing office. One
participant made the useful suggestion that we should provide more specific information in our preliminary literature about the accommodations, making suggestions about the utility of such items as radios.

Perhaps the strongest selling point of Georgia Tech is its location in Atlanta. There are many cultural and recreational activities in this beautiful city and the seminar participants were well-occupied. Through the cooperation of the Student Athletic Association we were able to arrange full utilization this summer of the new athletic center, including swimming and gymnasium facilities. The participants made excellent use of this opportunity.

We learned much from our first seminar in 1978, have benefited from the second experience, and will be in an even better position if a similar program is offered again. Although we would make some minor changes to "fine-tune" our program, we feel that the 1979 seminar was a great success and we would retain the basic structure and organization.

STATUS:

In terms of the research and teaching interests of the seminar directors, there will continue to be involvement within the general area of technology and society. The experiences shared and lessons learned this past summer will serve to improve our own teaching at Georgia Tech. We have also found it refreshing to have the opportunity to deal with working professionals outside of academe. The directors continue to be active as communicators to the public at large, and the NEH program was in many ways an extension of this activity. Dr. Kranzberg is currently involved in the teaching of a course by newspaper entitled "Energy and the Way We Live," and he remains active in committee work associated with technology and society outside of the academic community.
We do not anticipate any specific follow-up grants or undertakings that have evolved from the 1979 Professions Seminar for journalists, "Machine-Made America: Technology and Democratic Ideals." We are enthusiastic, however, about conducting a similar program either for journalists or another profession if asked to do so by the Endowment.

ANTICIPATED DISSEMINATION OF RESULTS:

We do not anticipate any publications arising from this grant since it was a teaching and not a research program. We have received, however, and will most probably continue to receive copies of stories and columns written by the journalists who are now alumni of the two seminars in 1978 and 1979. In one sense the material will be a continuous assessment of the effects of the seminar over a period of many years.

ATTACHMENTS:

A. List of Seminar Participants

B. 1979 Syllabus

C. Participants' Written Evaluations
Members of Dr. Kranzberg's 1979 Summer Seminar
"Machine-Made America: Technology and Democratic Ideals"

Ms. Pearl Alperstein
Liaison Representative/Communicator,
Regional Transportation District
Denver, Colorado

Ms. Charlotte E. (Beth) Baldwin
Reporter
Picayune (Mississippi) Item

Mr. H. Warren Buckler
Editorial Writer
Louisville (Kentucky) Times

Mr. Roland Giduz
Alumni Editor & Associate Director
of Alumni Affairs
University of North Carolina at
Chapel Hill

Mr. Charles E. Hutchcraft, Jr.
Reporter
Suburban Tribune (Hinsdale, IL)

Mr. Robert Alan Klein
Reporter
Albuquerque News

Mr. Robert M. Lane
Reporter
The Seattle Times

Mr. David Ray Money
Reporter
The Daily Sun (Texas City, TX)

Mr. Hamilton Frazier Moore, Jr.
Feature Writer/Reporter
Fort Myers (Florida) News Press

Ms. Rita E. Pastore
Producer/Director
KWSU-TV (Pullman, WA)

Ms. Barbara Moon Perry
Feature Writer/Artist
Fiesta Magazine

Mr. Malcolm R. Provost
Assistant News Editor
The Saratogian (Saratoga Springs,
New York)

Mr. William Willard Sanders
Political Cartoonist
The Milwaukee Journal

Mr. Mitchell James Shields
Free-lance Journalist
Atlanta, GA

Mr. Karl Thunemann
Editorial Page Editor
The Daily Journal-American
(Bellevue, WA)
During the first two weeks of the seminar we will examine the role that technology has played throughout American history. Although part of this inquiry will involve a look into the development of new machines and processes, our discussions will primarily explore the extent to which technological innovations have helped to democratize America, effect fundamental changes in American life, and at times bring about negative social and human consequences. Most of the third week will focus on topics related to energy, a major issue facing the United States today. The final week's schedule is open so that we can concentrate on topics selected by the group from a list provided. Once we have decided on the themes to be addressed during this last week, we will distribute a revised syllabus, including reading assignments.

The first part of each day's meeting will be devoted to an informal lecture on part of the topic scheduled for that day. After a short coffee break, the seminar will reconvene for a discussion of the ideas presented in the lecture and contained in the assigned reading for that day.

Required Reading (on sale at the Georgia Tech Bookstore):

Melvin Kranzberg and William H. Davenport (eds.), Technology and Culture: An Anthology
Edwin T. Layton (ed.), Technology and Social Change in America
Nathan Rosenberg, Technology and American Economic Growth
Albert H. Teich (ed.), Technology and Man's Future
DAILY SCHEDULE:

Monday, June 25

**Topic:** "Why Study History? Why the History of Technology?"
**Reading:** Ferkiss, "Technology and Industrial Man" (photocopy);
Hughes, "Introduction, Changing Attitudes Toward American Technology" and Temko, "Which Guide to the Promised Land: Fuller or Mumford?" (photocopies)

Tuesday, June 26

**Topic:** "Technology and the Democratization of American Society"
**Reading:** Heilbroner, "Do Machines Make History;" Drucker, "The First Technological Revolution and its Lessons;" Mumford, "Authoritarian and Democratic Techniques;" Rae, "The Know-How Tradition in American History" (all in Kranzberg and Davenport)
**Afternoon Program:** Visit to Georgia Tech student "Tex-Tech Project"

