Research Note 83-14

EVALUATION OF ARMY ORGANIZATIONAL DEVELOPMENT INTERVENTIONS

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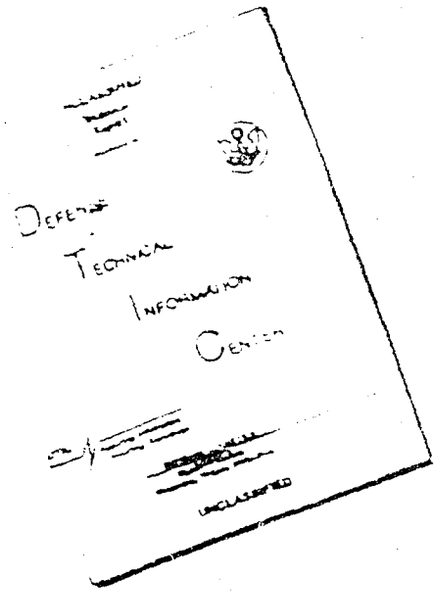

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Development and analysis of the 10 Organizational Effectiveness (OE) case studies in the field research phase of this project produced findings about (1) the utility of the methodology, variable taxonomy, and data collection procedures developed for the study (Spencer & Cullen, 1978) and (2) findings about OE intervention variables--outcomes, consultant and client characteristics, intervention method, and processes--associated with successful OE operations. Research findings relating successful and nonsuccessful OE operations and

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outcomes, consultant characteristics, intervention methods, and the intervention process are discussed in detail.

FOREWORD

The Leadership and Management Technical Area of the Army Research Institute is primarily involved in applying the principles of organizational effectiveness (OE) to the Army, and developing new technology for use by Organizational Effectiveness Staff and Non-Commissioned Officers (OESOs and OENCOs). This report develops detailed case studies of organizational development interventions within Army organizations. These case studies identify variables which predict or are associated with successful interventions.

The research was conducted by McBer and Company under Army Project 2Q162717A779. The Office of the Deputy Chief of Staff for Personnel is the sponsor.

EVALUATION OF ARMY ORGANIZATIONAL DEVELOPMENT INTERVENTIONS

BRIEF

Requirement:

To develop detailed case studies of organizational development interventions in Army organizations, and to analyze these case studies to identify those variables which predict or are associated with successful interventions.

Procedure:

A case study approach was designed and used to enable the data collected to be used in both retrospective empirical analysis of case data, to test hypotheses developed in the taxonomy study (ARI Technical Report, Spencer & Cullen, 1978), and to generate new hypotheses through a "grounded" theory examination of the data.

Three data collection methods were used to develop each intervention: (1) behavioral event interviews with the OESO consultants and at least one client representative, usually the sponsor of the intervention effort; (2) structured interviews with the OESO(s) and the client representative; and (3) completion of Case Analysis Observation Form by the external observer/researcher. In most cases, data were collected at three points in time: (1) an initial pretest observation at the beginning of the intervention; (2) a second observation approximately five to six months later; and (3) a final observation ten to twelve months later (the posttest observation).

Findings:

1. Analysis of competency and role variables indicate that consultants most likely to be successful are those who adopt a "collaborator in problem-solving role", which emphasizes accurate empathy and goal congruence in establishing a helping relationship with clients, and diagnosis and initiation competencies oriented to identifying realistic action steps and achieving documentable organizational improvement outcome results.

2. OESOs in more successful cases collected more data and used more methods of data collection than did OESOs in unsuccessful cases. Data collection in the more successful cases also was more systematic and reflected a more accurate assessment of the clients' needs. In the more successful cases, OESOs used an average of nearly three different methods of data collection, as compared to the one method used by OESOs in unsuccessful cases.

3. An effective OE effort differs from an ineffective OE effort in the planning/problem-solving phase principally in the ability of OESOs to provide accurate and understandable feedback, and to aid their clients in effective goal setting and implementation planning.

4. The effective OESO works closely with the client system, accepts the importance of the client's problem, and develops with the client a psychological contract which allows for a relatively open relationship. The OESO develops a set of realistic expectations about how far the client can go and shares with the client both the OESO's expectations and his general diagnosis.

5. A successful intervention is always brought to a well-defined close, identified by both the client and the OESO.

Utilization:

This analysis of 10 separate OE interventions in the Army provides the OESOs in the fields information about the "ingredients" for a successful intervention. This cues the OESO to factors of which he must be aware before, during, and after an intervention to insure success. The information contained in this report will also be useful to OEC&S for curriculum development.

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I. INTRODUCTION

The research conducted under ARI contract DAHC19-78-C-0003 consisted of two parts. The objective of Part I was to develop a taxonomy of organizational development research variables and a methodology for collecting and analyzing data on Army organizational effectiveness (OE)[1] interventions, as reported in "Taxonomies of Organizational Change: Literature Review and Analysis" (Spencer & Cullen, 1978).

The objectives of Part II were (1) to develop detailed case studies of organizational development interventions with Army organizations, and (2) to analyze these case studies to identify those variables which predict or are associated with successful interventions.

This section is a summary of the research variable categories and methodology used to develop and analyze ten case studies of Army OE operations conducted in 1978. Subsequent sections contain discussions of variables in each category found to be associated with successful interventions.

Organization Development Research Variables

The Spencer and Cullen (1978) study found that organizational development research variables could be classified into four categories:

(1) consultant variables
(2) client variables
(3) intervention variables
(4) outcome variables

These variables can be organized in the input-process-output model illustrated in Figure I.1, where the inputs are the (1) OE consultant change agents, (2) client, and (3a) the OE intervention method or technique which the change agent selected for use with the client. These inputs produce (3b) an intervention process which can lead to (4) change outcomes for the organization. This model is dynamic because changes in any of these variables at one point in the intervention can cause changes in other variables at succeeding points in time.

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[1] The Army term for organizational development is "organizational effectiveness," commonly abbreviated "OE."

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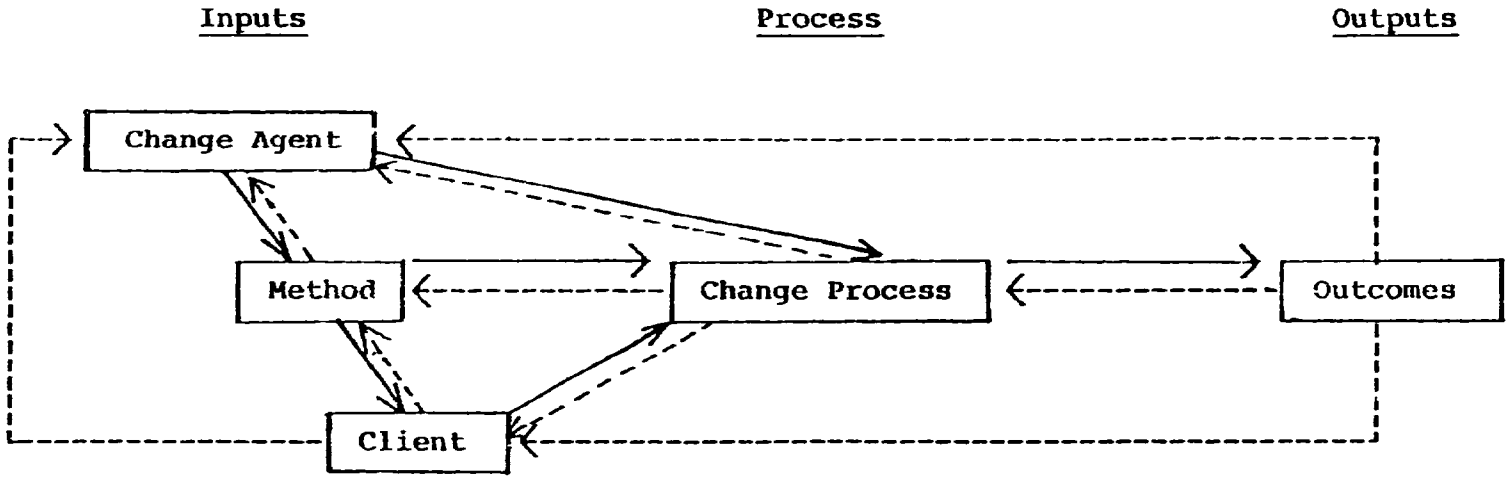
FIGURE I.1

A Dynamic Model of Organizational Change



causal relations (assuming a linear sequence over time)

feedback loops that can modify components or processes at any point in time

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Consultant Variables

Consultant variables included characteristics, competencies, and behaviors of the consultant or change agent who conducted the intervention. In most cases, consultants in the study were Army Organizational Effectiveness Staff Officers (OESOs). Occasionally consultants included civil service, academic, and civilian contractor personnel.

Consultant characteristics included demographic data (age, sex, race, rank), espoused attitudes and values, consultant education and training, work experience, and consulting experience.

Consultant competencies consisted of four skill groups: (1) establishing client relationships (caring and empathic listening behaviors), (2) diagnostic skills, (3) initiation (problem solving, presentation, and emotional stimulation), and (4) group management skills.

Consultant roles were categorized on the basis of directive versus nondirective approach and emphasis on task versus interpersonal issues. Role descriptions included advocate, expert, trainer, collaborator in problem solving, and interpersonal processor.

Client Variables

Client variables included characteristics, problems, and recipient personnel of organizations receiving organizational development services. Cases included studies of OE interventions with Army Division, Brigade, and Battalion line units, Headquarters staff offices, and components of large Army civilian support agencies.

Client characteristics included the mission, size, composition (number and types of personnel), components, structure, and production processes of the organization, and the certainty or uncertainty of its external environment.

Client problems included goal, task, interpersonal and intergroup relations, power structure, and organizational climate difficulties--and the pressure or urgency of the problem.

Client recipient variables included the degree of support, power, position, values, skills, and needs of the sponsor of the intervention, and the targets of the change effort (e.g., the sponsor's subordinates).

Intervention Variables

Intervention variables included the organizational development method or technique used and variables descriptive of the process by which the intervention is carried out.

Intervention methods included individual counseling, unstructured and structured group training, process consultation, survey-guided development, job redesign, personnel systems, management or financial information and control systems, organizational design, and multiple method implementation.

The numerous intervention process variables identified in the organizational development literature (see Figure I.2) were organized under eight common steps or stages of an intervention: scouting; entry (contracting); diagnosis; intervention problem-solving planning or training; action; follow-up; evaluation; and termination.

