

UNIV  
SHELF

CQWL

"Employee Participation in Socio-  
Technical Work System Design:  
A White Collar Example"

(CQWL-WP-76-6)

CENTER FOR QUALITY OF WORKING LIFE,  
Institute of Industrial Relations *(Los Angeles)*  
University of California,  
Los Angeles, 90024  
(213) 825-8862, 63

INSTITUTE OF INDUSTRIAL  
RELATIONS LIBRARY

JUN 22 1978

UNIVERSITY OF CALIFORNIA  
BERKELEY

**"Employee Participation in Socio-  
Technical Work System Design:  
A White Collar Example"**

**James C. Taylor .**

**Presented at 36th Annual Meeting  
Academy of Management  
Kansas City, August 11-14, 1976.**

**Center For Quality of Working Life  
Institute Of Industrial Relations  
University of California  
Los Angeles, CA 90024**

**Copyright 1976 by  
James C. Taylor  
All Rights Reserved**

Copyright 1976, James C. Taylor

"Employee Participation in Socio-Technical Work System Design:

A White Collar Example"

by

James C. Taylor

Graduate School of Management  
UCLA

Introduction

Socio-Technical Systems (STS) analysis and design has progressed from the initial attempts in English coal mines and Indian weaving sheds during the 1950s to a rather systematic design approach described and successfully applied in Norway, Britain and the U.S. through the 1960s and 1970s. Socio-technical analysis has been used as an aid to enhancing quality of working life while improving organizational effectiveness. Well over 100 studies reported over the past 25 years can be classified as using some, if not all aspects of STS (Taylor, 1975a). Although many are less systematic in their approach, an increasing number of these studies are following a prescribed pattern of analysis and design steps. As the analytic approach has become more programmed, a tendency has emerged for managers, social scientists, and system designers to occupy the actual design roles while non-supervisory employees are introduced to this completed system design in order to implement it. This version of the STS approach is in marked contrast to the participative models of enhancing quality of working life, in which workers are initially invited to redesign the work place by applying their complaints and ideas in a constructive fashion. Both approaches--STS design, and "participative brainstorming"--have advantages,

but, more important, they are essentially complementary. The present paper will describe a participative application of the programmed STS approach in a white collar setting using as members of the design team the manager, a supervisor, and two clerical employees from the client department. The process of analysis and design, as it differs from the more typical case, will be described. The resultant design will be presented and initial implementation experience discussed.

### Background

STS studies have a remarkably consistent reputation for improving the quality of working life of the employees for whom they are designed, as well as improving organizational performance. One reason for this may be merely the documentation of only the "successful" experiments. More likely, however, is the fact that these studies have resulted in more of what has been called work place democracy (Gulowesen, 1972), including dramatic changes in organizational structure, job descriptions, and in personnel rules, as well as involving at least some degree of employee participation in the overall process of the change itself.

Such changes toward work place democracy usually result in work designs in which employees are in control of the range of technological variables of concern to their production process, and in which they are free to decide on their methods of working and work leadership as it suits their wants and needs. In such a system, management activities shift from supervision of the work place toward planning and coordinating the work of a group of employees with the rest of the organization.

Usually, in the past, sociotechnical analysis and design of existing organizational work systems has been conducted by a group of people who included both members of the organization and outside "experts" (Hill, 1971, pp. 123-130; Engelstad, 1972). This sort of insider-outsider relationship in analysis and

design was intended to be consistent with the action research model originally proposed by Kurt Lewin (1946); and also consistent with the fact that in the short time usually allotted, outsiders could not hope to know enough about the technology to adequately portray it for use in STS analysis. During the 1960s and earlier these mixed teams were composed of "insiders" who were frequently managers or engineers, and of outside social science "experts" who played a reasonably active role in the process. At this same time, the STS analytic approach became more programmed as more social scientists and engineers became interested and joined with the few initial developers (e.g., Davis and Engelstad, 1966). Their intent with this more formalized method was to have a more communicable approach, and to be more consistent with their application. Groups of internal managers and external experts could generate a redesign plan for a work system (typically a continuous process or other blue collar system) which was intended to be specific enough to permit top management to knowingly approve it, yet general enough to permit the employees who were to work under it adequate flexibility in implementation (Van Beinum, 1968).

With the normal evolution and proliferation of such ideas we currently note an increasing rate of new STS studies of organizational change and design and a continuation of the trend toward programmatic analysis. As the number of cases has increased, so has the kind of organization and technical types undertaken for study. These two evolutionary changes have separately brought us to the point where today STS is being applied in white collar and blue collar systems, in service and administrative technologies, and at managerial and professional levels within organizations.

The number of outside social science "experts", although increasing, has not kept pace with the number of new applications. Currently much of the analysis and design is under the control of the inside members of a given design team. In

addition, a number of forces have recently converged toward increasing the involvement of non-management operational employees earlier in the analytic and design process.

Over the last 10 years, younger employees, as well as women and minorities, have become more inclined to question the judgment of superiors and to take an active role in controlling their own work lives. These forces, coupled with public policy exhortations to give employees more of a voice (c.f., Work in America, 1973) have resulted in (among other things) non-management employees being invited to join the sociotechnical analysis process earlier in the process and in greater numbers. Most current examples of this approach include workers being invited to redesign their work place by applying their complaints and ideas in a constructive if not necessarily systematic fashion (c.f., Hepworth and Osbaldeston, 1975, pp. 17-21).

The effects of this gradual change toward more employee participation in design are beginning to have wide implications for enhancing the power of the sociotechnical approach in improving quality of working life. Involvement of at least some of the nonsupervisory members of the work system in analyzing the technical system suggests that subsequent memory of what production requirements lay behind some initial design features should improve the ability of that group to make and to understand additional changes and adjustments later in the life of the system. This built-in capacity for self-regulation and flexibility provides considerable long-range advantages where the environment is not static (c.f., Miller, 1975). Secondly, when employees and management control the process of measuring perceptions and attitudes of the people within the system, two serious measurement flaws are overcome. First, employees in using the "language of work" (Meissner, 1976) assure themselves (and us) of more accurately measuring true feelings, as opposed to exclusive dependence on responses to fixed categories

for questions written by social scientists. The importance of this in initial assessments of the system to be changed or redesigned should not be underrated. Second, measures conceived and used by members of the systems under investigation provide, in themselves, elements reinforcing and rewarding members to continue to increase their application of the new design. The problems inherent in trying to make sense of general objective survey questions for feedback to specific work setting is thus overcome by having people at the site itself decide what measures would best reflect satisfactory progress or success with the new design.

#### The Case

The present paper will describe a recent STS design which contains some elements of all the forces described above. It involves application of the programmed STS approach in a semi-professional white collar setting, in which insiders (including the manager, supervisor and two employees) took the responsibility for analysis and redesign of their work system. In reality this meant that the two nonmanagement employees participated fully in the "technical analysis" phase of the STS process' as well as being primarily responsible for the data collection process in the "social system analysis," including measuring attitudes and feelings of their co-workers.

The initial opportunity for this case came up within a larger demonstration study undertaken in the administrative offices of a large white collar service organization. The overall program, once approved by corporate management, had begun with the presentation of STS concepts to the management of four different departments in company headquarters. These departments had been selected by corporate top management as having reputations for being particularly innovative, as well as being reasonably representative of the type of work done in the administrative offices. The four department managers, with outside

guidance from L. E. Davis and J.C. Taylor were given the mandate to see that the STS programmatic approach be applied to their departments, or to some section within them. They were generally free to use the STS approach within its formalized constraints (Taylor, 1975b) toward any intradepartmental problem they saw fit.

One of the four managers (let us call him "Manager A") had decided early to apply the STS ideas to one of his three major sections (employing some 12 semiprofessional authorizers, two typists and two assistant supervisors; henceforth called the "Authorizers Section"). He invited several nonsupervisory employees from that section as well as the section supervisor to the initial training meetings we conducted for all four departments. Following the STS training sessions provided by Davis and Taylor, Taylor met with the group selected by Manager A as the "Department A" team. This group was expected to test the applicability of STS analysis and design in that part of the administrative offices.

As a demonstration project, the overall purpose was primarily to test applicability and feasibility of a large scale utilization and diffusion project, rather than to solve particular problems within the four departments chosen. Thus, Department A, the design team, met separately for the first time with something less than a clear focus. Although the company as a whole admitted to an absenteeism problem (like others in their industry), the design team was also unclear about the specific purpose for their existence, apart from experimenting with redesigning work systems to improve productivity, reduce absenteeism and to enhance the quality of working life for those involved.

None of the department managers were given much extra time to devote to STS analysis and were forced to undertake it within their normal workload. Department A was particularly busy with seasonal work at the time the project began, and undertook design team meetings of about an hour at a time no more



frequently than twice a month for the first two months. This put the programs of Department A somewhat behind the other three demonstration departments. As events were to show however, this slower pace allowed the time necessary for the nonsupervisory members of the design team to develop their confidence in their role in the process; this might not otherwise have occurred.