Wednesday, June 27

**Topic:** "Alternative Technology"
**Guest Speaker:** Dr. Stanley R. Carpenter
**Reading:** "Voluntary Simplicity" (photocopy); Meadows et al, "Technology and the Limits to Growth;" Carroll, "Participatory Technology;" Winner, "On Criticizing Technology" (all in Teich)

Thursday, June 28

**Topic:** "The Transit of Technology, 1607-1800"
**Reading:** Rosenberg, ch. I, "Technology in Historical Perspective;" ch. II, "The Economic Matrix;" Wilkinson, "Brandywine Borrowings from European Technology" (Kranzberg and Davenport)

Friday, June 29

**Topic:** "The Beginnings of American Technology, 1800-1860"
**Reading:** Rosenberg, ch. III, "The 19th Century: America as Borrower;" Ferguson, "Technology as Knowledge;" Hunter, "The Heroic Theory of Invention;" Meier, "The Ideology of Technology" (all in Layton); Burke, "Bursting Boilers and the Federal Power" (Kranzberg and Davenport)

Monday, July 2

**Topic:** "Slavery, Technology, and the Civil War"
**Guest Speakers:** Dr. Robert C. McMath, Jr.
Dr. Dorothy Yancy

**Reading:** Stampp, "A Humanistic Perspective" (photocopy)
Tuesday, July 3

Topic: "The Formation of an Industrial Society, 1870-1900"

Reading: Rosenberg, ch. IV, "The 19th Century: America as Initiator;" Woodbury, "The American System of Manufacturing" and Sinclair, "The Direction of Technology" (Layton); Condit, "Sullivan's Skyscrapers as the Expression of 19th Century Technology;" Rasmussen, "Advances in American Agriculture: The Mechanical Tomato Harvester as a Case Study" (Kranzberg and Davenport)

Wednesday, July 4 -- HOLIDAY -- NO CLASS

Thursday, July 5

Topic: "Business and Institutional Growth"

Reading: Chandler, "The Beginnings of 'Big Business' in American Industry" (photocopy)

Friday, July 6

Topic: "The Development of Industrial Leadership, 1900-1940"

Reading: Rosenberg, ch. V, "The Twentieth Century;" Layton, "Engineers in Revolt" (Layton)

Monday, July 9

Topic: "Innovative Technology in Contemporary America"

Reading: Rosenberg, ch. VI, "Technology and Social Options;" Muller, "Human Values and Modern Technology" (Layton); Gordon and Ament, "Forecasts of Some Technological and Scientific Developments. . . ;" Weinberg, "Can Technology Replace Social Engineering?" and Coates, "Technology Assessment" (all in Teich)

Tuesday, July 10

Topic: "Energy Crises: Past and Present"

Reading: Nef, "An Early Energy Crisis and its Consequences" (photocopy)

Wednesday, July 11


Guest Speaker: Dr. Thomas Stelson

Reading: Lovins, "Energy Strategy: The Road Not Taken?" (photocopy)

Thursday, July 12

Topic: "Alternative and Synthetic Fuels"

Reading: Krammer, "Fueling the Third Reich" (photocopy)
Friday, July 13

**Topic:** "Hard Paths: Nuclear Energy in Today's World"

**Guest Speaker:** Dr. Alfred Schneider

**Reading:** Lanquette, "Nuclear Power -- An Uncertain Future Grows Dimmer Still" (photocopy)

**Afternoon Program:** Visit to Georgia Tech Nuclear Reactor

Monday, July 16

**Topic:** "Social Implications of Changes in Communication"

**Guest Speaker:** Dr. James E, Brittain

**Reading:** McLuhan, "From Understanding Media;" Mesthene, "The Role of Technology in Society;" McDermott, "Technology: the Opiate of the Intellectuals" (all in Teich).

**Discussion Leaders:**

- Bill Sanders, "Freedom of the Press: The Progressive H-Bomb Case"
- Frazier Moore, "Should We Eliminate Television?"

Tuesday, July 17

**Topic:** "Technology and the Environment"

**Reading:** Huxley, "Achieving a Perspective on the Technological Order" (Kranzberg and Davenport); Goodman, "Can Technology be Humane;" "Toward Assessment and Control;" Brooks and Bowers, "Technology: Processes of Assessment and Choice;" Folk, "The Role of Technology Assessment in Public Policy;" Coates, "Technology Assessment;" "Organization and Operations of the Office of Technology Assessment;" Coastal Effects of Offshore Energy Systems" (all in Teich).

**Discussion Leaders:**

- Pearl Alperstein, "Oil Shale and Coal Mining in Colorado"
- Bob Lane, "Mediation of Environmental Conflicts"
- Mal Provost, "Land-River Contamination: The Case of PCB's"
Wednesday, July 18

Topic: "Human Values and Modern Technology"

Reading: Buchannon, "Technology as a System of Exploitation" (Kranzberg and Davenport); Muller, "Human Values and Modern Technology" (Layton); Marcuse, "The New Form of Control;" Ellul, "From the Technological Society" (all in Teich).