Outcome Variables

Outcome variables included the evaluation method and measures used to assess the costs and result benefits of the intervention. A significant development in the research project was the identification of cost-benefit accounting methods for evaluating Army organizational effectiveness operations.

Research Methodology

The research methodology used in the study was essentially a case study approach designed to enable data to be used in both retrospective empirical analysis of case data (cf. Dunn & Swierczek, 1977) to test hypotheses developed in the taxonomy study (Spencer & Cullen, 1978) and to generate new hypotheses through a "grounded theory" examination of the data (cf. Glaser & Straus, 1967; Akin's 1978 critique of Dunn and Swierczek, and Dunn & Swierczek's (1978) reply to this critique).

Three data collection methods were used to develop each intervention studied: (1) behavioral event interviews with the OESO consultants and at least one client representative,

FIGURE I.2

Intervening Variables at Each Phase in an Organizational Intervention Process

PHASE	INTERVENING VARIABLE/PHASE	REFERENCES
1. Scouting	1.1. Identify potential "early adopters"	Rogers (1962)
a. Preliminary data collection (market research) b. CA (team) planning c. Marketing	1.2. Active marketing of services to gain awareness, interest (through a variety of messages via different channels used in combination, in sequence, in repetition)	Rogers (1962)
	1.3. Collect advance data on client "felt needs," problems personnel, structure	Navy HRM Cycle (Munger, Spencer & Thomson, 1976) Kolb & Frohman (1970)
	1.4. Build change agent team consensus, drill, security	Bennis & Schein (1969) Beer (1976)
2. Entry	2.1. Gain top management support	Buchanan (1971), Bennis & Schein (1969), Greiner (1967), Bennis (1965), Srivasta et al. (1975), Beckhard (1969)
a. Initial contact with client b. Assess client readiness c. Contracting	2.2. Build person-to-person contact networks, informal "opinion leader" (reference group) support	Rogers (1962) Nadler (1977)
	Identify:	
	(a) Who proposes (innovator)	Yin et al. (1977)
	(b) Who initiates (implementor)	Havelock (1969, 1973) - user should initiate change
	(c) Who is identified with (i) Who supports/reasons (ii) Who is involved in/reasons (iii) Who opposes/reasons	Schmuck & Runkel (1972)
	(d) Impact on adjacent subsystems	Bennis & Schein (1969)
	2.3. Change agents, intervention congruent with client norms, values, culture	Bennis & Schein (1969) Bennis (1965) Havelock & Havelock (1973)
	2.4. Agree on clear objectives/expectations for intervention	Buchanan (1971), Beer (1976), Lynton & Pareek (1967), Nadler (1977), Havelock (1969) - objectives stated in behavioral term Schmuck & Runkel (1972) - task/mission oriented
	2.5. Contract for intervention resources	McGill (1977), Clark (1975)
	(a) Structure	
	(b) Power (role) relations - CA responsible	Barnes (1969)
	(c) Pace (time) - Client contact responsible	
	(d) Price (financial resources)	
	(e) Professional relations	
	(f) Performance criteria	
d. Selection and motivation of appropriate participants	2.6. Involve participants on a voluntary self-selection basis	Knowles (1970) Bennis & Schein (1969) Lynton & Pareek (1967)
	2.7. Present intervention in relevent "felt need" terms	Havelock (1969), Lippit, Watson, Wesley (1958), Beer (1976), Bennis (1965)
	2.8. Express positive expectations for intervention success	McClelland (1975), Havelock & Havelock (1973)
	(a) Change agent	Wittreich (1966)
	(b) Client sponsor	- "minimizing uncertainty," reassurance

(FIGURE I.2, continued)

PHASE	INTERVENING VARIABLE/PHASE	REFERENCES
3. Diagnosis a. Plan to collect data b. Data collection - Observation - Interviews - Survey - Other	3.1. Clients participate in data collection (a) Motivated to provide accurate data (b) Appropriate levels/sample involved (more levels better) (c) Confidentiality guaranteed (d) Data collection investment appropriate to client	Coch & French (1948) Cartwright (1951) Buchanan (1971) Greiner (1967) Nadler (1977) - explain to respondents: goal, client (who for), kind of data wanted, how collected, confidentiality (use)
	3.2. Accurate diagnosis (a) Felt "actual" and "ideal" client situation and needs (b) Client-CA consensus on problem and next step, OR (c) awareness of disagreement and feedback loop to re-contracting (entry) or collection and analysis of additional data	French & Bell (1973) Buchanan (1971)
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c. Diagnosis	3.2. (d) Realistic appraisal of resources and constraints	
d. Intervention planning - Program: design, materials, schedule, facilities - CA team planning, role assignment	3.3. Effective planning, logistics (a) Organization of inputs (b) CA role clarity, collaboration	Lynton & Pareek (1970) Beer (1976) Munger, Spencer & Thomsen (1976)
4. Planning/Problem Solving/ Training Intervention a. Contracting b. Concepts training	4.1. Involve work teams in "family groups" 4.2. Client participation in setting objectives, expectations to felt needs 4.3. Climate of "psychological safety:" open communication, trust, self-control, congruence with clients' norms, values	Knowles (1970), Buchanan (1971), Dunn (1978) Kolb & Boyatzis (1974), Beer (1976), McClelland (1965), French & Bell (1973), McClelland & Winter (1969) Harrison (1970) - minimum depth Bennis & Schein (1965) Hellreigel & Slocum (1971)
	4.4. Use all learning styles: (a) New cognitive concepts (b) Experiential/affective (c) Reflective	Kolb (1971), Clark (1976), Greiner (1967), Bennis (1965), Franklin (1976), Beer (1976), Knowles (1970) Lynton & Pareek (1967)
c. Data feedback	4.5. Data feedback (a) Timely (b) Accurate (c) Creates felt actual-ideal discrepancy (relevant, "owned"), hence motivation for change (d) In "family group" meeting (e) Consultant present	Beer (1976) Franklin (1976) Nadler (1977) Kolb & Boyatzis (1974) Wakely (1964), Chase (1968), Klein, Kraut & Wolfson (1971), French et al. (1956), Leavitt (1965), Baumgartel (1959)
d. Problem solving/goal setting/ action planning	4.6. Participants relate data, concepts to identify solutions to real felt problems they have: (a) Identify alternatives (b) Identify criteria for alternative choice (c) Decide on one or more alternatives	Havelock & Havelock (1973) - client initiative to adapt solutions to own situation
	4.7. Participants set realistic time phased goals for change/ use of data/use of learning	Kolb & Boyatzis (1974), Kay, French & Meyer (1965) McClelland & Winter (1969)
	4.8. Participants identify specific action steps for goal accomplishment	
	4.9. Participants identify constraints, links, impact, on other parts of organization	
	4.10. Hygiene factors adequate (accommodations, meals, setting, etc.)	Lynton & Pareek (1967)

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(FIGURE I.2, continued)

PHASE	INTERVENING VARIABLE/PHASE	REFERENCES
	4.11. Retreat setting	McClelland (1965), McClelland & Winter (1971), Beer (1976
	4.12. "Feedback loop" to diagnosis, planning, or within intervention (evidence that change agents hear client feedback during intervention and modify intervention activities to client needs)	Kolb & Frohman (1970) Argyris (1970) Havelock & Havelock (1973) - "reciprocal feedback"
4. e. Re-entry	4.13. Contact for follow-up activities: continued CA contact, goal progress review meetings, reference group meetings, evaluation, etc.	Rogers (1962) McClelland (1965) McClelland & Winter (1971) Lynton & Pareek (1967)
(5. Action - by client)		
6. Follow-up Technical Assistance and Support	6.1. CA maintains contact with client	Lynton & Pareek (1970)
	6.2. Feedback on change goals, use of learning (goal progress review meetings)	McClelland & Winter (1969) Kolb & Boyatzis (1974)
	6.3. Top management attention and support	Lynton & Pareek (1967)
	6.4. Rewards, reinforcement/ sanctions for participants re intervention goals	Beer (1976), Kolb & Boyatzis (1974), French & Bell (197 Lynton & Pareek (1967)
	6.5. Reference groups of participants	Cherns & Davis (1975)
	6.6. Diffusion of effects of change to other parts of organization	Buchanan (1971) Cherns & Davis (1975)
7. Evaluation	7.1. Level (i) Reactions (ii) Learning (iii) Behavior (iv) Results	Kirkpatrick (1967) Dunn (1977)
	7.2. Design (i) Longitudinal (ii) Experimental	Pate, et al. (1976), Srivasta et al. (1975), Cummings, Molloy & Glen (1977)
	7.3. Formative - "post mortems" on why success/failure	Yin et al. (1977)
8. Termination	8.1. Client left with capacity for continued development	
	8.2. Client positive/neutral/ negative re. CA, intervention	
	8.3. Pace of termination (i) Gradual/abrupt (ii) Planned/unplanned	Franklin (1976)
	8.4. Reason for termination	

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usually the sponsor of the intervention effort; (2) structured interviews with the OESO(s) and the client representative(s); and (3) completion of a Case Analysis Observation Form by the external observer/researcher. In most cases, data were collected at three points in time: (1) an initial pretest observation at the beginning of the intervention; (2) a second observation approximately five to six months later; and (3) a final observation ten to twelve months later (the posttest observation). Figure I.3 illustrates the intervention variable data collected by each method.

This research methodology was designed to meet three criteria. First, it enabled the researchers to describe the intervention process in detail at several points in time and evaluate the overall effectiveness of the intervention. Second, it provided for aggregation and comparison of data across different cases and settings. Finally, it avoided making excessive demands of either the OESO consultants or the client system. Respondents were interviewed for no more than one and one-half hours at each data collection point.

Behavioral Event Interviews

Each OESO and client representative was interviewed using a structured behavioral event interviewing technique developed by McClelland (1975). Similar to the critical incident and behavioral scaling methods developed by Flanagan (1954), Smith and Kendall (1963), and Dunnette and his associates (Dunnette, 1976; Borman, Dunnette, & Johnson, 1974), the behavioral event method asks respondents to identify the most important success and failure experiences they had during the course of the intervention. Subjects were asked to describe in considerable detail for each incident:

- the situation they encountered, and what led up to it;
- the people involved;
- the subject's feelings, desires, or intentions in responding to the situation;
- the respondent's actions in responding to the situation; and
- the outcome or results of this action.

This information permitted reconstruction of respondents' motives, attitudes, and behaviors in critical intervention situations.