#### Technical Analysis

In spite of this slow start, however, the design team had begun the process of technical analysis of the Authorizers section as specified in the programmatic STS approach (e.g., Hill, 1971; Engelstad, 1972; Taylor, 1975b). There were ample signs that the supervisor and two employees involved were interested in the perspective gained by separating the technical system concepts from the other elements in the section. At this early stage, the two nonmanagement employees on the team were clearly following directions of the manager and the outside "expert," and had little real involvement in the process. Gradually, Manager A and the outside expert urged the remainder of the team to take on more initiative; the two employees and the supervisor took the lead and completed the technical analysis. The specific results of that analysis undertaken from late February to early July 1975, are included as Appendix A. In summary, the process was first broken down into four basic operations ("unit operations," Appendix A-1). These operations were examined one at a time to identify controllable variations in the process; some 96 such "variances" were listed ("Matrix of Variances," Appendix A-2). These variances in turn were evaluated to choose the most important or "key" variances among them. Nineteen key variances were thus identified, and were in turn examined to determine the manner in which they were presently controlled by the system ("Table of Variance Control," Appendix A-3). This process of initially diverging and

then subsequently converging on the identification of the crucial technical system requirements finally resulted in the recognition of the following four key technical issues in the Authorizers Section:

1. Relative inaccessability of company record files
2. Lateness and/or urgency of information passed to and from other departments
3. Diversity of internal processes creating unnecessary effort in subsequent internal operations
4. Wide variation in trained competence of staff

The members of the design team agreed that any design proposed for their section must address the adequate control of these four issues. Variances "1" and "2" involve aspects of the technical system which cross department boundaries. However, it was in the nature of the management mandate that changes should not go beyond the department boundaries during this demonstration phase of the project. Although some concerns about this were raised at the time, it was felt that variances "1" and "2" were so crucial to proper operation of the Authorizers Section that some way of influencing interdepartmental variables should be attempted, and that the sociotechnical design of the work system should include cross-department aspects if necessary.

Social system analysis. In accordance with the usual STS programmatic approach, the design team in Department A (and in the other departments) were guided into considering a social system analysis of the section. This guidance took the form of an introduction to the importance of role behaviors in controlling technical requirements, and a description for measuring those roles. This took place in March 1975. Coincident with this guidance was the administration by Davis and Taylor of a standardized and anonymously completed paper-and-pencil survey of organizational behaviors such as leadership styles, decision making activities, sharing of influence and control, job activities,

motivation and satisfaction (The Survey of Organizations, Taylor and Bowers, 1972).

This survey of all employees in all the demonstration departments was intended as a quantifiable base-line measure of each of the four departments, to be compared with similar data collected after those units had considered redesign and instituted some changes. It was also felt that these survey data could and might be used as supplementary information in a discussion analyzing the social system. It must be noted, however, that these survey data were not intended either as the primary or the only source of information about the departments to be used by the design teams.

The design team in Department A (as in the other departments) was advised to obtain information from the employees in the Authorizers Section (the unit under analysis) by some reasonably shortened interview method. Since it was assumed in each department that employees would hesitate being candid in answering questions from their supervisors and managers acting as interviewers, corporate staff people volunteered to act as interviewers.

These interviews were undertaken within each department during April and May, 1975. By the time they were completed and the reports were prepared by the interviewers and presented to the relevant design teams, the data from the standardized survey questionnaire had also been tabulated by department and section, and had been returned to the manager for possible use. In all cases the managers released the survey data to their design teams, where comparisons were quickly attempted between them and the interview data.

Initial difficulties in comparing the quantified tabulations from the very specific survey questions with the more qualitative reports of the interviews were overcome, and the comparison resulted in a better understanding by the design team of the meaning of both data sources. In Department A,

however, several other events combined to make this comparison of results only the beginning of the social system analysis rather than its conclusion.

The design team in Department A was working with their technical analysis at the time the standardized questionnaire was administered to all employees in the four departments. This team was meeting once a week for about an hour. They were still engaged in the technical analysis when the two interviewers from the Personnel and Management Systems Departments completed their sessions with Department A's employees, and submitted their report to the design team. During this time the nonsupervisory employees on the design team had heard from their work mates that there were mild reservations and uncertainties about whether the questionnaire had covered all the things which were important and problematic to them. Employees felt constrained by fixed alternative answers which did not capture exactly what they wanted to say. Employees' responses to the interviews were even less critical, so far as any mention made would reveal.

The strategy taken by the design team was to set the social system data aside until the major issues of the technical analysis had been dealt with. As it turned out, this did not occur until early August. Some informal discussions of the results, and employee response to them did, of course, take place prior to that time, and the design team members had the opportunity to think about the results of the interview and the questionnaire during the interim.

In August the design team undertook a closer scrutiny of the interview data and the questionnaire results. The questionnaire and interview format used are included here as Appendices B and C, respectively.

The interviews highlighted that employees in the Authorizers Section were well satisfied with the friendly atmosphere in their section and in the department; they felt they had good jobs in terms of variety and freedom to plan, and

they reported that they felt secure in their jobs. Many contacts with others outside their department were reported for this section. Things reported as needing improvement included: increasing of learning opportunities, improving opportunities for advancement, and increasing respect from other departments.

The questionnaire data were much more comprehensive. A summary was prepared, comparing individual department and section responses to certain job-related aspects with the total responses for the company. Each manager received a comparison of his department with the total.

In the case of Department A, this summary tends to confirm the interview results. In brief, responses to questions dealing with "job variety" were high, as were answers to "freedom to plan work." Questions dealing with "opportunities for growth and learning on the job" and "opportunities to advance" revealed some discouragement when responses in Department A were compared with those of the other departments taken together. Finally, questions dealing with "responses from others" were answered both more and less positively than the rest of the company. In particular, the "work group" was reported as "being friendly and easy to get along with," while at the same time "people you work with" were reported as "rejecting and not giving recognition for good work."

The discussions among the design team members around these findings, and those from the interviews resulted in the following conclusions: 1) that, although employees were satisfied with their work, they had to move out of the department to advance; 2) that they felt frustrated at obtaining needed resources and information from other departments; that the good relations within their section and departments were not crucial, because they didn't have to work closely together. Where good relations did matter (and didn't occur) was with other departments (because of much contact and need for cooperation). The interpretation was that the work group felt left-out as a service section, and did

not feel they knew what the department was there to do.

Discussing the findings from the interviews and questionnaires was useful, and the conclusions drawn were internally consistent. In spite of the favorable comparison between the standardized questionnaire and the interviews done by company staff personnel, the two nonmanagement members of the design team felt that it was not really enough to validate the data from either source with each other, and that another measurement of their own design was necessary. In particular, these members of the design team, mindful of the reservations of employees in the Authorizers Section regarding the questionnaire, were willing to extend the social system analysis even further. This extension, it was argued, would be used to obtain more direct information from employees about the issues raised in discussions of the results to that date. Within three weeks (they were still meeting no more than an hour per week) the nonsupervisory members of the design team had developed eight open-ended questions for distribution to the members of the work section (this survey form is included as Appendix D). These eight questions dealt with the "work role" and employees' reactions to it.

The members of the Authorizers Section were assembled in a meeting to distribute the list of eight questions composed by the two nonsupervisory members of the design team (who were also members of the section). This meeting was held away from the office in another part of the building. Of the 17 total members of the section, 12 had never been directly involved with the STS process, apart from meeting the two staff department interviewers and hearing the UCLA representative during the administration of the standardized questionnaire. The members of the section were given a brief review of the project to date, and the questions were explained and distributed. Employees were asked to return their answers in writing within 24 hours. The original intent of the review

portion of the meeting was for one of the employees on the design team to summarize the results of the interviews and the subsequent analysis.

As it turned out, the discussion began and ended with a summary of the technical analysis. The accidental effect was to introduce very little information which could have "led" the employees to bias their written answers to the questions they were given. The outcome of the meeting, as reported by the design team, was that "the section became very interested in the STS design project, and hopeful that it would have an important impact."

Some employees felt they needed more time to think about the job and possible improvements. This was reflected by the fact that only ten of the 15 employees responded with written answers to the questions by the next day. Some employees not only wanted more time; they wanted to get together for a "brainstorming session" without either management or the design team members present. This was agreed to and arranged. The meeting was held a week later and notes were circulated.

General conclusions were quite consistent with the measurement already undertaken. Tables 1 to 6 present the comparison among the three measurement techniques: the employees' own survey, the staff interviews of that section, and the standardized questionnaire results for that section.