Discussion Leader:

Karl Thunemann, "The Individual in a Technological Society: The Role of the Press"

Thursday, July 19

Topic: "American Technology and the Third World"

Guest Speakers: Dr. Nelson C. Wall
Dr. Jay Weinstein

Reading: Ritchie-Calder, "Technology in Focus -- The Emerging Nations" (Kranzberg and Davenport).

Friday, July 20

Topic: "Technology and the Limits to Growth"

Reading: "Pure Technology;" Weinberg, "Reflections of a Working Scientist;" Meadows et al., "Technology and the Limits to Growth;" Freeman, "Malthus with a Computer;" Kiefer, "Forecasting in Technology Assessment;" and Baram, "Technology Assessment and Social Control" (all in Teich)

Discussion Leaders:

Warren Buckler, "Public Resistance to the Proliferation of Coal-Fired Power Plants"

Rita Pastore, "Technology and Man's Future"
SEMINAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

The presentations followed the plan very well, it seemed to me, and were quite well-prepared and interesting. The directors' insight in picking up and re-discussing seminarians' questions was also very refreshing and much appreciated. There was true encouragement to real intellectual stimulation

In style and content the presentations were definitely well-presented and clear, with appropriate re-emphasis, and useful in historical perspective and application.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

As noted above, the directors were very helpful—could not have been more helpful. Critical

I would like to make some constructive comments in this regard, but truly cannot suggest anything more in this regard. You xx were both interested, enthusiastic, and very effective disciples of your discipline.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

Of course it met expectations. Anybody who says it didn't has only him/herself to blame. This was an extraordinary opportunity, to be exploited to the ultimate. We may not have done so, but that is in no way the fault of the directors. I read the descriptive material several times and feel it capsuled quite well what we did in the seminar.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport:

While from the volume of reading I can't accurately sort it out qualitatively without re-studying, I do recall the Kranzberg/Davenport book as one of the best—and again, the one from which I gained a long-absent historical perspective for myself.

Layton:

I found some of the selections heavy going, but wouldn't fault the writer.

Rosenberg:

Teich: Ditto as for Layton

Supplementary Articles: The Lovins article was the most interesting one to me. But for the answering argument, I was particularly appreciative of Kenneth Stampp's "A Humanistic Perspective"

5. What changes should be made to improve the reading materials if the seminar is offered again?

—Would we read more thoroughly if offered/encouraged to buy the material weeks or months beforehand?
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology): He was an interesting and informative speaker throughout. I have difficulty respecting his basic premise in that it seems to me too self-justifying on any grounds he happened to choose. But I surely feel he was an important part of the overall program.

Bob McMath (Slavery and Technology):

He made an excellent presentation; very well-informed and interesting

Tom Stelson (Solar Energy): One of the best and most stimulating; served to demolish stereotypes which journalists too conveniently take upon themselves for others

Fred Schneider (Nuclear Energy): His integrity and concern, and the pure information he furnished were very helpful and heartening. His presentation is all-important

Jim Brittain (Communications): all right, and well done for the four communication media he presented, but if time is short, I'd consider his presentation as optional.

Nelson Wall (Appropriate Technology): A dynamic presentation, but perhaps over-kill in making the points.

Jay Weinstein (American Technology and the Third World):
An extraordinarily appealing lecturer. I just didn't become steamed up over the particular topic.

Jon Johnston (ACLU): Sorry but I missed most of his presentation; but was quite interested in what I heard of it.

Darryl Chubin (Biomedical Ethics): I couldn't get into it—my fault.
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: A very helpful tour, that fitted in with the lecture material.

Nuclear Reactor: Very very good

General Motors: Excellent.

Too many tours could be distracting or fragmentive. I thought all three of these, and the spacing of them, were very worth while, and with direct application to the seminar and to our individual imperative concerns of today as journalists.

8. How much did you get from the seminar? How would you rate its overall value to you?

One of the major opportunities of my career in journalism. I cannot speak highly enough of it. Of course the reaction at this point is one of being momentarily overwhelmed, but I do expect it will have a qualitative effect in as background for my own writing, and also serve as an overall stimulus. I know this to have been the very positive effect of a fellowship 20 years ago, and expect the same this time, thank you.
9. Would you recommend this seminar to a colleague?

Certainly I would. I plan to tell a number of persons about it and to urge various ones whom I think could qualify to apply. Since my own facet of journalism now is not in the public press, I hope also that you will continue to try for the balance in types of journalism.

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

In re the above, would the balancing effect have been abetted if some of the industrial/trade/business press had been represented. These two-sided resulting discussion would have been more helpful. I tend always to look for "the other side" in any discussion, and felt that we all too often ended up (and started out, too) feeling smugly elite as a group—with scant justification. Of course this is a formative situation for all of us, but doubts and skepticism are very important for journalists. It is too easy, too neat to believe you have the ultimate answer when you don't. To paraphrase Mel's "lead" in his forthcoming article, "We think we have the answers, but too often we don't really know the questions."
1. I found the lectures by Kranzberg and Giebelhaus not only clear and well presented, but also informative and often challenging. The lectures revealed that both instructors are well read and know what they are talking about, although I didn't always agree with them. The lectures went well beyond the reading material, giving additional insights into the history of technology. I do have one gripe, however. I wish more time was given to the whys and wherefors. For instance, it was only touched on briefly as to how man's attitude toward technology developed. It was covered to some extent in the reading and to some extent in the lectures. I would have liked to spend more time on this because a major part of what we were studying had to do with attitudes. If anything is to be done to convince modern man that technology is not always for the better the first step, of course, is dealing with man's attitudes.