FIGURE I.3

Data Collection Method Proposed for Each Intervention Variable

Data Collection Method	Intervention Variable				
	OESO Change Agent	Command Client	OE Intervention	Outcomes	
1. Behavioral Event Interviews: a) OESO b) Client Sponsor	• competency • role(s)	• problem • recipient characteristics	• espoused method • process	• espoused outcomes	RESPONDENT DATA
2. Structured Interviews: a) OESO b) Client Sponsor	• characteristics	• system characteristics • problem • recipient characteristics	• espoused method • process	• espoused outcomes	OBSERVER DATA
3. Case Analysis Observation Form	• characteristics	• system characteristics • recipient characteristics	• method • process	• pre/post outcome measures (objective)	

Subjects' interviews were transcribed and were then examined using the hypothesis generation techniques described by McClelland (1958) to develop empirical coding systems for the analysis of thematic material. This procedure, used to identify the competencies of effective internal military consultants in a recent study (McClelland, 1975), consisted of the following steps:

1. Two researchers independently examined the interview transcripts of success and failure incidents to identify distinguishable individual characteristics, skills, and behaviors which appear to be associated with intervention success.

2. These researchers then compared their perceptions of identifiable characteristics existing in the data and agreed on a tentative coding system for recognizing or scoring these characteristics.

3. Researchers coded the original small sample of interview transcripts, using the scoring categories agreed upon in Step 2, and compared their scores to see if the categories selected could be reliably identified and if they in fact discriminate successful from unsuccessful intervention incidents.

As indicated in Figure I.3, behavioral event interview data provided information about change agent competencies and roles, client (espoused) problems and recipient characteristics, espoused methods and actual process elements, and espoused outcomes. (Problems, method labels, and outcomes espoused by respondents were checked by researcher observations using the Case Analysis Observation Form.)

The behavioral event method was used for three reasons. First, it elicited underlying causal personality characteristics (e.g., motivation, cognitive style in problem solving, chronic positive expectations of others, and similar personality variables) which may be important to subject performance and which are not elicited by structured interview techniques. Second, operant responses minimize the biases inherent in structured interview protocols. For example, in a behavioral event interview, a subject may volunteer that his or her motive was to convince a client, or that he or she initiated marketing activities to expand the client base of an OE program. These responses can be scored for power and achievement motivation, possible consultant compstencies. A structured interview protocol which asks respondents, "How did you contact the client?" can lead or bias the subject's response, producing spurious data. Third, behavioral event

interviews with both the OESO consultant(s) and the client(s) involved in an intervention provided two critical perspectives on the process which were used to validate one another and/or identify differences in perception which proved informative in discerning why interventions succeeded or failed. For example, where an OESO reported that he was successful in understanding his client's problem, the client sponsor reported that the intervention was unsatisfactory because the change agent focused on his own agenda and failed to deal with the issue most salient to the client.

Structured Interviews

Immediately following the behavioral event interview, a structured interview protocol was used with OESO and client respondents to collect specific information on demographic characteristics and on details about each step in the intervention process. Sample inquiry protocols for consultant and client structured interviews are provided in Appendix A. It will be noted that these protocols parallel one another; that is, OESO and client respondents were asked essentially the same questions about key variables in each phase of the intervention process. These data were used to assess the degree of congruence or difference in perception between consultant and client at critical points in the process.

As illustrated in Figure I.3, the structured interview collected data about change agent characteristics, client system, problem and recipient variables, espoused method and actual process elements, and espoused outcomes.

Case Analysis Observation Form

For each intervention studied, the researchers completed a Case Analysis Observation Form on the basis of interview data, direct observation at the site of each intervention, and objective data (e.g., IG, ARTEP, or other inspection scores, and retention rates, climate survey data, or other measures of unit satisfaction) available on the effectiveness of the client organization. A sample Case Analysis Observation Form is presented in Appendix B. As illustrated in Figure I.3, the Case Analysis Observation Form recorded data on consultant characteristics, client system and recipient characteristics, intervention method and process variables (as observed by the researcher), and objective outcome data.

The following sections present findings derived from analysis, behavioral event interview, structured interview, and observation data collected on each of the ten case studies of OE interventions. In most cases, data are presented in figures which indicate the frequency with which specific variables were associated with successful or unsuccessful interventions. Six of the observed interventions were considered successful and four were considered unsuccessful, on the basis of a consensus judgment of the OESO consultant, the client sponsors, and the researcher as to whether "anything meaningful had happened as a result of the OE operation."

The addendum to this section provides synopses of the ten cases. The following section, "Intervention Outcome Variables," describes the decision rules by which cases were judged successful or unsuccessful. While outcome variables are logically last in the systems model presented in Figure I.1, familiarity with the cases and an understanding of their outcomes facilitates discussion of the causal consultant, client, and OE method and process variables described in succeeding sections. It should be emphasized that the small number of cases, large number of variables, influence of exogenous events, and absence in most cases of hard outcome criteria restrict the strength of conclusions drawn from the following analyses. For example, OE interventions with general officers tended to be unsuccessful, but it could not be determined from the data whether this was an OE consultant or client variable (i.e., a conclusion that the status differential between consultant and client hindered the effort) or an OE method variable (i.e., whether use of a different technique, such as an "open systems" policy planning analysis for top management, would have resulted in the success of the intervention).

ADDENDUM A:
SYNOPSES OF CASES DEVELOPED IN THE STUDY[1]

The Division G4 Logistics Office Intervention

The client was a LT COL, the G4 of a Division, and his logistics office subordinates. The OE consultants were two OETC-trained captains. The OE intervention consisted of two phases. Phase 1 included interviews, an OESO-developed "internal" survey and observation of meetings of the client with internal logistics office staff, followed by feedback to the client with specific recommendations for changes in logistics office management processes and training in meeting management techniques. Phase 2 consisted of interviews, an OESO-developed "external" survey and observation of logistics office meetings with its "macro system clients," brigade and battalion COs and S4s, and other persons whose actions impacted on the division's logistics, followed by feedback to the client with specific recommendations for improved communications with these external G4 office interfaces. This case, which involved a very complex system, was considered a definite success because the client and OESOs were able to document nine specific actions taken by the client to improve internal management processes, and five specific actions to improve G4 office transactions with external division, installation, and FORSCOM units.

The Mechanized Infantry Battalion

The client was a LT COL, CO of a mechanized infantry battalion. The initial OE consultants were an OETC-trained MAJ and CPT, and the later consultant was a second OETC-trained CPT who assumed responsibility for the intervention when the initial OESO team rotated. The OE intervention consisted of interviews with small groups of battalion enlisted, line, and staff officer personnel, and an experimental work environmental questionnaire survey, followed by individual feedback to the client, a planning/problem-solving session attended by the client and his staff and command group which focused on role clarification, expectations, communications, and planning for the battalion's upcoming REFORGER exercise, and

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[1]Full cases and supporting documentation are on file at the Army Research Institute for the Behavioral and Social Sciences, Leadership and Management Technical Area.

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follow-up training for the client in time and meeting management techniques. The second OESO consultant accompanied the battalion on the REFORGER exercise in Europe to observe the follow-up effects of OE in a simulated combat environment. This case was considered a qualified success because, while implementation of specific actions identified by the OE effort was not documented, follow-up of the effort did take place over six months and both the client and OE consultant perceived that the OE intervention had improved the battalion's planning and organization, role clarification, and hence coordination among battalion staff, and the client CO's managerial style--specifically, a greater willingness to delegate operations to his company commanders.

The Fort West Brigade Commander's Planning and Coordination Conference

The client was a COL, the CO of a brigade. The OESOs were two OETC-trained CPTs, supervised by an LTC, who was chief of a major installation's OE office. The OE intervention consisted of a one-day transition workshop (called a "planning and coordination conference" at the client's request because it "sounded more military") in which participants developed assessment data, identified problems, generated action recommendations, and gave the client CO an opportunity to state his expectations and management philosophy. This case was considered because at a six-week progress review point, the client and OESOs were able to document specific action steps taken as a result of the OE effort to improve brigade operations: delegation/decentralization of training scheduling to battalion COs, previously centralized delegation of SQT and space inspections to SGT MAJs, staff initiatives which cut unnecessary paperwork, and a series of actions to promote a sense of unit identity. The client COL estimated the OE intervention saved him "three or four months" in understanding the managerial issues facing the brigade. (This case includes a unique attempt to develop a cost-benefit analysis for an OE intervention: Based on accounting of the cost of participant's time involved, this OE effort cost $8,111, which would be recovered by a one percent increase in brigade staff productivity, calculated to be worth $10,373.)

The Combat Intelligence Division Office

The client was a LTC(P), director of a large HQ intelligence office. The OE consultants were an OETC-trained LTC OESO, and a GS9 civilian "internal OE consultant" assistant,

who actually conducted the operation. The OE intervention consisted of interviews and an OE consultant-designed survey of CIDO personnel, followed by individual feedback to the client, and a problem-solving/action-planning session attended by the client and key members of his staff. This case was considered a definite success because the client and internal OE consultant were able to document major changes in the CIDO operation, including a new organizational structure, complete change in the physical layout of the office, and specific changes in work process and flow in the development of intelligence data. A six-month follow-up survey found significant improvement on 18 of 23 issues identified in the assessment phase of the operation.

Fort Cox Battalion Commander's Planning and Coordination Conference

The client was a LTC who was about to assume command of a front-line infantry unit. The OE consultant was an OETC-trained CPT. It was the CPT's first major OE assignment. The client was primarily concerned with his ability to make the transition from a teaching position to a combat command. He had a strong desire to know his new staff in the shortest possible time and to surface any crucial organizational issues. The OE intervention consisted of an initial data gathering phase, during which the OESO interviewed the client and his new staff, and two workshops, one for his battalion staff and one for his company commanders. The workshops consisted of a few straightforward experiential exercises, some personal feedback using a short survey, a discussion of the central issues confronting the battalion, and finally the client's statement of his expectations for his officers.

This case was considered a success because the OESOs and clients believed the workshops accomplished the original objectives. A number of incidents shortly after the intervention demonstrated that the new CO had used improved management procedures with his company commanders and staff officers. The OESO reported that as a result of this transition workshop's success, numerous other battalion commanders made requests for similar workshops.