Table 1 provides a summary of the three methods across five particular areas or aspects of the work system relevant for the particular design. These five areas include "Training," "Job Characteristics," "Feelings of Responsibility," "Social Relationships," and "Promotional Opportunities." Not all elements of each area are represented in the results of each measurement technique. This shows only that each method collected some data elements which the other two did not. The five general areas chosen for presentation here were those found to be of most concern to employees as reported in their own responses

TABLE 1  
COMPARISON OF THE RESULTS OF THREE DATA COLLECTION TECHNIQUES  
Summary Table

ASPECTS OF THE WORK AND SOCIAL SYSTEM	RESULTS		
	Employees' Own Survey (8-20-75)	Interview (5-15-75)	Question- naire Survey (3-14-75)
I. TRAINING			
a <sub>1</sub> Formal trng. for new employees:	Needed	Needed	No counter evidence
a <sub>2</sub> Formal trng. for experienced employees:	Needed	Needed	0
b Supervisor as trainer:	Should be	Someone should be in charge.	Average, but could be better.
c Information is disseminated by "word of mouth":	0	Yes	Confirmed
II. JOB CHARACTERISTICS			
a <sub>1</sub> Variety:	0	Much	Adequate
a <sub>2</sub> Challenge:	0	Less	Low
b <sub>2</sub> Work Load:	Heavy	Confirmed	0
c Work as an individual activity:	Yes	Confirmed	No special demand for cooperation.
d Meaningful work:	0	Yes	Average for company
III. RESPONSIBILITY			
a As individuals:			
1-because of effects on others:	Strong yes	0	Average for company.
2-in spite of work checking:	Yes	0	Much checking by computer.
3-responsible for much, but not enough authority:	0	Yes	Confirmed
b As a department (especially regarding quantity):	0	Some uncertainty	Average for company.
IV. RELATIONSHIPS			
a Within the section: 1-Friendliness:	Yes	Confirmed	Confirmed
2-Effectiveness:	Group work not too relevant.	Good	Average for company.
b With other sections and depts.			
1-Coordination:	Necessary	Much	High for Co.
2-Files Accessibility:	Poor	Confirmed	0
3-Friends:	0	Outside the dept.	0
4-Status and respect:	Needed	Low	Confirmed
V. PROMOTIONAL OPPORTUNITY			
Dead-end jobs:	Strong yes	Confirmed	Strongly confirmed

0=no relevant data



to the eight questions posed to them by the nonmanagement members of the design team.

Tables 2-6 present the particular findings within each of the five general areas or aspects for all three measurement techniques.\* The major discrepancies among the three methods occur between the standardized questionnaire and the other two; these are primarily cases of trying to interpret questionnaire items in specific areas they were not designed to directly measure. For example, in the area of "Formal Training" (Table 2; 1a1, a2) both the employees' own survey and the interviewers reported that much more formal training was needed in new hires and in continuation training. The questionnaire, on the other hand shows somewhat more informal methods of training new employees is reported as done in the Authorizers Section than in the four departments taken together (Table 2; Q 141). Although this is consistent with the general finding that informal methods are frequently used, it does not confirm or deny that employees want more formal training as well. There are other examples of this specific interpretation of questionnaire results where those results are merely suggestive of confirmation of the other results: attitudes towards job variety (Table 3, IIa, Q95); towards other expectations of employee responsibility (Table 4; IIb, Q91); and towards the effectiveness of adapting to the pressures and constraints from other departments (Table 5; IVb1, Q8, Q93). All are examples of suggestive rather than confirmatory questionnaire results, because the specific questionnaire items were not originally designed to measure the particular phenomenon under scrutiny. Discrepancies between the interviews and the other two methods are also minor, and probably result from emphasizing some comments more than others in the

---

\*For comparison purposes questionnaire data for the total of all four departments are presented in Tables 2-6, although few of the differences between Section A and the rest are statistically significant.

TABLE 2  
COMPARISON OF SPECIFIC RESULTS AMONG THREE  
DATA COLLECTION TECHNIQUES.  
I. TRAINING

Employees' Own Survey

- a. "Teaching and learning are part of our job, but we want more formal training activities, more standard patterns to use in training, and regular times for training."
  - 1. for training new employees
  - 2. for updating more experienced employees either with legislative changes or more complex cases.
- b. "Training should be the job of the supervisor"

Interviews by Staff Personnel

- a1. "Training of new employees is handled in very unstructured manner"
- a2. "Not being informed of new laws and regulations affecting their work is a problem"
- b. "Someone who knows how to train should be in charge. Being a senior person should not be the only qualification."
- c. "The only system for disseminating information is by word of mouth"

Standardized Questionnaire Survey

(Five-point scale.)

(Higher score = Greater Extent)

		AVERAGE SCORES	
		"Authorizers Section", Dept. A (n = 12)	All four Depts.  (N = 123)
a1.	Work group helps new employees learn the job (Q141)	3.67	3.48
b.	Supervisor shows how to improve (Q35)	3.08	3.11
	How I would like it to be (Q36)	3.50	4.12
	Supervisor helps plan ahead (Q37)	3.17	3.14
	How I would like it to be (Q38)	3.75	4.07
c.	Supervisor encourages idea xchg. (Q43)	4.08	3.11
	How I would like it to be (Q44)	4.27	4.21
	Work group members keep others informed (Q82)	3.58	3.50
	Work group members xchg. opinions and ideas (Q77)	3.50	3.17
	How I would like it to be (Q78)	4.33	4.13
d.	<u>Other training related issues</u>		
	Work group gives ideas for doing a better job (Q71)	2.92	2.82
	How I would like it to be (Q72)	3.75	4.04
	I am referred from person to person when seeking help (Q101)	3.17	2.96
	Importance for having no unexplained rules (Q108)	4.17	3.93
	Importance of acquiring training for getting ahead (Q133)	3.92	3.91
	Opportunities for feedback on Job Performance (Q94)	2.83	3.08
	Job opportunities to learn new skills (Q98)	2.67	2.97
	Importance for learning new skills (Q104)	4.25	4.28
	Workgroup helps plan ahead (Q69)	2.58	2.89
	How I would like to be (Q70)	3.83	4.00

TABLE 3 -  
COMPARISON OF SPECIFIC RESULTS AMONG THREE  
DATA COLLECTION TECHNIQUES  
II. JOB CHARACTERISTICS

Employees' Own Survey

- a. "Running routine errands is time ill spent for everyone, typists and authorizers alike."
- b. "Work load is too high--and service suffers."
- c. "Work is very individual--authorizers take pride in their working through a whole case."

(There is a general feeling that the job is already quite a good one)

Interviews by Staff Personnel

- a. "The work has variety and challenge, but less of the latter than the former."
- b. "The work load is heavy, but they like being busy"
- c. "There is a good amount of self-management, they are free to plan their work day."
- d. "The work is meaningful."

Standardized Questionnaire Survey

(Five-point scale.)

(Higher score = Greater Extent)

	AVERAGE SCORES	
	"Authorizers Section," Dept. A (N = 12)	All four Departments (N = 123)
a. Variety in the job (Q95)	3.67	3.63
Job uses my skills (Q100)	2.58	2.98
I expect challenging work (Q127)	3.17	3.07
b. Job requires close work with others (Q117)	3.17	3.28
Job requires cooperative work with others (Q120)	3.75	3.89
Job permits doing a whole piece of work (Q97)	3.92	3.63
c. Job results are significant for the outside community (Q119)	3.17	3.19

TABLE 4  
COMPARISONS OF SPECIFIC RESULTS AMONG  
THREE DATA COLLECTION TECHNIQUES  
III. RESPONSIBILITY

Employees' Own Survey

- a1. "It's important to do the jobs right the first time, because of the effects of the work on others.
- a2. "Some of the work should continue to be checked by others, but blanket policies for checking work should be eliminated."

Interviews by Staff Personnel

- a3. "They are given responsibility for many things, but are not given the necessary authority or resources to properly complete an assignment."
- b. "Most are unsure exactly what they were responsible for, especially with regard to the amount of work expected."

Standardized Questionnaire Survey

(Five-point scale.)

(Higher score = Greater Extent)

	AVERAGE SCORES	
	"Authorizers Section," Dept. A (n = 12)	All four Departments (n = 123)
a1. Quality of work done affects others (Q121)	4.25	4.16
a2. Feedback from checking own work (Q137a)	3.67	3.84
Feedback by more experienced people (Q137b)	3.08	2.87
Feedback by my supervisor checking (Q137c)	2.25	2.34
Feedback from the computer (Q137d)	2.50	1.91
I don't get feedback on my work (Q137e)	1.67	1.84
a3. Job lets me make choices and decisions (Q142)	2.83	3.21
Levels of decision making are optimal (Q21)	3.17	3.02
Freedom in the job (Q96)	3.33	2.81
b. Conflicting job expectations (Q92)	3.75	3.34
Work group members know their jobs (Q81)	4.00	3.68
Other's expectations are clear (Q91)	3.92	3.66

TABLE 5  
COMPARISON OF SPECIFIC RESULTS AMONG  
THREE DATA COLLECTION TECHNIQUES.  
IV. SOCIAL RELATIONSHIPS

Employees' Own Survey

- a1. "Our relationships within the section are very congenial."
- a2. "Sometimes group effort, and shared problems are the best way, but they are not always necessary."
- b1. "Coordination with other departments and sections is necessary, but may be better handled by others."  
"A heavy work load causes poor service and the resulting negative feedback is demoralizing."
- b2. "Much time is spent with the Files Department in trying to get files."  
(general interest in trying to leave a 'positive impression')

Interviews by Staff Personnel

- a1. "All were pleased with the social climate within the section and felt the whole department was friendly."
- a2. "Good sharing and cooperation within the department, but they felt communications (e.g., meetings) need improvement."
- b1. "Lots of contact with others--in person and by phone."  
"Unrealistic priorities are set by others outside the department."  
"Getting information from other departments and sections is a problem."
- b2. "Problem getting files."
- b3. "Most section members have their friends outside the department."
- b4. "Don't like the 'crap' they take from field people."  
"Feel the department is seen as not important because it is a service unit."