One last point—the lectures were presented in a fairly objective manner, which is to the credit of the instructors. But there were times when I wanted them to make a value judgement. They did so occasionally when questioned.

2. I don't think there was anything that a participant wanted done that the instructors didn't try to accommodate. Both were willing to bend over backwards to help out. I especially appreciate the efforts outside the classroom by Giebelhaus, who I'm sure sacrificed much valuable time to lend a helping hand. As for their enthusiasm, not much need be said other than they were very much so.

3. Let me answer the last part of this question first. The material describing the seminar had me intrigued but proved only to be a tantalizing appetizer. The seminar gave me much more information and insight than I had expected. The outside speakers I appreciated very much, and the instructors should be complimented for their foresight that led to this. The outside speakers gave the seminar an added depth to the seminar that I wasn't expecting.

4. Kranzberg and Davenport:

The readings were balanced and covered a wide area. This book, in particular, has led me to obtain books by authors included in this work for further reading.

Rosenberg

This was at times dry and very slow moving—but this is only a criticism of style. I generally find academic works to be so. One criticism I mentioned to Giebelhaus is that these people seem to be writing to each other, using a language intelligible only to them, but not attractive to the general public. I found what most of these people had to say important and worthwhile for others outside academia to read. I wish the authors would make an effort to reach the general public, for it's the general public that is much involved in this matter—this matter of how much control the public will have over technology, if it is to have any at all. This can be done not only by going to periodicals available to the public at large but also the material must be written so as to keep the layman interested.
Layton:
Again, this book covered a wide enough area to be worthwhile, and was fairly balanced.

Teich:
The works in this book I found to be the most--what can I say--arousing. In some ways it was like reading an ongoing debate.

5. These books and the supplemental material serve the course well.

6. Stan Carpenter:
The voice in the wilderness; I love voices in the wilderness. Thank goodness we have them, and thank goodness for Stan Carpenter. It was said that not all that he proposes is practical, but at the same time I don't think he's all that impractical, either. I wish his voice could be heard more.

Bob McMATH:
One of the more interesting of the guest speakers. His insight into the South is invaluable.

Tom Stelson:
He increased my blood pressure by a few points when he stepped into the nuclear area. But I do find it freshening that he does see ahead to the need for alternative forms of energy. And he does serve as a counterpoint.

Fred Schneider:
I think he, along with Carpenter, were the most thoughtful of the speakers. He seems to be a very open-minded individual, willing to admit the flaws that plague his field of interest; he, too, should be heard more. The nuclear proponents could use him more.

Nelson Wall:
I like people like Wall, who seem to be able to move ahead and adjust to new situations, which he must do. He has an open enough mind--from what I saw, anyway--to be willing to adapt to methods in mid-stream, when his first approach wasn't working. In other words, he seems to be the right man for the job he has.

Jay Weinstein:
Spread him out some more and get more practical work out of him.

Jon Johnston:
Johnston is generally on the mark and, I think, understands the press and the issue of the freedom of speech quite well; his assessment as to what is actually an infringement upon that freedom is fairly accurate.

Daryl Chubin:
He was a valuable resource person, but I wish he had been more than that.
I would say that if this seminar is held again, to bring them all back.

7. Textile Engineering:
   I've always wanted to see how thread is made and how it is then weaved into material. I was fascinated by the machines, even the dangerous ones.

   Nuclear reactor:
   Did not attend this because I was reluctant to be zapped with more radiation. I think a nuclear reactor can be better explained by using diagrams. However, there is something about actually being there and seeing the thing first hand. I've done that and didn't see a need to do it again.

   General Motors:
   This was a very worthwhile field trip. It provided more than one perspective of a highly technological world. The General Motors plant was certainly the most interesting of the three trips.

   I would say all three should continue to be included.

8. This is a difficult question to answer, for actually the seminar was of more value than I can express. It has certainly given me numerous ideas for stories, stories that I have already started to write. It has given me a foundation from which I can now make value judgements concerning technology and has made me conscious of the need to question any technology that comes, instead, as the press has too often done in the past, of merely jumping on the bandwagon of progress. Most important is the historical perspective I have gained from the seminar. All too often journalists lack this; as you've probably noticed, while reading the popular press, a lot of things seem to be happening for the first time. This is another reason I think the historians we read in this seminar should be getting out to the common man—that is to provide this perspective, to show that we've been here before. And maybe then we'll be more optimistic about getting back there so we can go ahead.

9. Yes, I would recommend this seminar to my colleagues—or to anyone else for that matter—if only they could attend.
SEMINAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

Both were excellent, generally. However, there was some overlapping that might have been avoided. The focus was important, particularly as a slight "different perspective" vehicle that I would have allocated a tad more time to contemporary technology influences.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

All around.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

Yes! In every way.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport: A would prefer to comment generally. Reading resources were as a whole of good quality, variety and diverse. However, I wish that technical and academic writers would use less stilted language.

Layton: Syntax and communication more simply and directly. Supplementary articles have better on their particular point. All of this material will be valuable reference sources for the future.