STACOM

The client was a LTC who was head of a small staff unit. As part of a larger effort, the LTC's superiors asked the head of the OE program to work with the LTC because the staff unit was experiencing serious morale problems. The head of the OE program, a LTC, first tried a conflict resolution

meeting to resolve a problem between the LTC and one of his subordinates. This problem was seen as the major source of the difficulties experienced by the unit. When this effort failed, another OESO, an OETC-trained MAJ, was assigned to the case. The new OESO and the client worked out a program that would focus on restructuring the work flow in the office through group discussions involving all employees. The OESO and client believed that this strategy would also help to resolve the conflicts between the client and his subordinate by bringing group pressure to bear on that subordinate. Extensive group meetings took place over a period of six weeks. No substantial changes occurred either in the way the unit's work was organized or in the relations between the client and his subordinate. Over the course of the OE effort, the OESO focused more on the client's managerial style when it became clear that this was an additional issue.

During the intervention, the OESO task was made more difficult because the client's superior also had line authority over the OESO. In addition, the client's superior and the OESO's direct supervisor, the head of the OE program, had difficulty communicating. The case was evaluated as a failure because the OESO and the client both saw the OE effort as having had limited impact upon the initial problems.

MISO

The client was a GEN who was responsible for a small staff unit that coordinated the use of computer facilities in a large staff agency. He asked two OETC-trained OESOs, an LTC and a CPT, to conduct a long-range planning meeting to establish a strategic plan for the unit. The two OESOs had had previous experience with the client and had some misgiving about accepting the assignment.

The intervention consisted of two workshops. The first workshop was conducted to identify issues and concerns. A wide range of staff attended this off-site meeting. The data were fed back to the GEN, who agreed to hold a second meeting with his senior staff to develop a long-term plan to address the issues raised. The OESOs conducted both workshops. During the second workshop, an action plan was developed. However, planned personnel turnovers and a structural reorganization meant that the action plan could not be fulfilled.

This case was evaluated as a failure because there were no concrete outcomes and because the action plan failed to take into account many known problems (e.g., most importantly, the imminent departure of the three top persons in the organization: the GEN and both the W and XO of the client unit).

Fort Firefly Job Enrichment Case

The original client was the CO of an Army computer installation, who reluctantly agreed to an OE project involving job enrichment because OE was being pushed by the base commander. The original OE consultants were two civilians; one was an experienced external consultant, the other was a former Army officer who had recently received his Ph.D. in management and was a civilian employee in the human resource management area. After the initial entry was negotiated, the main client was a CPT and the department head of computer operations, and the primary consultant was a young CPT who had recently become a part-time internal OE consultant. At the time, he had minimal OE training and no previous OE experience.

Survey data were collected using the Hackman-Oldham Job Diagnosis Survey and a group of departmental employees was formed to discuss the results of the survey and propose some action steps. The group met every two weeks for nearly three months.

The members of the group experienced considerable difficulty understanding the purpose of job enrichment. The OE consultant ultimately focused attention on more general work-related issues and away from job enrichment issues. The OE consultant expressed considerable frustration with the absence of guidance from the external consultants. This case was evaluted as a failure. Apart from a few minor changes in physical resources (e.g., a new candy machine was procurred for the employee lounge), there were no significant outcomes. Both the OE consultant and the client considered the effort a failure.

The Army Reserve Retention Case

The client was the chief of staff of a reserve division which was experiencing significantly lower than average retention rates. The client contacted the OESO office in a support command and requested help. A young OESO CPT, fresh from OETC, agreed to undertake the intervention.

The client agreed to an extensive diagnostic effort involving a survey similar to the GOQ and a series of group interviews. For this purpose, the OESO trained 20 reservists with appropriate backgrounds to collect the data.

The data were fed back to the client, who initiated both internal workshops to develop action plans and a briefing of his superiors on data which appeared to be applicable to all

reserve units. In evaluating the impact of the intervention, the OESO noted that retention rates improved dramatically during the six months of data collection.

This case was evaluated as successful because (1) a number of action recommendations generated in the problem-solving workshops were documented as having been implemented; and (2) a significant increase in retention rates occurred, apparently attributable to the OE effort.

The Army Reserve Training Case

An OESO, who had previously undertaken a large-scale diagnosis of a reserve division, informed a general, who was responsible for one of the areas that had received considerable criticism, of the findings but did not disclose specifics.

This general requested that the OESO collect additional data. The intervention consisted of two data collection and action-planning workshops conducted by the OESO, one with reserve company commanders and one with reserve battalion commanders. The OESO believed that the client's goal was to act on the information generated in the workshps. In fact, the client's real objective was to make other general officers aware of the need to reorganize reserve training responsibilities which at the time were divided among a number of these general officers.

The workshops generated a considerable amount of data, which the OESO later organized and fed back to the client. As part of the design, the client and a number of other senior officers listened to a briefing prepared by the workshop participants.

This case was evaluated as a failure. No outcomes were specified, and the OESO expressed disappointment that nothing tangible had occurred and that the feedback from the workshops was not receiving the attention the client had promised.

II. INTERVENTION OUTCOME VARIABLES

To identify those characteristics of an OE effort that predict or are associated with a successful OE effort, it is necessary to distinguish between successful and unsuccessful interventions. The division of the ten cases into such categories was relatively straightforward, although the assessments were essentially subjective because of the almost total absence of any hard outcome data.

The basic decision rules adopted by the investigators for assigning cases to the categories of success and failure were:

- Did the client receive any clearly positive significant outcomes which either the OESOs or the client attributed to the OE effort?
- Did the client receive any clearly negative significant outcomes which the OESOs or the client attributed to the OE effort?.
- Does it seem reasonable to attribute these outcomes to the OE effort?
- How did the OESOs and the client generally assess the effort?

These four criteria involved objective and subjective assessments, on the part of the OE consultants, client, and researchers who observed the case, of the impact of the OE effort. While it was difficult to define what constituted a significant outcome for a client system or the basis for the client's or the OESO's subjective assessment of an OE effort, in all but one case there was consensus among the three categories of respondents on success-failure classification of the OE interventions. (The one disagreement is the Reserve Training case, as discussed below).

The six cases assigned to the successful category all had positive outcomes that could be attributed to the OE effort. The OESOs and the clients viewed the cases as successful, although not always 100 percent successful as in the G4 Logistics case. No clearly negative outcomes could be attributed to these six OE efforts. The four failure cases were homogenous in terms of outcomes. In one case, Fort Firefly, both the client and the principle OE consultant saw the OE efforts as misplaced. In two other cases, STACOM and MISO, there were no positive outcomes. The OESO in the STACOM case also demonstrated a significant amount of frustration with the absence of positive outcomes.

In the fourth case, the Army Reserve Training case, the client's immediate need for information was met, but from an external observer's and the OESOs' perspectives, the effort failed to produce any positive outcomes and the client did not respond to the information that the OESOs had helped to generate or implement any of the action recommendations generated in the planning/problem-solving phase of the effort. It should be observed that researcher-respondent interaction biases were perhaps greatest in the collection and evaluation of data on OE intervention outcomes. In only two cases (the Reserve Retention and Combat Intelligence operations) did the OE consultants "spontaneously" evaluate their efforts; all other outcome data were elicited from consultants and clients by the researcher's structured interview protocol. Consultant and client (and researcher) post hoc evaluation of an OE intervention as a success or failure may have been biased by this data collection process (e.g., probes concerning whether action steps developed by intervention planning sessions had actually been implemented, or if meaningful outcomes directly attributable to the OE intervention had occurred, may have led respondents who answered in the negative to conclude their OE experience had not been successful). The question here is whether the mere gathering or sharing of information can constitute an effective OE operation even if no actions or outcomes follow from acquisition of these data. The researchers' methodology tended to bias this judgment in the negative.

Outcome Variables

Outcome variables were broken into four major catetories: reactions, learning, behavior, and results. Reaction outcomes refer to changes in the client sponsors' or targets' feelings or "climate" perceptions. Reaction data are usually assessed using repondent-type measures, such as attitude surveys. Learning outcomes refer specifically to changes in the client sponsors' and targets' ability to articulate or demonstrate the skills, knowledge, or attitude transmitted by an intervention. Behavior outcomes refer to observable changes in the change targets' on-the-job behavior in the areas of job related skills, and group process skills, and the adoption of new job practices and procedures. Results refer to hard or "bottom line" performance related outcomes attributed to change efforts, and consist of three main categories: financial or other performance criteria; withdrawals or personnel actions which affect labor costs; and individual, workgroup, or organizational attributes that are objectively measurable.

Reactions

The reaction outcomes for the ten cases were summarized in five categories: perceived effectiveness of the OE effort, changes in attitude due to the OE effort, the establishment of new norms, reduced tension within the client system, and perceptions of the client system's organizational climate.

The change efforts were perceived by both the OESOs and clients as effective in the six successful cases. In one unsuccessful case, the Army Reserve Training case, the client perceived the effort as successful but the OESO was more pessimistic. In the remaining three cases, OESOs and clients expressed strong reservation about the effectiveness of the effort.

Positive attitude change was explicitly identified in two cases: the Fort West Transition case and the G4 Logistics case. There was little evidence of attitude change one way or the other in the remaining eight cases.

New, positively valued norms were mentioned in three successful cases: Fort Cox, Fort West, and the G4 Logistics cases. Successful transition workshop clients reported that they had established positive working/role relations with many of their officers in a short time; subordinates collaborated this perception in reporting that their new commanders were open and trustworthy. Tension release was explicitly mentioned in only one case, Fort Cox, although in the judgment of the authors, the OE effort at STACOM had raised tension among some organizational members.

Finally, organizational climate was reported as having improved in four successful cases: the Combat Intelligence, Fort Cox, the Mechanized Infantry, and the G4 Logistics case.

Learning

Learning outcomes, identified in four cases, tended to be limited to subjective self-assessment (e.g., awareness of one's managerial style) or assessment of others. The change sponsor in the STACOM case stated that he had begun to realize the importance of the effects his own behavior had on the rest of his staff. In the Mechanized Infantry Battalion case, the commander as a result of feedback stated that he realized his behavior was seen as controlling and that he needed to delegate more to his subordinates. In the two transition models, the new commanders noted that the principal benefit of the OE operation was accelerated "learning" about the problems and personalities with their new commands and staff. The only learning that did not take place was at the interpersonal level and involved the change sponsor in the G4 Logistics case who acquired meeting

management skills. The above outcomes represent primarily the subjective assessments of the OESOs or the client.

Behavior

Behavioral changes among participants in OE change efforts were again restricted almost exclusively to the successful cases.