Standardized Questionnaire Survey

(Five-point scale.)

(Higher score = Greater Extent)

	AVERAGE SCORES	
	"Authorizers Section," Dept. A (n=12)	All four Departments (n=123)
a1. Work group members praise one another (Q139)	2.42	2.54
Work group is friendly (Q57)	4.17	3.92
a2. Work group provides help if I fall behind (Q138)	3.33	3.10
b1. Work group is adaptable (Q84)	4.33	3.89
Disagreements among depts. are worked through (Q8)	3.67	3.35
People expect too much (Q93)	3.33	3.45
Departments plan and coordinate well (Q24)	2.75	2.67
b2. I get blocked by long standing rules (Q103)	2.17	2.28
Work group gets needed information from other departments (Q5)	2.92	2.61
Work group is told enough to do the job the best way (Q7)	3.00	3.25
b4. Doing a good job leads to recognition and respect from those you work with (Q89)	3.08	3.43
Doing a good job leads to rejection from those you work with (Q90)	4.92	4.21

TABLE 6  
COMPARISON OF SPECIFIC RESULTS AMONG  
THREE DATA COLLECTION TECHNIQUES.  
V. PROMOTIONAL OPPORTUNITIES

Employees' Own Survey

"Some positions in the section are 'dead-end.'"  
 "More technical opportunities should be available for advancement."  
 "I have no idea of how well I am progressing."

Interviews by Staff Personnel

"All feel very secure"  
 "Little chance for advancement within the department."  
 "Want higher grade technical jobs available."  
 "Most want to stay in technical jobs than go on to supervision."

Standardized Questionnaire Survey

(Five-point scales. Higher  
 score = Greater Extent)

	AVERAGE SCORES	
	"Authorizers Section," Dept. A (n=12)	All four Departments (n=123)
Job gives me a chance to get ahead (Q99)	2.50	3.63
Importance of that to me (Q105)	4.08	4.43
Satisfaction with progress to date (Q11)	3.50	3.47
Importance in getting ahead:		
Seniority (Q129)	2.92	3.17
Doing an outstanding job (Q130)	4.42	4.33
Dependability (Q131)	4.58	4.54
Qualified (Q132)	4.33	4.08
Acquiring Training (Q133)	3.92	3.91
Having 'Pull' (Q134)	2.67	3.12
'Lucky Breaks' (Q135)	2.75	2.70
Following the rules (Q136)	3.58	3.83
Promotions as the reason why people work hard (Percent agreeing with category '3' in Q12)	8%	26%

summary reports presented to the design team. For instance, the fact that "Someone should be responsible for formal training" appeared to either downgrade the performance of the supervisor in training (Table 2, Interview b), or of the desirability of the supervisor fulfilling that function. The employee survey clearly shows that employees wanted the supervisor to perform that function (also Table 2), and the standardized questionnaire results showed the supervisor doing quite an adequate job at least in "Showing how to improve," and "Helping plan ahead." (Table 2, Q35-38). Other such minor discrepancies could be highlighted, but the overwhelming result is that the three methods are consistent to a remarkable degree, and act in quite complementary ways with one another.

#### Design

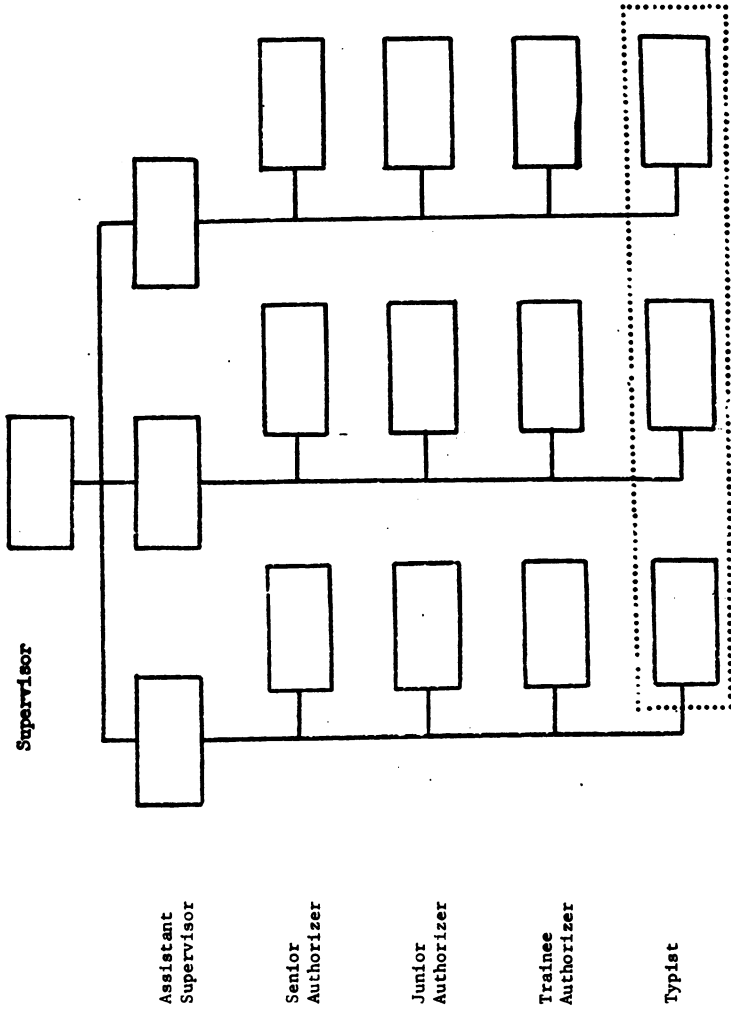
With the social system analysis completed the design team turned to the design--the stage of attempting to jointly optimize both the requirements of the technical subsystem and the social subsystem. At this point the design team began meeting more frequently and for longer periods. This included meeting outside of regular working hours. With the various analyses spread before them the team members proposed various work structures which they felt would both meet the criterion of joint optimization and satisfy their own preferences. Several such structures were proposed and discussed by the design team. Eventually a structure emerged which seemed to satisfy all criteria reasonably well--with one exception. Since both the technical analysis and the social analysis had revealed important issues which crossed the boundaries not only of the Authorizers Section, but of Department A as a whole, the design team was faced with the possibility of making recommendations for changes affecting units outside their scope. This issue was initially compromised in the design team's recommendations, and finally ignored by higher management in their approval process.

The organizational design proposed by the design team for the Authorizers Section was intended to meet the social system requirements of good relationships with other departments, for the many important coordinative tasks they shared; and good internal relationships within the section for high quality, formal training, and current day to day informal assistance. Requirements for individual jobs which the design team considered important in preparing the proposed structure were the aspects of career growth, competence, and challenge in the job for all employees, including typists. A design criterion in this case was to improve these job aspects without removing the current advantages of freedom to plan, and the variety in the jobs. Finally, the technical requirements considered were: obtaining information and services in a timely and/or accurate manner from others, together with getting similar quality out to these other departments; improving the internal consistency of the procedures authorizers used in their cases; and upgrading the technical skills within the group. In addition to these technical requirements the design team recognized the need for the section to adjust to 1) impending legislation bearing on the product, 2) a constant increase in business volume, and 3) an increase in special projects.