Rosenberg: 

Teich: 

Supplementary Articles:

5. What changes should be made to improve the reading materials if the seminar is offered again?
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology):

I am very impressed.

Bob McMath (Slavery and Technology):

I was very pleased with the quality of the faculty at Tech as represented by these speakers. Individual evaluation would probably reflect more personal bias than evaluation. Here

Tom Stelson (Solar Energy):

Fred Schneider (Nuclear Energy):

Jim Brittain (Communications):

the iconoclastics technique of some speakers - i.e. Stelson or even Monty

Nelson Wall (Appropriate Technology):

Jay Weinstein (American Technology and the Third World):

Jon Johnston (ACLU):

Darryl Chubin (Biomedical Ethics):
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering:

Nuclear Reactor:  

General Motors:

8. How much did you get from the seminar? How would you rate its overall value to you?

At first it was confusing with the true spirit of historical aspects, but towards the end it began to get fresh insights into contemporary issues from their historical perspective. Perspective is the key for me. It now shows a more integrated view of technology in relation to our future needs and ethical and political structures.

I also enjoyed the fringe benefits of the exchange of ideas and the clash of concepts. This is a valuable intellectual tool for heightened critical sense.
9. Would you recommend this seminar to a colleague?

Absolutely

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

(extra space)

A personal note: If you are motivated in a good cause or a small political revolution in this country - try ONE MAN, ONE VOTE - by Gene Gradman (BAKE/CANP. REFORM/HUMAN REVISED, ETC.)
SEMIMAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presenta-
tions. How clear and well-presented were they?

Presentation logical & clear. Some repetition in historical detail.
I believe the historical background should be condensed in favor
of more lecture/guest speakers/discussion on current problems.

2. Comment on the directors' helpfulness and general attitude
toward the seminar participants. How did the directors contribute
to or detract from your interest and enthusiasm for the program?

Excellent. Willingness to discuss, amplify on points & alter
program to meet specific information requirements.

3. To what extent did the seminar meet your expectations? Did the
descriptive material you received at the time of application accurately
reflect what actually transpired?

Course description accurate. As in #1 above, I would prefer
a stronger focus on current problems, within a historical
background.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport: Good articles; valuable.

Layton: Many useful.

Rosenberg: Many useful.

Teich: Good material.

Supplementary Articles: Loin - exceeded.

5. What changes should be made to improve the reading materials if the seminar is offered again?

I would favor more readings of an overview nature - environmental, political, social - rather than the readings which exactly parallel historical lectures.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology): Good presentation. Should be included.

Bob McMath (Slavery and Technology): Good economic history; might be condensed to lunch meeting.

Tom Stelson (Solar Energy): Good information source. Should be included.

Fred Schneider (Nuclear Energy): Excellent. Should be included.

Jim Brittain (Communications): I feel his talk should have focused on the implications of modern communications, rather than an essentially repetitive historical lecture.

Nelson Wall (Appropriate Technology):

Jay Weinstein (American Technology and the Third World):

Jon Johnston (ACLU): Excellent. Should be included.

Darryl Chubin (Biomedical Ethics): Excellent. Should be included.

(cover)
I think the speakers should include more examples of people who are completely opposed to journalists' general bias. Example: Davis. It is enlightening and refreshing to confront people hostile to the press and to our general mindset, and I think the seminar should foster this "confrontation education."

-- NM people are another good example -- suggest outside people like that could be incorporated.
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: minimal value. Suggest discounting.

Nuclear Reactor: Excellent.

General Motors: Pround.

8. How much did you get from the seminar? How would you rate its overall value to you?

Very valuable but hard to specify. Served as good resource base - very broadening in that regard (both historic and current tech). Limited specific application, but I did not expect that. Overall: excellent.
9. Would you recommend this seminar to a colleague?  Yes.

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

To repeat: I feel that for journalists, it would be advisable to focus on current issues and bring in current events & "experts" & condense the formal history portion.

The historical perspective is critical, but I believe it can be offered in a tighter form.
1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

Good content, well organized.
Presented with humor and enthusiasm.
Kept my interest.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

Sensitive to the dynamics of the group while making an effort to know each of us as an individual.
At times projected "den mother" attitude which was flattering and solicited concern for the welfare of each.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

Descriptive material was too brief to provide a clear picture of the seminar's structure. I really did not know what to expect. This posture made me a bit nervous before I arrived.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport:
A worthwhile review. Helped put some of my knowledge into a perspective. I didn't like reading on a compact screen, I understand what they're saying, but not necessarily agreeing.

Layton:
I didn't like physical design of book. Made to read because of pages & print.

Rosenberg:
It was dull at first, but either is improved or the writing died.

Teich:
I liked most of the selections. We'd look I had read before, still have a hard time understanding the point of view.

Supplementary Articles:
Especially good news reading Frederick Terman, as an introduction. The two distinct points of view set the tone for the seminar.

5. What changes should be made to improve the reading materials if the seminar is offered again?

I have not read enough in the field to offer a thoughtful opinion. Perhaps more recent periodical pieces would offer some improvement.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology):
Point of view which needs to be heard. Nice man but poor lecturer.

Bob McMath (Slavery and Technology):
Good lecture - animated, but so their regional approach necessary in this regard.

Tom Stelson (Solar Energy):
I was not impressed with his attitude.

Fred Schneider (Nuclear Energy):
Thoughtful, sensitive, intellectual approach.