At the skill level, the only concrete changes occurred in the G4 logistics case, where the client not only learned new meeting management techniques, such as agenda setting and listening techniques, but explicitly used them to improve the effectivenss of meetings.

Group process changes occurred in three cases: the Mechanized Infantry Battalion, Fort West, and the G4 Logistics case. Delegation reportedly increased in all three cases. At Fort West, greater openness between junior officers and the battalion commander occurred after the transition meeting. In the Mechanized Infantry Battalion case, greater initiative on the part of junior officers was observed in an organization system that had previously been described by its members as excessively controlled.

Approach adoption was evidenced in only one case and then only partially. The client in the Fort West transition case used within his own unit his experience with his own transition team-building activities. Changes in job procedures were introduced in two cases. New meetings, expanded communication channels, and clearer procedures for accepting new tasks were established in the G4 Logistics client system. In the Combat Intelligence case, the client system was reorganized, the work place was physically altered, and new standard operating procedures were introduced to reduce problems caused by missing personnel.

Results

Concrete results were identified in only one case. In the Army Reserve case, the OESO undertook a time series analysis of the retention rates of his client system and compare the data with the averages for similar reserve units. The data, although not subjected to any rigorous statistical analysis, do show an increase in retention rates during the period encompassing the change effort.

Summary

A considerable number of relatively concrete outcomes resulted from the six successful OE efforts, with most of the results being concentrated in five cases: the G4 Logistics case, the Fort West transition case, the Combat Intelligence case, the Army Reserve case and the Fort Cox transition case. The Mechanized Infantry Battalion case, while clearly more positive than the four unsuccessful efforts, was (by comparison with the six successful cases) less productive and more costly (extensive surveys are highly labor intensive and therefore relatively expensive).

III. ORGANIZATIONAL EFFECTIVENESS STAFF OFFICER CHANGE AGENT VARIABLES

OESO change agent variables were summarized in three categories:

(1) characteristics;

(2) competencies and skills; and

(3) roles.

Characteristics variables included demographic data (age, sex, race, military rank), values and attitudes, job-related training, work experience, and consulting experience.

Competency variables were hypothesized to fall in one of four groups: (1) helping relationship skills required to establish a trusting and productive relationship with the client; (2) diagnostic skills concerned with observing and analyzing relative data about organizations; (3) initiatory skills required to identify, and stimulate clients to implement, organizational improvement recommendations; and (4) management skills required to organize and administer effectively the steps in an organizational effectiveness operation.

Role variables describe the change agent's approach in terms of type of role (advocate, expert, trainer, collaborative problem-solver, interpersonal processor) and a rating of the change agent on ten role dimensions.

OESO Change Agent Characteristics

Eighteen OE consultants were observed in work on the ten OE operations. Four OE operations were conducted by a single change agent, four by a team of two OESOs, and two by a team of three OESOs. The number of OESOs working on an operation did not affect its success or failure. Generally, the number of OESOs reflected the complexity of the cases.

Demographic Variables

The age of the OESO change agents observed ranged from 30 to 45 (average = 34.8) years of age and was a direct function

of their military rank. All eighteen OESOs observed were males. Seventeen were white, one was black. Sixteen of the eighteen OESOs were military officers, ranging in rank from O3 (Captain) to O5 (Lieutenant Colonel). Three O5s, four O4s, and nine O3s were observed. Two of the change agents observed were civilians, one a GS9 staff agency employee who functioned as a para-professional "internal OE consultant", and one a Ph.D. level consultant on contract from a private consulting firm. As indicated by Figure III.1, none of these demographic variables appeared to have any association with the success or failure of OE operations. This finding is consistent with the literature review (Spencer & Cullen, 1978) which found no theoretical or empirical reasons to indicate that demographic characteristics of change agents should affect organizational development intervention outcomes.

Values and Attitudes

Values and attitudes of the 18 change agents were assessed by empirically coding responses to open-ended interview questions: "What do you see as the purpose of OE in the Army? What attitudes or values do you think are implicit in it?"

Four attitude/value descriptions could be distinguished.

1. Achievement: Scored when a subject stated explicitly that he believed the purpose of OE was to "impact on the bottom-line, improve the operational readiness of Army units, help units become more efficient and/or effective in the accomplishment of their mission"; that is, statements which showed direct concern with task or mission accomplishment results.

2. Personal: Scored when a subject mentioned that OE had had an impact on his personal growth and development, or his relations with his family (e.g., "OE is the best thing that's ever happened to me. I think it's greatest impact has been in how I relate to my wife and kids ").

3. Change Awareness--"Evangelical" Concerns: Scored when a subject indicated that the purpose of OE was to "shake things up, introduce new ideas, bring a 19th century organization into the modern world," statements which indicated that the subject believed the primary objective of OE was to increase awareness or effect change, without specifying the type of change desired.

FIGURE III.1

Demographic Characteristics of OE Consultants (N=18)
Associated with Successful and Unsuccessful OE Operations

Demographic Variables	Frequency: Success (6 cases)	Frequency: Failure (4 cases)	Total	Mean	Range
1. Age	--	-	--	34.8	30-45
2. Sex					
• male	12	6	18	--	--
• female	0	0	0	--	--
3. Race					
• white	12	5	17	--	--
• black	0	1	1	--	--
4. Military Rank					
• 05 (LtCol)	2	1	3	--	--
• 04 (Maj)	3	2	4*	--	--
• 03 (CPT)	7	2	9	--	--
• Other (Civilians)	1	1	2	--	--

*One OESO, a Major, was involved in both a success and a failure operation.

4. Interpersonal: Scored when a subject stated that the purpose of OE was to "help people relate to one another better" (i.e., improve interpersonal relationships without relating or stating the relationship of improved interpersonal functioning to a task or mission accomplishment outcome).

More than one attitude or value could be scored for a subject. For example, all subjects scored for citing personal values also cited achievement purposes for OE.

The most notable finding concerning OESO attitudes and values, as shown in Figure III.2, is the very high percentage (83 percent) of consultants who cite achievement as the primary purpose of OE, and the corresponding low percentage (6 percent) which cite interpersonal concerns exclusively as the purpose for OE. These data contrast sharply with the concern found in other studies of the OE system (Spencer, 1978) about an over-emphasis on interpersonal relationships at the expense of mission accomplishment outcomes in OE practice.

While the trend is not statistically significant, the data presented in Figure III.2 indicate that a higher percentage of successful OE consultants express achievement values. This tends to confirm Franklin's (1976) finding that greater task orientation increased the probability of success of OE interventions conducted by both internal and external change agents.

Job-Related Experience and Training

Fourteen of the eighteen OE consultants observed had attended the Army's organizational effectiveness training course. Three of the remaining four consultants were "paraprofessional" internal consultant assistants who had received some training from the OESOs for whom they worked. The remaining consultant was a civilian with a Ph.D. in management. Sixteen of the eighteen OE consultants had graduate training in management or the behavioral sciences. Eight had courses toward a Master's degree, seven had attained this degree and one had post-Master's education. One-third of the consultants had an Army sub-specialty in adjutant, personnel, or administrative work. As indicated in Figure III.3, completion of the Army's OETC program (and post-graduate study) may increase the probability of a consultant's success. It should be observed, however, that one of the most successful OE operations was conducted by a GS9 civilian who had no formal training in organizational development techniques, and the least effective operation involved the external civilian consultant who had a Ph.D. degree.

FIGURE III.2

Attitudes and Values of OE Consultants
Associated with Success and Failure OE Operations

Attitude/Value	Frequency		
	Success (N=12)	Success (N=12)	Success (N=12)
1. Achievement	11 (92%)	4 (67%)	15 (83%)
2. Personal	5 (42%)	4 (67%)	9 (50%)
3. Change Awareness "Evangelical"	5 (42%)	4 (67%)	9 (50%)
4. Interpersonal	1 (6%)	1 (6%)	2 (12%)

Almost all of the OE consultants had both command and staff work experience, reflecting OETC selection procedures, and the normal sequence of military careers.

Consulting Experience

The OE consultants observed had served from 1 to 48 months in OE positions; average experience was 15.4 months. The number of interventions conducted by these consultants ranged from 1 (reported by two consultants) to 100+ (also reported by two consultants); the mean number of OE operations conducted by OESOs was 28.6. The definition of a OE operation varied considerably: Some OESOs included only completed operations, others included initial client contacts. As illustrated in Figure III.3, somewhat greater consulting experience may be associated with an increased probability of success. The subjects interviewed strongly believed that they had become more proficient with increased experience.

The researchers' observations tend to confirm this belief. Specifically, more experienced consultants appeared to be more realistic and more flexible in their application of OE techniques. Experienced OESOs were more likely to report modifying OE language, simplifying data feedback formats, adapting workshop designs to meet specific client needs; being willing to do administrative work for a client where necessary in order to facilitate the OE operations; and providing expert advice to clients when that adivce was requested. In general, more experienced consultants indicated a greater task and outcome orientation, and a greater willingness "to do what works, rather than what we were taught OE is supposed to be."

OE Consultant Competencies and Skills

Consultant competencies and skills may be defined as those personality or behavior variables which distinguish effective from ineffective consultants. These variables may be identified by thematic analysis of critical incidents reported by a criterion sample of particularly effective as opposed to average consultants (McClelland, 1977) or by analysis of successful versus unsuccessful incidents (Flanagan, 1954). In the present research, because a criterion sample of superior versus average OE consultants was not available, consultant competencies were identified in two ways: (1) hypothesized competencies described by OE consultants in response to the interview question, "In your experience, what OESO behaviors caused OE operations to succeed or fail?" and (2) presence or absence coding of hypothesized competency variables in critical incidents of successful and unsuccessful OE operations reported by respondents.

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FIGURE III.3

OE Consultants' Job-Related Training, Work Experience, and Consulting Experience Associated with Success and Failure Interventions

Training/Experience	Success (N=12)	Failure (N=6)	Total (N=18)	
1. Job-Related Training				
• OETC	11 (92%)	4 (67%)	14 (78%)	
• Graduate study none <MA(8) MA(7) >MA(1)	12 (100%)	4 (67%)	16 (89%)	
• Admin. Specialty (41, 42)	4 (33%)	2 (33%)	6 (33%)	
2. Experience				
• CO Command	11 (92%)	4 (67%)	15 (83%)	
• Staff (e.g., G-3)	12 (100%)	5 (83%)	17 (94%)	
3. Consulting Experience	Mean	Mean	Mean	Range
• # Months as OESO	16.4	13.6	15.4	1-48
• # Interventions	23.1	17.6	28.6	1-100+

Based on the literature review (Spencer & Cullen, 1978), four groups of competency and skill variables were identified: (1) the ability to create or establish a helping relationship with a client (create an atmosphere of psychological safety); (2) diagnostic skills; (3) initiation skills; and (4) management skills.