The structure of the proposed change is shown in Figure 1. The design proposal involved the minor restructuring of the authorizers' relationships internally so that they were grouped into three work-processing centers within the section. Each center would provide the basis for authorizers' cooperation in work sharing, on-the-job training, and goal setting. Each center would contain a nonmanagement "lead role" (called "Assistant Supervisor"), as well as "senior," "junior," and "trainee," authorizers, and a typist. Authorizers could rotate among the centers for exposure to the different skills and abilities of the others. The work of the section would in turn rotate among



Figure 1



the centers as production demands (determined by the assistant supervisors) required. The work of the total section would be coordinated among the three "assistant supervisors," who would take responsibility for consistency of field contact, given the possible rotation of authorizers and cases among the centers. It is important to note that the design team recommended that accounts (cases) be divided among and permanently assigned to the assistant supervisors, for telephone contact from the field staff or the account holder, or in correspondence to either party. The design team also concluded, however, that these accounts actually be worked by one of the twelve authorizers wherever in the section that case had been rotated in the interest of employee development and/or workload. This arrangement provided not only for stability of contact with the field staff and customers as noted above, (with attendant improvement in service), but actually avoided any suboptimal competition among the small work processing centers. In effect, this was planned to be a further force toward the members of the Authorizers Section coordinating among themselves--for work load management, as well as for training. The typing, mail distribution, and telephone switching for the section would be shared among the three typists at their discretion for equity, individual needs, as well as work center and section requirements. The section supervisor would take on a formal training role, and also be responsible for personnel administration. The design team also proposed that special projects and rush requests from other departments would be coordinated by the department manager and his boss, with the more day-to-day interdepartmental coordination being taken care of by the section supervisor.

The design proposal called for the abolition of separate job descriptions for the various grades of authorizers within the section, and the addition of a "floating" position description that encompassed all the duties and responsibilities of the trainee, the junior, and the senior authorizers. The design

team proposed that "when an individual can demonstrate a degree of proficiency and expertise (based on criteria to be determined by the department manager and the Personnel/<sup>Department</sup> indicative of next higher grade level, that promotion be authorized." This permits a more open ended and technically-based promotion path, based more on employee interest in learning new skills than on position openings in the department. This required a statement that authorized staff for the section would be limited only to number of personnel rather than to numbers in grade.

A final element in the design proposal was a physical rearrangement of office landscaping. In general, the change proposed was from a typical arrangement of desks in long rows, with the supervisor at the rear, to clusters of desks arranged in wheel-fashion.

This new landscape was intended to serve several functions. First, it would signal the change in structure in a physical and dramatic way. Second, it would provide identifiable space for the Authorizers Section, and the arrangement of clusters for the three work centers within it. It would also provide a location for the clustering of desks of the three typists in a central point to the three centers. The desks in all cases would be arranged in clusters of three or four--each divided from the others by seven foot high cabinets in which the files, which were used only by the Authorizers Section, would be stored. The proposed transfer of those files and their cabinets from the Files Department to the Authorizers Section in Department A was the essence of the third function served by the proposed office landscaping. The cabinets, it was argued, could better be placed where the records were used, thereby improving files accessibility to the section, and reducing the Files Department work load.

The writing of the proposal by the design team was accompanied by research on the part of Manager A into costs and precedents for the various elements in the proposal. The change in position descriptions, for example, was checked informally with the Personnel Department to assure its feasibility. The general office landscaping plans were discussed with managers elsewhere in the company who had experimented with other arrangements. The big question remained, however, whether the changes proposing different relationships with other departments (such as the filtering of special requests and rush jobs through Division and Department Management, as well as the transfer of relevant files to Department A) would be permitted in face of what was a mandate for intra-departmental change only. There seemed no way to smooth the way for that aspect, and the design team knew it would have to try the proposal and "take its lumps."

#### Approval and Implementation

As subsequent events were to show, this norm could not be violated and the proposed changes as approved in January, 1976 did not include immediate higher management support for either the buffering mechanism, or the office landscaping (which included files transfer). Attempts to implement the change were begun in February, although in a somewhat cheerless fashion. Manager A's disappointment in the lack of higher management enthusiasm for changes stretching across department boundaries was evident in his disconsolate approach to implementing the changes permitted. Although the presence of non-supervisory employees on the design team had been a boon at the time, they were not able to help with the implementation--at least not in their previous role. These two people had carried their career progress outside of the Authorizers Section before the design could be considered by higher management. One of the two had been offered a supervisory position in another section of Department A, while the

other had realized a long held plan to continue her progress in another technical area in the company. Thus the vicissitudes of personal fates and plans are not always congruent with well intentioned acts. Often in the folklore of organizational change one finds that an otherwise useful system fails or reverts to more conventional patterns upon the departure of its proponents or advocates. The two non-supervisory employees who had been on the design team could not reasonably be expected to turn down immediate opportunities to advance their careers in favor of the unknown reality of the work system they themselves had developed. One of the two actively participated in the formal presentation of the proposal to upper management, but aside from that their involvement in the process had concluded.

The conclusion of the case must await the passage of time and resurgence of interest on the part of the principles. Unfortunately and paradoxically, the length of time it took to develop the case to the point of implementation was not only a facilitating feature in gaining employee confidence in the data, the method, and the results; but was also a limiting factor producing the inevitable conflict in career prospects for participants, together with a waning upper management support.

# REFERENCES

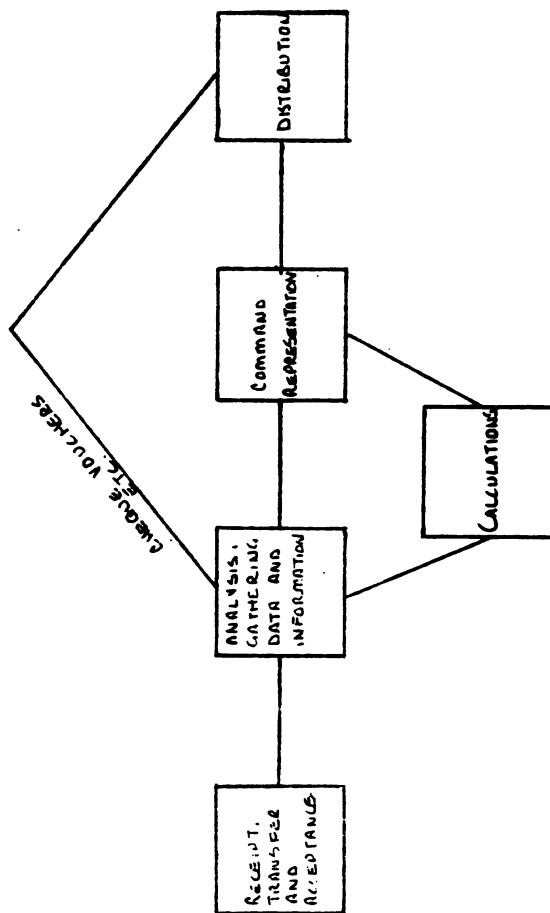
- Davis, L. E. and Engelstad, P. H. (1966) Unit operations in socio-technical systems: Analysis and Design." Unpublished paper. Tavistock Institute of Human Relations, Document No. T-894.
- Engelstad, P. H. (1972) Socio-technical approach to problems of process control. In L. E. Davis and J. C. Taylor (eds.), Design of Jobs. Harmondsworth: Penguin.
- Gulowsen, J. (1972) A measure of work group autonomy. In L. E. Davis and J. C. Taylor (eds.), Design of Jobs. Harmondsworth: Penguin.
- Hepworth, A. and Osbaldeston, M. (1975) "White collar work organization in Europe." Unpublished paper. Ashridge Management Research Unit.
- Hill, P. (1971) Toward a new philosophy of management. London: Gower.
- Lewin, K. (1946) Action research and minority problems. Journal of Social Issues, Vol. 2, No. 3
- Miller, E. J. (1975) Sociotechnical systems in weaving, 1953-1970: A follow-up study. Human Relations, 28, 349-386.
- Meissner, M. (1976) The language of work. In R. Dubin (ed.), Handbook of Work, Organizations and Society. Chicago: Rand McNally.
- Taylor, J. C. (1975a) "Experiments in work system design." Unpublished paper. Center for Quality of Working Life, Institute of Industrial Relations, UCLA. Document No. 75-1.
- Taylor, J. C. (1975b) The human side of work: The socio-technical approach to work system design. Personnel Review, Vol. 4, No. 3.
- Taylor, J. C. and Bowers, D. G. (1972) The Survey of Organizations. Ann Arbor: CRUSK/ISR, University of Michigan.
- Van Beinum, H. J. (1968) "The design of the new radial tyre factory as an open socio-technical system." Unpublished paper. Human Resources Center, Tavistock Institute of Human Relations, Document No. HRC 150.
- Work in America. Cambridge: MIT Press, 1973.

## APPENDICES

A, B, C, D

UNIT OPERATIONS - FLOW CHART  
DEPT. A.