Jim Brittain (Communications):
Too short. Would like to have gotten more into the effects of communication on values.

Nelson Wall (Appropriate Technology):
Highly interesting. Totally different approach than the intellectuals. Would edit slides - too many for our purposes.

Jay Weinstein (American Technology and the Third World):
Good lecture. Think about using him earlier in program. It might help in assessment.

Jon Johnston (ACLU):
Nothing new here for me.

Darryl Chubin (Biomedical Ethics):
Fascinating. Less time on books, more time for discussion.
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering:
okay, but was too long & too late in the day.

Nuclear Reactor:

a must.

General Motors:

Don't miss this one.

8. How much did you get from the seminar? How would you rate its overall value to you?
9. Would you recommend this seminar to a colleague?

Yes

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

More problem solving or part of a larger, more stimulating group interaction among them. Possibly would bring forth the diversity within the group. I thought we projected too much "sumexed."

Please advise students that dorm life is Spartan. They need to bring a big soap, towel (if they wish) and whatever else will make surroundings more pleasant for the 30 days. Advice of the heat and the rain. Recommended cotton as the coolest fabric. Also, that Atlanta is informal & dice clothing surely required, if at all.

Can't believe the time has passed. Thank you for this physically & mentally enriching experience. I take the forms back.
SEMINAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presentations. How clear and well-presented were they? Both organized their material clearly & concisely and presented it well. They came with a good sense of direction that gave the seminar a strong texture.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program? I expected a greater effort to seek out from each member of the group his or her particular goals. I was disappointed at that lack, but otherwise found the directors very responsive, offering several suggestions to help me expand my experience.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

Only one of my explicit expectations went relatively unmet: the discussion of the application of "appropriate technology" in the U.S. To some extent, this subject was an implicit part of Stan Carpenter's presentation & he focused on alternative energy sources, but I would have liked a more direct approach.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport:

Layton:

Rosenberg:

Teich:

Supplementary Articles:

5. What changes should be made to improve the reading materials if the seminar is offered again?

My only complaint about the reading is that some articles in the anthologies were dated; further developments deserve to be reported. I think Schumacher should be mandatory: at least "Buddhist Economics." It may be irrelevant in the future, but I missed a ranging apology for nuclear power.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology): Super. Keep him near the beginning. He offers a counterpoint which gives more richness to subsequent lectures.

Bob McMath (Slavery and Technology): Very good.

Tom Stelson (Solar Energy): Outrageous, but stimulating. Ask him to pare down his slide show.

Fred Schneider (Nuclear Energy): Very good. I'm sorry we missed his lecture.

Jim Brittain (Communications): Slightly redundant. He should be replaced with someone more prepared to consider the new directions in computer technology.

Nelson Wall (Appropriate Technology): Very good, except especially if he cuts down the slide show to necessary illustrations & concentrates on anecdotal approach.


Jon Johnston (ACLU):

Worthwhile

Darryl Chubin (Biomedical Ethics):

Worthwhile
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: Keep it, speed it up.

Nuclear Reactor: Keep it, find a substitute for Monte Davis

General Motors: Fascinating, just the way it is.

8. How much did you get from the seminar? How would you rate its overall value to you?

Of course the value - in the long run - will show in the effect of the seminar on my work. In the short run, I felt stimulated by virtually every session. Most of them offered suggestions for further inquiry beyond the assigned reading. This was my first trip out of the West - exciting on that score alone. I enjoyed the opportunity to meet so diverse a group & share professional concerns with them. It was exciting to be back in an academic atmosphere.
9. Would you recommend this seminar to a colleague? Yes, I would recommend it to others. On any paper and to a former colleague who now works in commercial TV. (And is a woman!)

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

I'd like to see more focus on the interaction between American technology & the rest of the world, and more on the development of computer technology. Perhaps the history could be tightened a bit (or an extended session or two added). It might be helpful at the outset to begin by asking participants their particular concerns, so they can spend more time developing their presentations.

But these changes aren't overwhelmingly important. The seminar was, for me, stimulating & exciting. I'm glad I came.

[Signature]
1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

Both done well in presenting the material.
I liked their flexibility, in letting the participants pick up and discuss points which may sometimes have seemed far from the path. We need some new juices, but I recognize that these dealing with our topic probably are too hard to find.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

Both were extremely helpful. The informal seminar approach enhanced the quality of the program, in my opinion. Both have a talent for presenting concepts and historical events in an interesting and yet factual manner; proving, I guess, that history does not have to be dull.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

Fully, yes.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport: I liked this volume. Most of the articles were concise, reasonably well written and they were informative. It was not difficult to read or understand.

Layton: useful, good support for topics discussed in the seminar. I would like to edit some authors —

Rosenberg: same

Teich: Generally ok. Some articles are out of date. Carroll on Participatory Democracy, for example. Well, however, brought it up to date afterwards.

Supplementary Articles: — provided some of the best reading.

5. What changes should be made to improve the reading materials if the seminar is offered again?

Some of the selections were at least 10 years old. While this does no harm to historical events or concepts, it is unsettling —in July, 1979—to read about coming events which, long since have come and gone. This is not to be taken as a serious criticism. I found the photocopy articles from recent magazines and journals to be particularly good.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology):
Both Stan and Tom Stelson hold views that may be considered “way out,” while they may be out of step with many others, it is good for journalists to hear extreme views and to be able to interview these persons.