Establishing a Helping Relationship

This competency group involves the ability to create an environment of psychological safety and consists of the skills required to establish a trusting relationship with clients: the ability to understand the client's position and feelings at all stages of the change process (accurate empathy); a valuing of the client that stops short of patronization (positive regard); and personal consistency or the congruence (genuineness).

As listed in Figure III.4, six specific competencies or skills related to this group were identified by respondents and/or were coded in critical incidents reported by them.

1. Positive Expectations/Regard: the ability to make the client feel that he or she is liked and valued by the OE consultant, and that the OE operation is likely to have a positive outcome.

2. Accurate Empathy: the OE consultant's ability to listen and accurately understand his clients' needs and objectives and feelings.

3. Goal Congruence: the degree to which the OESO communicates that he shares his clients' goals and cultural standards (e.g., appearance, language, and standards of military courtesy).

4. Genuineness: the extent to which the OE consultant is perceived as being a real person, sincerely believing in what he is doing, as opposed to being phony or merely playing a role.

5. Emotional Self-Control or Neutrality: the degree to which the OE consultant can maintain an independent perspective and not become too emotionally involved in his clients' problems.

6. Reassurance: the degree to which the OE consultant is able to effectively respond to his clients' doubts (e.g., reassuring the client that any data collected about his organization will be kept confidential).

FIGURE III.4

OE Consultant Competencies Associated with the Success and Failure of OE Operations

Absolute Frequency

Competency	Espoused Hypothesis: OE Consultant Perceptions of Why OE Interventions Succeeded/Failed			Presence/Absence in Critical Incidents of Success/Failure OE Operations (coded by researcher)		
	Presence→Success	Absence→Failure	Total	Presence→Success	Absence→Failure	Total
I. ESTABLISHING HELPING RELATIONSHIP (Atmosphere of Psychological Safety)						
1. Positve Expectations/Regard	2	1	3	1	0	1
2. "Accurate Empathy": listened, accurately understood client's needs, objectives	4	5	9	5	4	9*
3. Goal Congruence	2	0	2	5	2	7*
4. Genuineness	0	0	0	2	0	2
5. Emotional Self-Control, neutrality	2	3	5	1	0	1
6. Reassurance (e.g., re: confidentiality)	0	0	0	3	0	4
II. DIAGNOSIS						
1. Scouting: accurate assessment of client readiness	0	0	0	1	3	4
2. Data Analysis (accurate identification of problems)	1	0	1	3	5	8*
III. INITIATION						
1. Knowledge, "expert power" persuasiveness	2	2	4	1	4	5
2. Persistence	0	2	2	2	1	3
3. Flexibility: modify to meet client needs	1	2	3	2	3	5
4. Contract, Negotiate	5	7	12	2	3	5 ?
5. Present Feedback: simple, clear, confront real problems	1	3	4	9	5	14**
6. Implementation; propose, coach client in implementation of realistic actions steps	1	0	1	13	6	19**
7. Outcome Orientation: standards for documentation of outcomes	2	1	3	6	1	7*
IV. MANAGEMENT						
1. Planning: preparation contingency plans	0	1	1	2	1	3
2. Administration	1	0	1	3	1	4
3. Group Process	0	2	2	1	0	1
4. Team Building with OESO partners	0	1	1	2	1	3

The two variables found to be most strongly associated with OE consultants' success were accurate empathy and goal congruence. Effective OE consultants demonstrated an ability to hear and understand their clients' concerns and objectives, and both presented themselves as and reported genuinely believing in what their clients wanted to do. Those consultants who were unable to hear what their clients really wanted, and/or did not present themselves in a way that was congruent with the clients' standards or did not share their clients' objectives for the OE operation were likely to fail.

Diagnosis

Diagnostic skills refer to the consultant's ability to generate, collect, and analyze information about a client's system. McClelland (1975) has called this skill "critical thinking," the cognitive ability to discern the important points in a large amount of undifferentiated data, make critical distinctions and to support inferences with specific examples or other evidence.

Two diagnostic skill competencies were observed in the critical incidents and cases reported by those consultants:

1. Scouting: The ability to accurately assess a client's readiness to begin an OE effort. Effective scouting tended to prevent OE consultants from initiating interventions with clients which were not likely to succeed. (In three of four incidents in which this variable was cited, scouting acted as "an early warning system" which enabled OE consultants to avoid an inappropriate intervention.)

2. Data Analysis: The OE consultants' ability to accurately identify problems in assessment data and conceptualize for clients (and hence be able to present to clients) problem data that were clear, parsimonious, and readily understandable. This competency clearly distinguished successful from unsuccessful OE intervention cases and incidents.

Initiation

Competencies included in the initiation category describe OE consultants' ability to help clients identify and feel a need for change, formulate specific action steps for attaining desired change goals, provide clients with "coaching" assistance in implementing action steps, and document implementation outcomes. Seven specific competencies were included in this category:

1. Knowledge, "Expert Power," Persuasiveness: OE consultants' ability to answer a client's technical questions, explain why they were doing or recommending specific intervention steps, and persuasiveness in convincing the client that following the steps they recommended would be an effective course of action. This skill was most often cited in the negative. Unsuccessful respondents who reported that they were unable to explain to clients what they were doing or lacked the expert knowledge to be credible cited this lack of credibility as the reason that their OE operations failed.

2. Persistence: OE consultants' ability or willingness to continue to contact, present options to, or follow-up with clients. Consultants reported that success in some cases resulted only on their fourth or fifth attempt with a given client; others reported "it (an intervention) failed basically because I gave up."

3. Flexibility: OE consultants' willingness and/or ability to modify their preferred approaches to meet specific client needs, and to hear and learn from feedback, "see when something's not working and change it fast." This competency may be related to both accurate empathy and goal congruence skills cited above under "Establishing a Helping Relationship." Consultants who heard their clients' needs accurately and acted to meet them tended to be successful. Conversely, OESOs reported failing when, "I didn't see he wasn't buying what I was dishing out in time" or "I stuck with my agenda where it wasn't going over well, and as a result the whole workshop bombed."

4. Contract, Negotiate: OE consultants' ability to establish with clients a clear understanding (usually in writing) of what both parties agree to do over the course of an intervention. OESOs strongly believe that effective contracting leads to successful OE operations. OE consultants who negotiated clear contracts at the beginning tended to report operations that "went off without a hitch." Respondents reported that unsuccessful OE operations resulted from either lack of clarity in contracting (e.g., "We never nailed down exactly what I was going to do...the operation turned into mush.") or lack of understanding (e.g., "He thought I was going to do one thing and I understood that I was going to do another.").

Examination of OE intervention critical incidents and cases, however, suggests that the role of contracting in successful operations is less clear-cut. In two successful cases, no formal contract between the consultant and client existed; two unsuccessful cases had formal contracts which were followed to the letter. What is really important in

contracting appears to be the consultant's accurate moment-to-moment perception of and congruence with his client's needs, and the ongoing "psychological" contract of trust and confidence between consultant and client. Clear contracts, if about the wrong issues, do not lead to success.

Formal contracts may not be needed where consultant and client are "on the same wavelength" or in close communication. The best consultants appear to be continually recontracting with the client to respond to the client's changing situation. These data suggest that contracting, in the sense of consultant-client clarity and congruence about what is to occur at each point in the OE operation, is extremely important. Continual flexibility or "planned renegotiation" (cf. Sherwood & Glidewell, 1973) is needed betweeen consultant and client in order to keep the contract "fresh." Preparing a formal written contract, in the form of a letter of content or memorandum, may be a useful norm-setting exercise at the beginning of the operation, but is no guarantee of success if the situation or issues dealt with by the OE operation change (as most inevitably do). OE consultants must continually establish and work with a "living contract" that changes as the client's needs change.

5. Present Feedback: OE consultants' ability to present feedback data in a simple, clear format and to cite or confront real problems. In successful OE interventions, consultants reported that they presented a few (rarely more than five) specific problem statements, supported by accurate data that clients felt were "dead right on." Respondents reported failures when they "overloaded the client" with information (e.g., presented data in "undigested" form; for example, several hundred items on thirty flip charts) and when they did not confront the real problem (i.e., did not report to the client, for fear of offending him, the problems or data they really felt were significant, or "did not stand their ground" in documenting supporting data for their diagnosis when the client either proved resistant or initially disbelieved the diagnosis or the data).

Confrontation in this sense seems to mean intellectual honesty in presenting data in a straightforward, unemotional manner, "calling the shots as I see them." A consultant's emotional self-control or neutrality, avoidance of taking an advocate role in the sense of using data to promote the consultant's agenda or presenting problem data in a punitive fashion, seemed to be critical.

The ability to present clients with meaningful feedback data appeared to be one of the most important competencies in predicting success in OE operations.

6. Implementation: OE consultants' ability to propose to clients, and coach them in, the implementation of realistic action steps to improve their organization. Consultants who were able to help clients identify specific problem-solving action steps that the client had a realistic chance of implementing (i.e., actions which the client had the power or controlled the resources to implement) were much more likely to be able to document actual results for their OE operations. Consultants who either did not get their clients to identify specific action steps for improvement or abetted clients in setting unrealistic action steps (i.e., actions that due to lack of resources or power the client did not have much chance of implementing) were likely to fail.

This competency was the most often cited predictor of the success or failure of OE operations.

7. Outcome Orientation: OE consultants' standards for and documentation of the outcome of their operations. OE consultants who thought in terms of the results outcome that an OE operation could effect were significantly more likely to identify and present assessment data in a format that suggested implementation opportunities; suggest and coach clients in implementation of specific, realistic implementation steps; and be able to recall and document process and outcome results of OE operations. In other words, OE consultants who were concerned about and looked for the hard results were able to document those results. Consultants who did not think in terms of outcomes were typically unable to recall anything that had resulted from their efforts.

Management

Competencies and skills included under the management category described OE consultants' ability to organize projects; manage funds, materials, and participants involved in complex schedules of operation activities over time; manage group process in specific intervention activities; and work effectively in teams with fellow consultants.

1. Planning: OE consultants' ability and/or motivation to prepare thoroughly and formulate contingency plans for OE operations. Good planning was associated with success; failure to anticipate and plan for "what could go wrong" was associated with unsuccessful OE operations.