Appendix A-1





## APPENDIX A-2

I. RECEIPT  
TRANSFER AND  
ACCEPTANCE

- 1) Duplicate of assignment - Agents & Consultants
- 2) Duplicate of assignment - Notice rec'd from both RK & CH
- 3) Duplicate of assignment - RK sends 2 notices
- 4) Duplicate of assignment - Coverage under 2 contracts
- 5) Duplicate of assignment from control procedures (single input)
- 6) Volume of mail
- 7) Volume of misdirected mail
- 8) Volume of phone calls
- 9) Volume of misdirected phone calls
- 10) Volume of tickler cards
- 11) Volume of future file messages
- 12) Volume of APC listing
- 13) Volume of rush requests
- 14) Volume of special projects
- 15) Mail received on timely basis
- 16) Initial scan by supervisor - Pension business for group settlements
- 17) Initial scan by examiner - Pension business for group settlements
- 18)
- 19)
- 20)

## APPENDIX A-2

MATRIX OF VARIANCES  
DEPT.-A.II. ANALYSIS,  
DATA GATHERING  
AND INFORMATION

- 21) Files missing
- 22) Cards missing
- 23) Printouts missing
- 24) Files, cards in storage
- 25) Files, cards destroyed
- 26) RK: Memos returned on timely basis
- 27) RK: Memos understood request
- 28) RK: Memos correct & complete information
- 29) Actuarial: Technicals returned on timely basis
- 30) Actuarial: Technicals understood request
- 31) Actuarial: Technicals correct & complete information
- 32) Pension underwriting: Information rec'd on timely basis
- 33) Pension underwriting: Correct and complete information
- 34) Law Department: Information rec'd on timely basis
- 35) Law Department: Correct and complete information
- 36) Pension sales: Information rec'd timely basis
- 37) Pension sales: Correct and complete information
- 38) Contractholder - Agent: Information received on timely basis
- 39) Contractholder - Agent: Understood request
- 40) Contractholder - Agent: Correct and complete information
- 41) Cheques returned on timely basis
- 42) Cheques correct & complete information
- 43) Acctg.: Information rec'd on timely basis (P42+)
- 44) Acctg.: Correct and complete information
- 45) Revisions in operating procedures
- 46) Revisions in laws
- 47) Lack of supplies
- 48) Technical error: Computation
- 49) Technical error: Clerical
- 50) Technical error: Failure to follow-up
- 51) Technical error: Failure to acknowledge on timely basis
- 52) Technical error: Misinterp. of plan - contract provision
- 53) Technical error: Misinterp. of request
- 54) Technical error: Failure to follow instructions
- 55) Training error: Improper priorities
- 56) Training error: Computation
- 57) Training error: Clerical
- 58) Training error: Failure to follow-up (includes routing)
- 59) Training error: Failure to acknowledge on timely basis
- 60) Training error: Misinterp. of plan - contract provision
- 61) Training error: Misinterp. of request
- 62) Training error: Failure to follow instructions
- 63) Training error: Improper priorities
- 64) B Calls done on timely basis
- 65)
- 66)

III. COMMAND  
REPRESENTATION

- 67) Forms submitted on timely basis
- 68) Forms returned on timely basis
- 69) Department/Division coordination
- 70) Volume of command representations
- 71) Regulations: IPA Cut off
- 72) Regulations: PCV Cut off
- 73) Regulations: Signatures needed
- 74) Regulations: Ledger date changes
- 75) Correct forms used
- 76) Clarity of representation
- 77) Correct representation
- 78)
- 79)

## IV. DISTRIBUTION

- 80) Time restrictions: IPA
- 81) Time restrictions: PCV
- 82) Time restrictions: Cheques
- 83) Volume of typing
- 84) Volume of distributions
- 85) Timely distrib. by sec'y
- 86) Correct distrib. by sec'y
- 87) File room - Correct filing
- 88) File room - Timely filing
- 89) Mail pick-up timely
- 90) GRP Life - Timely settlement
- 91) GRP Life - Correct settlement
- 92) Dept/Div helps
- 93) Dept/Div advises
- 94) Dept. Clks. help
- 95) Boundaries
- 96) Correct/timely dist. by examiner
- 97) Material returned to file

UNIT OPERATION

I. RECEIPT  
TRANSFER AND  
ACCEPTANCEII. ANALYSIS,  
DATA GATHERING  
AND INFORMATIONIII. COMMAND  
REPRESENTATION

IV. DISTRIBUTION

LEGEND: Key Variances Are Shown b  
Circled Numbers on Diagram

TABLE OF VARIANCE CONTROL

Dept. A

Key Process Variance	Name of Unit Operation			By Whom (Role, not Person)	Control Activities	Hypotheses
	Where Occurs	Where Observed	Where Controlled			
#6 Volume of Mail	1	1, 2	1, 2	File Clerk (Outside Boundaries) Examiner	Additional time devoted to Mail Handling  Determine Priorities, Work Overtime	Increase or change File Room Staff or revise procedures.  Increase Examiner Staff and/or rewrite pension instructions regarding handling deadline.
#13 Volume of Rush Requests	1	1, 2	1, 2	Examiner, Ass't Sup., Sup.	Determine Priorities, Work Overtime	Increase Examiner Staff. Devise formal priority system for handling rush requests.
#14 Volume of Special Projects	1	1, 2	1, 2	Examiner, Ass't Sup., Sup.	Determine Priorities, Work Overtime, Redistribute Work Load in Section	Devise Advance-Notice system on internal requests. Devise criteria for accepting projects. Dept. - Division coordination for charge to Contract Holder.
#21 Files #22 Cards #24 Storage #25 Destroyed	2	2	2, 4	Examiner, File Clerk	Prompt return of files and cards. Search conducted throughout Division.	Decentralize files; install microfilm system; Batch Order; Revise Retention to longer period of time.
File Accessibility						
#23 Print-Outs Missing or Misfiled	2	2	2	(Outside Boundaries) Examiner, Pension Accounting (Night Crew)	Examiner orders new print-out. Pension Accounting: Control Unknown	Increase Regular Day Staff in Pension Accounting or reassign filing of print-outs to different area.
#26 Record Keeping Memos returned on timely basis	2	1, 2	2	Examiner, Ass't Sup.	Follow-up by Examiner if data not received timely.	Reasonable deadlines should be formulated by Section Coordination. Notice of delay should be sent by Record Keeping.
#28 Record Keeping: Memos Correct & Complete	2	1, 2	2	Examiner Ass't Sup.	Examiner requests information or clarification from Contract Holder.	Complete and accurate data should be obtained at onset of Plan.
#29 Technicals: Returned on Timely Basis	2	1, 2	2	Examiner, Ass't Sup.	Follow-up by Examiner if computation not received timely.	Notice of delay should be sent by Pension Actuarial Dept.
#38 Contract Holder & Agent Info on Timely Basis	1	1, 2	1	Examiner, Ass't Sup., Sup.	Follow-up by Examiner on Priority Basis.	More complete data required from Record Keeping Section. More adequate Follow-up System within Settlements Area.

Key Process Variance	Name of Unit Operation			Controlled By Whom (Role, Not Person)	Control Activities	Hypotheses
	Where Occurs	Where Observed	Where Controlled			
#40 Contract Holder & Agent Correct & Complete Info	1	1, 2	2	Examiner, Ass't Sup., Sup.	Examiner analyzes information in relation to Plan/Contract Provisions	In-Depth interpretation of Plan & Contract by Pension Sales & Pension Consultants
#44 Pension Accounting: Correct & Complete Info	Outside Boundary	2	2	Examiner, Ass't Sup., Sup.	Analysis by Examiner	Departmental Coordination between Pension Accounting and Pension Benefits Admin.
#47 Availability of Forms	Outside Boundary & 2	1, 2, 3	Outside Boundary & 3	File Clerk, Examiner Clerk-Typist	Forms ordered on Timely Basis	Ordering System should be controlled by Department - Already being implemented.
#49 Technical Error: Clerical	2	2, 3	2, 3	Examiner, Ass't Sup., Sup.	Independent Calculation by 2 Examiners, Work checked, Work reviewed by Ass't Sup. or Sup.	More intensive training of Examiner Staff
#51 Failure to acknowledge on Timely Basis	1, 2	2	1, 2, 3	Examiner, Ass't Sup.	Examiner's Log	Proper use of Examiner's Log or Assignment of Acknowledgement Function to a Control Clerk
#66 Forms submitted on Timely Basis	3, 4	3, 4	3, 4	Examiner, Ass't Sup., Sup.	Examiner sets Priorities to meet deadlines, works overtime	Increase in Examiner Staff; More adequate Follow-Up System within Section
#69 Volume of Command Representations	3	2, 3, 4	3	Examiner, Ass't Sup. Sup.	Discretion exercised in setting deadlines, overtime	Increase in Examiner Staff; Transfer of certain functions not related to Settlements.
#76 Correct Representation	2, 3	2, 3	2, 3	Examiner, Ass't Sup., Sup.	Checking & Review for Completeness & Accuracy	Training of Examiner; Modification of IPA Computer Program.
#82 Volume of Typing	4	3, 4	3, 4	Examiner, Clerk-Typist	Assistance from other Typists in Department	Formation of fully trained Typist Pool. Devise all-purpose printed form.
#85 Correct Distribution	4	4	4	Examiner, Clerk-Typist	No control except IPA Distribution centralized in one Clerk-Typist	Controlled distribution of all forms & files by a Control Clerk.

Appendix B

(Data Collected March, 1975;  
Tabulations Returned May, 1975)

SURVEY OF ORGANIZATIONS

This questionnaire is part of a study designed in conjunction with your organization to learn more about how people work together. The aim is to use the information to make your work situation more satisfying and productive.