Bob McMath (Slavery and Technology):
I believe they all were good and worth inviting again, despite Stelson’s narrow point of view.

Tom Stelson (Solar Energy):

Fred Schneider (Nuclear Energy):

Jim Brittain (Communications):
Interesting history, but I would have liked to have heard more about the effect of these technical changes.

Nelson Wall (Appropriate Technology):

Jay Weinstein (American Technology and the Third World):

Jon Johnston (ACLU):
He was a refreshing change of pace, with good comments about the press.

Darryl Chubin (Biomedical Ethics):
7. Comment on the value of the field trips. Which should be included in a future seminar?

    Textile Engineering:

    Nuclear Reactor:
        Absolutely. Most people have never seen any kind of a reactor.

    General Motors:
        Fascinating - please do it again. More time would be good to see more of the assembly line because it represented so much of what we had discussed.

8. How much did you get from the seminar? How would you rate its overall value to you?

    It was well worth the time and the sweat. I have spent so much time writing about nuclear power, roads, bridges and buses that I had lost perspective. The seminar helped me find that perspective and to put events in a proper context. It will help me in reporting about technological events; it should help me be more sensitive in interviewing, assembling information, etc. At the moment I cannot make a list of how I have benefited - but I hope.

Frankly, one of the best aspects was getting far away from my office and to distractions in this kind of work. Talking with the other seminars - for long hours in several evenings - also was good to me.
9. Would you recommend this seminar to a colleague?

Yes. I already have.

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).
1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

Both Dr. Grebel's and Dr. Kravitz's were exciting presenters whose lectures were clear, coherent and systematic. History became alive and personalized (historical figures and events were humanized, not anonymized) and placed meaningfully in context. It was enjoyable, as well as informative to attend each day's presentation.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

Though the directors could have been more responsive and the collective professional needed the participants, their attitude was generally helpful and genuine enthusiasm. Sometimes the directors (e.g., Dr. Kravitz) spent too much time on examples or background to make a point, which, within this enthusiasm and interest in the subject matter, compensated for the over-drawn background material.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

The material received prior to the start of the seminar was an approximately accurate description of what actually transpired. In that sense, the seminar met my expectations. However, I had hoped the seminars would have spent more time on current technical problem-solving, rather than on the relatively (relative within the 4-week time period) comprehensive historical perspective. Because of that perspective, I gained less than I anticipated.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport:
Good source book

Layton:
Not so good

Rosenberg:
Good

Teich:
Could have been more interesting

Supplementary Articles:
Very useful and more up-to-date than many of the book articles

5. What changes should be made to improve the reading materials if the seminar is offered again?

Since exploration of "alternative" authors (e.g., Stewart Brand, Ayn Rand, Carl Sagan, Isaac Asimov, etc.) would make for more immediate relevance of the technological area which journalists must report on daily. Authors like Rand, et al. would lend a "popular" balance to the readings so prevalent in current readings.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology):

Bob McMath (Slavery and Technology):

Tom Stelson (Solar Energy):

Fred Schneider (Nuclear Energy):

Jim Brittain (Communications):

Nelson Wall (Appropriate Technology):

Jay Weinstein (American Technology and the Third World):

Jon Johnston (ACLU):

Darryl Chubin (Biomedical Ethics):
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: not really necessary - certainly not nearly as helpful as the one we experienced.

Nuclear Reactor: I didn't attend this one.

General Motors: Great — an eye-opener both in terms of the immense complexity of the operation as well as the manner simplicity of the executives & management officials we spoke with.

8. How much did you get from the seminar? How would you rate its overall value to you?

The seminar was valuable in terms of reinforcing my perspective on the way things work in this country — it solidified my impression of an elite — which technology is further ahead (i.e., quicker progress) with little regard for the consequences to society — it is clear that the system is the message, despite all the talk about the democratization of technology. Thus the seminar was of value in supporting my interpretations of events and my reporting of them as news to my readers. On the other hand I learned little that was concrete — other than, of course, specific facts, which may or may not turn out to be useful in my job. The concepts & perspectives were generally not new to me, nor was the dissecting of them in class.
9. Would you recommend this seminar to a colleague?

Yes—with the concerns expressed above.

10. Additional Comments — any other ways that you feel that the seminar could be improved (use back if necessary).

More current material had been spent on the historical perspective.

Also, the lecturers, if they are to be combined as a group, training should be held elsewhere—or in a variety of settings. The present set-up was too formal to be held and the food got tiresome.

Bob Klein
SEMINAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

I appreciated the way humor was interplayed with the presentation of facts, opinions and ideas. The balance struck by the two directors helped keep the discussion on an even keel.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

Very helpful — they couldn't have done a better job in this category.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

More than I expected. I came here to learn and try to understand the technological interpretation of history. In addition to coming away with an understanding of technological effects — I have made lasting friends and enjoyed interacting with persons from all over the country.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

Kranzberg and Davenport: Fine set of thought-provoking articles.

Layton: The articles were well written and useful in the accumulation of information.

Rosenberg: I found this one boring, but necessary. I suppose.