2. Administration: OE consultants' ability to manage the details of OE operations (e.g., schedules, materials, and data processing). OE operations tended to succeed when administrative tasks were conducted smoothly; in one case, poor administration was associated with the failure of an operation.

3. Group Process: OE consultants' ability to manage group process in seminar or training programs (e.g., to confront or control disruptive members of groups, encourage the participation of silent members, and keep groups on track). Interestingly, given the emphasis placed on management of group process in OESO training, this skill was cited surprisingly infrequently as contributing to the success or failure of an OE operation.

4. Team Building with OESO Partner: OE consultants' ability to plan and work collaboratively with fellow consultants. OE consultants cited smooth team functioning as contributing to the success of two operations, and in one case reported that open disagreement between two OESOs caused an operation to be unsuccessful.

In comparison with the other three competency groups, management skills were cited relatively infrequently as prime causal factors in the success or failure of OE operations.

Summary

In summary, the critical competencies that predict OE consultants' success appear to be:

- accurate empathy and goal congruence in establishing a helping relationship with a client (i.e., hearing and respecting clients' objectives);
- data analysis, clearly and accurately identifying clients' problems;
- presenting feedback that enables clients to identify real problems;
- helping clients identify and implement realistic action steps for organizational improvement; and
- concern for documenting the results of an OE operation.

OE Consultant Roles and Role Dimensions

OE Consultant Roles

The roles taken by the 18 OE consultants observed were assigned to one of five general role descriptions identified in the literature review (Spencer & Cullen, 1978). These roles, described in order of decreasing directiveness and task orientation, and increasing consultant and client collaboration and focus on interpersonal issues, were:

1. The Advocate or Confrontor: a change agent who unilaterally confronts or attacks a client's existing beliefs or ways of doing things irrespective of the client's own sense of his felt needs or problems; then, using techniques ranging from threats and coercion to persuasion, advocates that the client adopt new attitudes or behaviors. Examples of this type of change agent role include confrontative affirmative action/race relations facilitators and "militant" humanistic psychologists.

2. The Expert: a change agent who gives the client specific technical advice from a position of superior expertise, position, or prestige. The expert-client relationship is usually described in relatively cut and dried terms: The expert does not condescend to clients nor attempt to force his views, but merely provides information on demand. One type of expert role is that of the resource linker, a change agent who can secure financial material, knowledge, or other resources for his client. A second is the researcher or subordinate technician, a relatively junior consultant tasked with collecting data or proposing alternatives in a specific area. Examples could include a consulting engineer hired to provide a structural appraisal of a building, or an informations systems specialist tasked to organize an automated data processing facility.

3. The Trainer or Educator: a change agent who functions primarily as a teacher, using structured workshops or management development courses as the principal mode of intervention, with clients assuming a student role.

4. The Collaborator in Problem Solving: a change agent who acts as a catalyst, helping clients identify and generate solutions to tasks or interpersonal problems in a collaborative way. Most consultants using survey-guided development or task process consultation methods function in this role.

5. The Processor: a consultant who focuses primarily on interpersonal relationships, as opposed to task or content issues. He intervenes by being supportive and caring, reflecting on or processing individual behaviors and group dynamics, or directly counseling client personnel.

As indicated in Figure III.5, most OE consultants observed operated in the collaborator in the problem-solving role. Somewhat surprisingly, few used the interpersonal processor role, again suggesting that concerns about excessive emphasis on interpersonal approaches in Army OE practice are unwarranted. The only role clearly negatively associated with successful OE operations is that of the advocate. OE consultants failed if they did not share their clients' objectives and/or if they attempted to sell or push their own agendas over those of their clients.

Role Dimensions

The OE consultants observed were also rated high, medium, or low on ten role dimensions suggested by the literature review (Spencer & Cullen, 1978) to be useful in taxonomizing the consultant role.

1. Specific Technical Expertise: a consultant's familiarity with the client's work process or technology (e.g., specific military intelligence operations or computer data processing methods). Most OE consultants observed were low in specific technical expertise. Internal consultants recruited from the agencies in which they worked as clients tended to be more knowledgeable about their organization's specific technology than did their OESO supervisors or external consultants. Specific technical expertise did not appear to predict success or failure in OE operations.

2. General Expertise: a consultant's knowledge of generic organizational management research principles relevant to the client's operation. Most of the OE consultants observed, by virtue of their military backgrounds and graduate education in management, were rated moderate to high in general expertise. Moderate expertise in general management techniques may be associated with successful OE operations. Certain respondents noted that their background in general management both gave them greater credibility with clients and enabled them to offer a wider range of implementation alternatives than that provided by OE techniques alone.

3. Interpersonal Expertise: a consultant's competence in interpersonal transactions; for example, in listening,

FIGURE III.5
OE Consultant Roles and Role Dimensions Associated with Success and Failure OE Operations

Consultant Role*		Frequency: Success (N=12)	Failure (N=6)	Total (N=18)	Inference
1. Advocate		0 (0%)	4 (67%)	4 (22%)	• Most OE consultants operate in a collaborator in problem solving role
2. Expert		1 (8%)	1 (17%)	2 (11%)	
3. Trainer		5 (28%)	1 (17%)	6 (33%)	
4. Collaborator in Problem Solving		12 (100%)	5 (83%)	17 (94%)	• Advocate role is negatively associated with success
5. Interpersonal Processor		2 (17%)	1 (17%)	3 (17%)	
*Note: More than one consultant role can be scored in an OE operation.					
Role Dimension					
1. Specific Technical Expertise	H	2 (17%)	1 (17%)	3 (17%)	• Most OE consultants are low in specific technical expertise
	M	1 (8%)	0 (0%)	1 (6%)	
	L	9 (50%)	5 (83%)	14 (78%)	
2. General Management Expertise	H	1 (8%)	0 (0%)	1 (6%)	• Most OE consultants are moderate in general expertise (moderate expertise in general management may be associated with success)
	M	10 (83%)	2 (33%)	12 (67%)	
	L	1 (8%)	4 (67%)	5 (28%)	
3. Interpersonal Expertise	H	1 (8%)	1 (17%)	2 (11%)	• Most OE consultants use moderate interpersonal expertise
	M	10 (83%)	3 (50%)	13 (72%)	
	L	1 (8%)	2 (33%)	3 (17%)	
4. Power	H	0 (0%)	0 (0%)	0 (0%)	• Most OE consultant roles are low in power
	M	2 (17%)	2 (33%)	4 (22%)	
	L	10 (83%)	4 (67%)	14 (78%)	
5. Locus: • Independence/ Marginality	H	10 (83%)	1 (17%)	11 (61%)	* Independent or marginal locus is associated with success
	M	1 (8%)	3 (50%)	4 (22%)	
	L	1 (8%)	2 (33%)	3 (17%)	
6. Goal Congruence	H	10 (83%)	0 (0%)	10 (56%)	* Goal congruence is associated with success
	M	2 (17%)	2 (33%)	4 (22%)	
	L	0 (0%)	4 (67%)	4 (22%)	
7. Task Focus	H	5 (42%)	2 (33%)	7 (39%)	• Most OE consultants are moderate-high in task focus
	M	6 (50%)	3 (00%)	9 (50%)	
	L	1 (8%)	0 (0%)	1 (6%)	
8. Interpersonal Focus	H	1 (8%)	1 (17%)	2 (11%)	• Most OE consultants are moderate-low in interpersonal focus
	M	6 (50%)	1 (17%)	7 (39%)	
	L	5 (42%)	4 (67%)	9 (50%)	
9. Directive vs. Collaborative	H	0 (0%)	3 (50%)	3 (17%)	* Collaborative as opposed to directive style is associated with success
	M	4 (33%)	1 (17%)	5 (28%)	
	L	8 (67%)	2 (33%)	10 (56%)	
10. Didactic	H	0 (0%)	1 (17%)	1 (6%)	• Most OE consultants are low-moderate in use of didactic/training*
	M	5 (42%)	2 (33%)	7 (39%)	
	L	7 (58%)	3 (50%)	10 (56%)	

counseling, or managing interpersonal group dynamics. Most OE consultants were described as moderate in interpersonal expertise. As a role variable, interpersonal expertise did not predict success or failure of OE operations.

4. Power: the status or influence of an OE consultant vis-a-vis the client. A consultant's power may be a function of his personal characteristics (e.g., a commanding presence or academic reputation), his formal position (e.g., military rank or legal powers as Affirmative Action representative), or the support given him by the client. Most of the OE consultants observed were rated low in power. Degree of power did not appear to predict success or failure of OE operations.

5. Locus--Independence/Marginality: a consultant's independence as opposed to personal involvement in the client's situation. This dimension is sometimes referred to as "marginality" (Brown et al., 1977), where high marginality implies perspective, an independent frame of reference, detachment, and neutrality. Independent or marginal status appears to be associated with success of the OE operations observed. As noted, OESOs who assumed an advocate role with respect to their clients tended to be unsuccessful.

6. Goal Congruence: the extent to which the consultant and client share the same objectives, values, standards of appearance, conduct, and the like. Goal congruence tended to be strongly associated with success in the OE operations observed. OE consultants who genuinely understood and shared their clients' goals and objectives were more likely to be trusted and accepted by their clients, and were better able to get clients to hear feedback data, to generate implementation steps, and to implement organizational improvement actions which resulted in documentable outcomes. OE consultants who did not understand or share their clients' goals and objectives tended to be mistrusted or accepted only on a *pro forma* basis by clients. (Such clients typically complained, "He (the OESO) never really understood what I wanted.") Feedback data from consultants low in goal congruence tended not to be "heard" by clients, with the result that most of these operations terminated after the assessment/data feedback phase.

7. Task Focus: a consultant's concern with individual, workgroup, and organizational performance. Most OE consultants were observed to be moderate to high in task focus. Surprisingly, the extent of task focus did not appear to predict successful as opposed to unsuccessful OE operations, perhaps because most of the consultants who adopted the advocate role negatively associated with success expressed strong task concerns about implementing their (as opposed to their clients') agendas.

8. Interpersonal Focus: the degree of a consultant's concern with individual feelings and non-task-related group dynamics. Somewhat surprisingly, most OE consultants were observed to be moderate to low in interpersonal focus in their actual interactions with clients. Once again, this finding tends to disconfirm the image of OE practitioners as excessively concerned with interpersonal aspects of organizational functioning.