If this study is to be helpful, it is important that you answer each question as thoughtfully and frankly as possible. This is not a test and there are no right or wrong answers.

The completed questionnaires are processed by automated equipment which summarize the answers in statistical form so that individuals cannot be identified. To ensure COMPLETE CONFIDENTIALITY, please do not write your name anywhere on the questionnaire.

Please circle one response for each question.

In the questions below, the term "organization" refers to

Home Office.

1. To what extent is this organization generally quick to use improved work methods?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

\*\*\*\*\*

2. How much does this organization try to improve working conditions?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

3. To what extent does this organization have clear-cut, reasonable goals and objectives?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

8. How are differences and disagreements between units or departments handled in this organization?

- 1 Disagreements are almost always avoided, denied, or suppressed
- 2 Disagreements are often avoided, denied, or suppressed
- 3 Sometimes disagreements are accepted and worked through; sometimes they are avoided or suppressed
- 4 Disagreements are usually accepted as necessary and desirable and are worked through
- 5 Disagreements are almost always accepted as necessary and desirable and are worked through

\*\*\*\*\*

\*\*\*\*\*

9. All in all, how satisfied are you with your job?

- 1 Very dissatisfied
- 2 Somewhat dissatisfied
- 3 Neither satisfied nor dissatisfied
- 4 Fairly satisfied
- 5 Very satisfied

4. To what extent are work activities sensibly organized in this organization?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

5. How adequate for your work group is the information it gets about what is going on in other departments or shifts?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

6. How receptive are people above your supervisor to ideas and suggestions from your work group?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

7. To what extent does this organization tell your work group what it needs to know to do its job in the best possible way?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

10. All in all, how satisfied are you with this organization?

- 1 Very dissatisfied
- 2 Somewhat dissatisfied
- 3 Neither satisfied nor dissatisfied
- 4 Fairly satisfied
- 5 Very satisfied

\*\*\*\*\*

11. How satisfied do you feel with the progress you have made in this organization up to now?

- 1 Very dissatisfied
- 2 Somewhat dissatisfied
- 3 Neither satisfied nor dissatisfied
- 4 Fairly satisfied
- 5 Very satisfied

\*\*\*\*\*

12. Why do people work hard in this organization?

- 1 Just to keep their jobs and avoid being chewed out
- 2 To keep their jobs and to make money
- 3 To keep their jobs, make money, and to seek promotions
- 4 To keep their jobs, make money, seek promotions, and for the satisfaction of a job well done
- 5 To keep their jobs, make money, seek promotions, do a satisfying job, and because other people in their work group expect it

13. To what extent do you enjoy performing the actual day-to-day activities that make up your job?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

14. To what extent are there things about working here (people, policies, or conditions) that encourage you to work hard?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

15. In general, how much say or influence do you have on what goes on in your work group?

- 1 Little or no influence
- 2 Some
- 3 Quite a bit
- 4 A great deal
- 5 A very great deal of influence

IN GENERAL, HOW MUCH SAY OR INFLUENCE DOES EACH OF THE FOLLOWING GROUPS OF PEOPLE HAVE ON WHAT GOES ON IN YOUR DEPARTMENT?

16. Lowest-level supervisors (first-line supervisor)

- 1 Little or no influence
- 2 Some
- 3 Quite a bit
- 4 A great deal
- 5 A very great deal of influence

20. How are objectives set in this organization?

- 1 Objectives are announced with no opportunity to raise questions or give comments
- 2 Objectives are announced and explained, and an opportunity is then given to ask questions
- 3 Objectives are drawn up, but are discussed with subordinates and sometimes modified before being issued
- 4 Specific alternative objectives are drawn up by supervisors, and subordinates are asked to discuss them and indicate the one they think is best
- 5 Problems are presented to those persons who are involved, and the objectives felt to be best are then set by the subordinates and the supervisor jointly, by group participation and discussion

21. In this organization to what extent are decisions made at those levels where the most adequate and accurate information is available?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

22. When decisions are being made, to what extent are the persons affected asked for their ideas?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

23. People at all levels of an organization usually have know-how that could be of use to decision-makers. To what extent is information widely shared in this organization so that those who make decisions have access to all available know-how?

17. Top managers (president, vice presidents, heads of large divisions, etc.)

- 1 Little or no influence
- 2 Some
- 3 Quite a bit
- 4 A great deal
- 5 A very great deal of influence

18. Employees (people who have no subordinates)

- 1 Little or no influence
- 2 Some
- 3 Quite a bit
- 4 A great deal
- 5 A very great deal of influence

19. Middle managers (department heads, sub-division heads)

- 1 Little or no influence
- 2 Some
- 3 Quite a bit
- 4 A great deal
- 5 A very great deal of influence

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

24. To what extent do different units or departments plan together and coordinate their efforts?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent



B 3 -

Below are the names of the managers and supervisors in the departments we are currently surveying. Find your immediate superior on this list (he or she is the person you report to directly), and place a check next to the name in the space provided.

If your immediate superior's name is not on the list, write his or her

name here: \_\_\_\_\_.

Go on to page 4

Please circle one response for each question.

PLEASE ANSWER QUESTIONS 25 THROUGH 46 ABOUT THE PERSON YOU IDENTIFIED. SUPERVISOR MEANS THE PERSON TO WHOM YOU REPORT DIRECTLY.

FOR THE FOLLOWING SET OF ITEMS: PLEASE READ EACH QUESTION AND THEN ANSWER HOW IT IS NOW, AND HOW YOU'D LIKE IT TO BE.

How friendly and easy to approach is your supervisor?

25. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

26. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

When you talk with your supervisor, to what extent does he/she pay attention to what you're saying?

27. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

28. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent is your supervisor willing to listen to your problems?

29. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

36. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor provide the help you need so that you can schedule work ahead of time?

37. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

38. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor offer new ideas for solving job-related problems?

39. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

40. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor encourage the persons who work for him/her to work as a team?

41. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

30. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

How much does your supervisor encourage people to give their best effort?

31. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

32. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor maintain high standards of performance?

33. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

34. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor show you how to improve your performance?

35. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

42. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent does your supervisor encourage people who work for him/her to exchange opinions and ideas?

43. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

44. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

45. To what extent do you feel your supervisor has confidence and trust in you?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

\*\*\*\*\*  
\*\*\*\*\*  
\*\*\*\*\*

46. To what extent does your supervisor do a good job of representing your work group to other units? ("Represent" means telling others about what your group has done and can do, as well as explaining the problems facing it and its readiness to do things.)

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

Go on to page 5.

Please circle one response for each question.

IN ORDER TO BE AN EFFECTIVE LEADER, A SUPERVISOR NEEDS CERTAIN KINDS OF INFORMATION, SKILLS, VALUES AND SITUATIONS. TO WHAT EXTENT DOES A SUPERVISOR NEED TO HAVE EACH OF THE FOLLOWING?

47. Information about how his/her people see and feel about things?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

48. Knowledge of what it takes to be a good leader?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

49. An attitude which encourages participation and commitment from those who work for him/her?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

50. Administrative skill?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

WHEN IT IS NECESSARY FOR DECISIONS TO BE MADE THAT AFFECT YOUR WORK GROUP, TO WHAT EXTENT DOES YOUR SUPERVISOR DO EACH OF THE FOLLOWING BEFORE FINAL DECISIONS ARE MADE?

54. Provide the members of your work group with information about the decisions.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

55. Ask for opinions and ideas from members of your work group.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

56. Meet with his/her subordinates as a group, present problems that must be solved and work with the group to find solutions.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

51. Skills for getting along with others?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

52. A work situation which allows him/her to be a good leader?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

53. Interest in and concern for the people who work for him/her?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

Please circle one response for each question.

IN THE QUESTIONS BELOW, WORK GROUP MEANS ALL THOSE PERSONS WHO REPORT TO THE SAME SUPERVISOR.

How friendly and easy to approach are the persons in your work group?

57. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

58. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

When you talk with persons in your work group, to what extent do they pay attention to what you're saying?

59. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

60. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent do persons in your work group maintain high standards of performance?

65. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

66. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent do persons in your work group help you find ways to do a better job?

67. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

68. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent are persons in your work group willing to listen to your problems?

61. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

62. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

How much do persons in your work group encourage each other to give their best effort?

63. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

64. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent do persons in your work group provide the help you need so that you can plan, organize, and schedule work ahead of time?

69. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

70. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent do persons in your work group offer each other new ideas for solving job-related problems?

71. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

72. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent



Please circle one response for each question.

How much do persons in your work group encourage each other to work as a team?

73. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

74. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

How much do persons in your work group emphasize a team goal?

75. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

76. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

81. To what extent do persons in your work group know what their jobs are and know how to do them well?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

82. To what extent is information about important events and situations shared within your work group?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

83. To what extent does your work group really want to meet its objectives successfully?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

84. To what extent is your work group able to respond to unusual work demands placed upon it?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

To what extent do persons in your work group exchange opinions and ideas?

77. This is how it is now:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

78. This is how I'd like it to be:

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

79. To what extent does your work group plan together and coordinate its efforts?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

80. To what extent does your work group make good decisions and solve problems well?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

85. To what extent do you have confidence and trust in the persons in your work group?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

86. To what extent are the equipment and resources you have to do your work with adequate, efficient, and well-maintained?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

87. When it comes to doing your job well, to what extent does trying hard make any difference?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

Please circle one response for each question.

\*\*\*\*\*

88. To what extent does doing your job well give you a feeling of personal satisfaction?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

89. To what extent does doing your job well lead to things like recognition and respect from those you work with?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

90. To what extent does doing your job well lead to things like disapproval and rejection from those you work with?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

91. To what extent are you clear about what people expect you to do on your job?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

TO WHAT EXTENT DOES EACH OF THE FOLLOWING STATEMENTS DESCRIBE THE JOB YOU HAVE NOW?

94. It gives me the opportunity to find out how well I am doing.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

95. It lets me do a number of different things.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

96. It gives me the freedom to do pretty much what I want.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

97. It lets me do a whole piece of work (as opposed to doing part of a job which is finished by someone else).

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

92. To what extent are there times on your job when one person wants you to do one thing and someone else wants you to do something different?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

98. I can learn new things, learn new skills.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

99. It provides good chances for getting ahead.

93. To what extent do people expect too much from you on your job?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

Please circle one response for each question.

100. It uses my skills and abilities - lets me do the things I can do best.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

101. I get endlessly referred from person to person when I need help.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

102. I have to go through a lot of "red tape" to get things done.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

103. I get hemmed in by longstanding rules and regulations that no one seems to be able to explain.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

IN THINKING ABOUT THE KIND OF JOB YOU WOULD LIKE TO HAVE (WHETHER OR NOT YOU HAVE IT NOW), TO WHAT EXTENT IS EACH OF THE FOLLOWING IMPORTANT TO YOU?

109. To what extent is the organization you work for effective in getting you to meet its needs and contribute to its effectiveness?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

110. To what extent does the organization you work for do a good job of meeting your needs as an individual?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

=====

111. Your sex:

- 1 Male
- 2 Female

112. When did you first come to work here?

- 1 Less than 1 year ago
- 2 Between 1 and 5 years ago
- 3 Between 5 and 10 years ago
- 4 Between 10 and 15 years ago
- 5 Between 15 and 25 years ago
- 6 More than 25 years ago

104. A job where I can learn new things, learn new skills.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

105. A job with good chances for getting ahead.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

106. A job that uses my skills and abilities -- lets me do the things I can do best.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

107. A job where I don't have to go through a lot of "red tape" to get things done.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

108. A job where I am not hemmed in by longstanding rules and regulations that no one seems to be able to explain.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

113. Into what age bracket do you fall?

- 1 25 years or under
- 2 26 years to 30 years
- 3 31 years to 35 years
- 4 36 years to 40 years
- 5 41 years to 45 years
- 6 46 years to 55 years
- 7 56 years or over

114. How much schooling have you had?

- 1 Some grade school
- 2 Completed grade school
- 3 Some high school
- 4 Completed high school
- 5 Some college
- 6 Completed college
- 7 Some graduate school
- 8 Completed graduate school

115. While you were growing up -- say until you were eighteen -- what kind of community did you live in for the most part?

- 1 Rural area or farm
- 2 Town or small city
- 3 Suburban area near large city
- 4 Large city

Please circle one response for each question.

116. General Job Classification

Into which of the following five general categories does your job fit best?

- 1 Secretarial
- 2 Clerical
- 3 Technical
- 4 Supervisory
- 5 Managerial

117. To what extent does your job require a person to work closely with other people (either "client" or people in related jobs in the organization)?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

118. To what extent is the work you do here significant or important for this company?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

119. To what extent is what you do significant for other people in the community?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

How familiar are you with what goes on in other sections and departments - with regard to the following:

122. What they do - or the products they work on?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

123. Methods and procedures they use?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

124. Problems they're having?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

125. Contributions your work has made to their jobs?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

120. How much does your job require cooperative work with other people?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

121. To what extent does your job affect other people by how well the work gets done?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

126. If you were starting out again on this job as it is now, how long would it take before you could successfully do it - Including training time?

- 1 Less than a day
- 2 More than a day, but less than a week
- 3 More than a week, but less than a month
- 4 One to five months
- 5 Six months to one year

127. How much do you expect to get challenging work in this organization?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

128. How much responsibility does your job require of you?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent



Please circle one response for each question.

How important do you feel the following factors are for getting ahead in an organization?

129. Seniority?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

130. Doing an outstanding job?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

131. Being dependable?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

132. Being adequately qualified?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

137. How do you get feedback on the work you do?

(check one for each statement)

1      2      3      4      5  
Never Seldom Frequently Usually Always

a. I check my own work to see if it is correct. \_\_\_\_\_

b. A more experienced person checks my work . . . . . \_\_\_\_\_

c. A supervisor checks my work . . . . . \_\_\_\_\_

d. The computer checks my work . . . . . \_\_\_\_\_

e. I have no way of knowing how things are going . . . . . \_\_\_\_\_

138. To what extent are persons in your work group willing to provide active help (e.g. if you fall behind) with your work?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

139. How much do persons in your work group praise each other for work well done?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

140. To what extent do persons in your work group help group members to develop their skills and abilities?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

141. To what extent does your work group help new employees to learn the job?

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

142. My job lets me make choices and decisions.

- 1 To a very little extent
- 2 To a little extent
- 3 To some extent
- 4 To a great extent
- 5 To a very great extent

Thank you very much

133. Acquiring training?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

134. Having pull?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

135. Getting a lucky break?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

136. Following the rules?

- 1 Not Important
- 2 Somewhat unimportant
- 3 Important
- 4 Somewhat Important
- 5 Very Important

Appendix C  
(Data Collected and Reported May, 1975)  
JOB AND ORGANIZATION DESIGN PROGRAM INTERVIEW OUTLINE  
ROLE ANALYSIS

As you know, we're working with the people in your (section) to improve the way things are done -- so that the jobs which result are as satisfying as they can be, together with being as productive as possible. What we want to do today is to find out how the people in this (section) work together to get the work done, and how the people feel about the way it is done.

I. Role Description

A. Prescribed Activities/Job

1. What is your job (typical day)?
2. What are you responsible for?
3. How much time do you have to do your job?
4. How much instruction do you receive for your job?
5. How much social support?
6. How available are the resources?
7. How tired are you after a typical day?
8. How does what you do here compare with
  - ... other departments?
  - ... other companies?
9. What would you like to see different in your job?
  - ... addition?
  - ... deletion?

B. Discretionary Activities

Re: I.A.9., what freedom do you have to do these things on your own now?

C. Social Relations

1. Who do you come in contact with in doing your job?
  - ... within the department?
  - ... outside the department?
2. What's the nature of these relationships?
  - ... control and direction?
  - ... training?
  - ... assistance?

I.C.2. (cont'd)

- ... support?
- ... feedback?
- ... planning?
- 3. Primary direction of action -- who does what to whom?
- 4. What are the difficulties that arise?
- 5. Where are your friends here at work?

II. Individual

A. Goals

- 1. What do you want out of this job?
- 2. What do you want working for ?

B. Assessment/Attitudes

- 1. What progress are you making toward these goals?
- 2. How do you feel about this progress?

C. Job Requirements

Ask questions that expose the extent of existence of the job requirements.

- 1. Adequate elbow room. The sense that people are their own bosses on their jobs. The sense that other than in exceptional circumstances they do not have a supervisor closely directing them, which implies competence. Not so much elbow room is suggested that people just don't know what to do next.
- 2. Chances of learning on the job and going on learning. Such learning is possible only when people are able to set goals that are reasonable challenges for them and get a feedback of results in time for them to correct their behavior.
- 3. An optimal level of variety. People can vary the work so as to avoid boredom and fatigue and so as to gain the best advantages from settling into a satisfying rhythm of work.

II.C. (cont'd)

4. Conditions where they can and do get help and respect from members of their work organization. Avoiding conditions where it is in no person's interest to lift a finger to help another: where people are pitted against each other so that 'one's gain is another's loss'; where the group interest denies the individual's capabilities or inabilities.
5. A sense of one's own work being meaningful and of contributing to societal needs. One's own work has meaning in itself, is seen to make a meaningful contribution to the organization, and makes a needed contribution to the larger society in the kind of service or product made, its timeliness and quality.
6. A desirable future. Quite simply, a prospect of a career and not a dead-end job; hopefully one that will continue to allow personal growth.

3/12/75



**CQWL**

CENTER FOR QUALITY OF WORKING LIFE