Teich:

Supplementary Articles: Beneficial

5. What changes should be made to improve the reading materials if the seminar is offered again?

I do not feel qualified to give an answer. I do not know what kind of reading material is available other than that which was presented and assigned.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology): Seemed to be too low-key but he was quite informative.

Bob McMath (Slavery and Technology): Offered some well thought ideas. Did not say enough about Texas during the Civil War and Reconstruction. I have read two books on Reconstruction and I think he could do something about that. Texas and Reconstruction.

Tom Stelson (Solar Energy): Should be banned to the Arctic Region.

Fred Schneider (Nuclear Energy): And was seen him.

Jim Brittain (Communications): Very soft spoken.

Nelson Wall (Appropriate Technology): I'm sure he is an honest and hard worker. He reminded me of a fast talking skater.

Jay Weinstein (American Technology and the Third World): Comes across as a real intellectual. Says a lot but doesn't really say anything. However, he is cognizant of that - it is the nature of his field.

Jon Johnston (ACLU): Messed.

Darryl Chubin (Biomedical Ethics): Ditto.
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: Very interesting especially with the student tour guides.

Nuclear Reactor: The people were much more presenting than the plant.

General Motors: Great! Gave me a new insight into what is good for General Motors is good for the country!

8. How much did you get from the seminar? How would you rate its overall value to you?

It was a worthwhile experience. The focus of the seminar gave me a new view of history I had never given much thought to before. It was a relaxing time. The conversations in the dorm (brought on by questions raised in class) were stimulating. The people on the seminar were for the most part great. I enjoyed meeting them and I made a couple or three really good friends.
9. Would you recommend this seminar to a colleague?

Yes, I already have.

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).
SEMINAR EVALUATION

MACHINE-MADE AMERICA: TECHNOLOGY AND DEMOCRATIC IDEALS

1. Comment on the style and content of the directors' presentations. How clear and well-presented were they?

   The presentations were good and well thought out. I would have preferred, though, more lectures from Giebelhaus, and a short discussion time at the end of each lecture.

2. Comment on the directors' helpfulness and general attitude toward the seminar participants. How did the directors contribute to or detract from your interest and enthusiasm for the program?

   The directors were always available when needed, & their enthusiasm for the topic generated an enthusiasm that was not always inherently there (for me). They complemented each other well.

3. To what extent did the seminar meet your expectations? Did the descriptive material you received at the time of application accurately reflect what actually transpired?

   I had thought the seminar would be more discussion of present day problems and less a historical perspective. The first material received could have made greater mention of the seminar as a history of man and technology.
4. Comment on the quality, quantity, difficulty, and usefulness of the reading materials.

   Kranzberg and Davenport:  Good for historical background—smooth to read.

   Layton:  I found this one most enjoyable—not necessarily because the information was better, but the writing was.

   Rosenberg:  Dry—best read in one sitting; chopped apart it is hard to follow.

   Teich:  This was best in approaching present problems—though it, too, in places tended to be academic in the worst use of that word (I.e. article or technology assessment).

   Supplementary Articles:  On the whole I liked these better than books, if only because they were more directly related to lectures.

5. What changes should be made to improve the reading materials if the seminar is offered again?

   1. If it is at all possible to suggest participants get & start reading books prior to program, that would help.

   2. Include more journalistic/essay reactions to present problems—include more outsiders (i.e. Tom Wolfe, Michael Rogers, etc.) and fewer professors.

   3. More specifically relate lectures to the readings—pull things from readings for discussion.
6. Comment on the quality of the guest speakers (both in class and for supplementary lunchtime meetings). If we give the seminar again, which speakers should be invited to participate?

Stan Carpenter (Alternative Technology):

*Good - return*

Bob McMath (Slavery and Technology):

*Good*

Tom Stelson (Solar Energy):

*Knows his subject, but a more valid solar advocate might generate more discussion.*

Fred Schneider (Nuclear Energy):

*Good, in that he stimulated discussion.*

Jim Brittain (Communications):

*Not very good - too much easy history, not enough comment on effect.*

Nelson Wall (Appropriate Technology):

*Very Good*

Jay Weinstein (American Technology and the Third World):

*Good in tandem with Wall*

Jon Johnston (ACLU):

*Interesting man, but not much to say about technology.*

Darryl Chubin (Biomedical Ethics):

*Okay if he talks about ethics, & doesn't just distribute reading list.*
7. Comment on the value of the field trips. Which should be included in a future seminar?

Textile Engineering: should be included—through a visit to a real working mill would be better.

Nuclear Reactor: very worthwhile—continue

General Motors: didn't go.

8. How much did you get from the seminar? How would you rate its overall value to you?

I did not expect much from the seminar when I signed up. I saw it basically as an interesting 4 week vacation. To my surprise I ended up getting a great deal from it—not just from lectures, but interaction with other participants. I picked up a lot of specific information, but more than that. I picked up a different way of looking at technology. I can no longer view it as an object, but as part of a continuing process. So I'm thinking about how machines affect man (and vice versa) more.
9. Would you recommend this seminar to a colleague?

Yes - in fact I am.

10. Additional Comments - any other ways that you feel that the seminar could be improved (use back if necessary).

- The readings to lectures more
- Open up (or encourage use of) more time for discussion.
- Try to get some reading out of the way before the seminar starts.
- Include more about the present day - maybe follow mode of identifying present day problem first, then tracing backwards its historical development (ala "Connections"),