9. Directive versus Collaborative: the extent to which a consultant unilaterally imposes diagnoses, intervention methods, or solutions on the client, as opposed to working collaboratively with the client to develop joint approaches. (This dimension differentiates the advocate and expert roles from the collaborator and problem-solving roles.) Low directiveness (i.e., a collaborative approach) is associated with success in the OE operations observed. These findings are consistent with the evidence that the collaborator in problem-solving role is more effective than the advocate role.

10. Didactic: the extent to which a consultant conceptualizes his role and acts as a trainer with clients who assume the role of students. Most OE consultants observed were rated low to moderate in their use of didactic/training approaches. Several respondents reported that while they initially had conducted many training courses (primarily LMDC workshops), as they achieved greater acceptance and/or were better able to market their consulting services, they did progressively less training. Successful OE consultants emphasized that they conducted training only when the need for it was specifically indicated by client assessment data. In these cases, the OE consultant targeted training to specific client problems; for example, a communications workshop for a workgroup which was experiencing communications difficulties or a time meeting management seminar for a harried commander and his staff who requested assistance in preparing for a REFORGER exercise.

Summary

OE consultant demographic characteristics appear to have little bearing on their success or failure in OE operations. Analysis of competency and role variables indicate that consultants most likely to be successful are those who adopt a "collaborator in problem-solving role," which emphasizes accurate empathy and goal congruence in establishing a helping relationship with clients, and diagnosis and initiation competencies oriented to identifying realistic action steps and achieving documentable organizational improvement outcome results.

IV: CLIENT VARIABLES

Client variables are described in the organizational change literature as antecedent variables which have implications for the roles and intervention methods change agents use during the intervention process. Client variables can be divided into three categories: (1) client system characteristics, (2) client problems, and (3) client recipient characteristics. The ten OE cases are analyzed below in terms of the three categories of client variables to estimate which variables have an impact upon the success of an OE effort.

Client System Characteristics

Theoretical and empirical research indicates that the characteristics of client systems play a part in determining which type of OE intervention process is likely to be most effective and to which issues an OESO needs to pay particular attention. Spencer and Cullen (1978) developed a list of those client system characteristic variables most widely referred to in the organizational change literature (see Figure IV.1). This section of the report provides a summary of the results of analysis of the ten OE cases in terms of this set of variables.

Demographic Variables

These variables included organizational size, age, mission (industry product line or service function), private versus public ownership, occupational status of employees, geographic and national location, and area of operations. These characteristics have obvious implications for change efforts: size has implications for the magnitude of the effort; mission, ownership, occupational status of employees, and nationality have implications for the types of interventions that may be appropriate. Demographic characteristics do not directly describe how an organization functions, but may predict other organizational characteristics which are more directly relevant.

Size

Seven of the ten client systems had less than fifty members. The smallest client system had seven members, the

FIGURE IV-1

Organizational System Characteristic Variables

Organizational Characteristic	Illustrative Resulting Issues For Change Agents & Clients
<u>Organization Demographics and Structure</u>	• Magnitude and location of effort
Demographics • size, age, mission, geographic location, resources, nationality (Srivasta, et al., 1975)	• Type of intervention culturally appropriate
Structure • components → "Organizational variation" (Giblin, 1976) → Antagonistic factions (Warwick, 1973; Biggart, 1977) → Different professional groups (Sebring & Duffee, 1977; Topliss, 1974) → Union vs. nonunion (Kochan & Dyer, 1976; Franklin, 1976; Yoshido & Torihara, 1977; Srivasta et al., 1975) → Multiple clients (Brown, 1976; Clark, 1975; Sebring & Duffee, 1977) → Cliques (Tichy, 1973)	• Amount of conflict generated by any change in goals, values or practices • Who should be involved in sanctioning any change effort, in generating diagnoses, and in determining action steps
• authority and reporting relationships → Organizational "style" (Giblin, 1976) → Structuring (Hickson et al., 1969) → Roles defined by law (Siegfried, 1975) → Upper-level policies and regulations (Toronto, 1975)	• The level at which significant changes can take place and can be expected to "take" • Size and make-up of target group that can be worked with meaningfully • Degrees of freedom possessed by change agent & client

(Figure IV-1 continued)

→ Civil service system constraints (Giblin, 1976; Warwick, 1973) → Union contract constraints (Kochan & Dyer, 1976; Yoshido & Torihara, 1977)	
<u>Job Technology</u> → Production process (Woodward, 1965) → Integration of work-flow process (Pugh et al., 1969) → Job design principles (Davis & Taylor, 1976)	• Ramifications of any direct or indirect attempt to change the work process • Amount of necessary interaction between organizational members • Size and composition of target group that can be worked with meaningfully
<u>Subordinate</u> → Demographics: age, sex, race, ability, education, skill level, length of employment, geographic origin, nationality, culture (Srivasta, et al., 1975) → Occupational status (Srivasta, et al., 1975) → Motivation (Srivasta, et al., 1975; Hackman, 1977; Litwin & Stringer, 1968) → Peer leadership (Bowers & Hausser, 1977)	• Degree and type of employee motivation • How employees prefer to be managed
<u>Workgroup/Organizational Climate</u> → Likert & Likert, 1976; Bowers & Hausser, 1977; Litwin & Stringer, 1968; Spencer, Klemp & Cullen, 1977) → Trust (Dunn, 1978; Friedlander, 1970) → Morale (Yin et al., 1977) → Progressivism (Franklin, 1976; Clark, 1975)	• Interpersonal norms the change agent will face • Openness of system to change, innovation • Amount of risk-taking that will be acceptable

(Figure IV-1 continued)

→ Concentration of authority (Hickson et al., 1969; Siegfried, 1975) → Compliance (Etzioni, 1975) → Lower level influence (Bowers & Hausser, 1973) → Power (Perrow, 1970) → Legitimacy of interpersonal influence (Bennis, 1966)	• The level at which change agent needs to seek sanction for change • Effective way of influencing
<u>Management</u>	
• managerial goals	
→ Goal orientation (Perrow, 1970) → Human resource primacy (Bowers & Hausser, 1973)	• Type of criterion change agent will be evaluated on
• management style	
→ Supervisory leadership (Bowers & Hausser, 1977) → Peer leadership (Bowers & Hausser, 1977) → Lower level influence (Bowers & Hausser, 1977) → Authoritarian vs. consultative (Vroom & Yetton, 1973) → Task vs. people orientation (Blake & Mouton, 1969; Hersey & Blanchard, 1977; Reddin, 1970) → Distribution of Information (Dunn, 1978; Meyer, 1976) → Style of conflict resolution (Clark, 1975; Likert & Likert, 1976; Blake, Shepard & Mouton, 1964)	• Interpersonal norms the change agent will face • How change will be implemented • How conflicts are resolved
• management control (reward and punishment contingencies)	
→ Personnel procedures (Evans, 1974) → Motivational procedures (Bowers & Hausser, 1977; Etzioni, 1975) → Reward structures (Purcell, 1974; Evans, 1974)	• Means available for overcoming resistance or enhancing involvement • Likelihood that change will "take"

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(Figure IV-1 continued)

System (Outcome) Effectiveness

- → Technical competence (Stuart-Kotze, 1971; Carter, 1976)
- → Interpersonal competence (Stuart-Kotze, 1971)
- → Effectiveness (Giblin, 1976)
- → Maturity (Hersey & Blanchard, 1977; Derr, 1976; Spencer, 1977)

- Change method that client most readily able to use
- The system's ability to tolerate additional strain associated with a particular change strategy
- Change agent role most appropriate to client group stage of development

Organizational Uncertainty

- internal
  - → Stability of budget (Giblin, 1976)
  - → Planned personnel turnover (Siegfried, 1975)
- internal or external
  - → Time horizon (Giblin, 1976; Siegfried, 1975)
  - → Unplanned personnel turnover (Warwick, 1973; Sebring & Duffee, 1977)
  - → Task environment regularity & predictability (Dunn, 1978)
- external
  - → Changes in market situation (Frank & Hackman, 1975; Luke et al., 1973)
  - → New legislation (Sebring, 1977)

- Flexibility of change strategy
- Time horizon of change effort
- Where change effort should focus attention, e.g., pre-job or on-the-job training
- Who should be principal target of change

largest had several hundreds of thousands. Size had no visible impact on the success of an OE effort: Four of six successful cases and three of four unsuccessful cases were small.

Age

Nine of the ten client systems had existed in more or less their present form for a considerable period of time. The one exception was the MISO client system, which had existed as a distinct organization for less than two years at the time of the OE effort. One of the issues, the vagueness of its mission, in the MISO case was related to the client organization's age. The MISO case suggests OESOs should be alert to problems of goal and role clarification in work with start-up or "temporary system" clients.

No clear relationship existed between the age of a client system and the success of an OE effort.

Mission

The missions of the ten cases can be classified in a number of ways. The simplest and most straightforward categorization is between combat and support missions. Of the ten cases, five had primarily combat missions and five had primarily support missions. The success rate among clients with combat missions was greater than those with support missions: Four out of five combat mission clients had successful OE experiences, whereas only two out of five support mission clients experienced success.

Status

The occupational status of most client systems was moderate; that is, most of the individuals involved in the OE efforts were mid-level military officers (O2-O5) or civil servants (GS9-GS13). All ten client systems could be termed as having professional level status. No relationship existed between a client system occupational status and the success of an OE effort.

Centralization

Nine of the ten client systems were geographically centralized. The one exception, the Reserve Training system, was dispersed across the country. This decentralized system complicated the task of the OESOs involved because of the problem of trying to manage numerous training tasks in different places; collection and analysis of data from many diverse client personnel was more difficult; and realistic

implementation action steps capable of impacting on this large system were harder to identify. (In fact, this operation was considered a failure because no implementation took place.)

Structure Variables

These variables include the number and nature of the components or subgroup within the client system, the formal authority relationships among components, and the types of rules and role requirements in the client system.

Number of Organizational Subgroup Components

Figure IV.2 summarizes the number of components in the ten client systems. OE efforts in client systems with no components or subgroups had the greatest chance of success. Both OE efforts in cases with more than one component were unsuccessful.

However, only in the STACOM case did subgroups play an important role in determining the success of the OE effort. In this instance, the multiplicity of different subgroups (i.e., union-management, male-female, military-civilian, young-old) greatly complicated the task confronting the OESO.

Authority Structure

The chain of command was the dominant authority relationship in seven of the ten client systems. Of the three remaining client systems, two involved staff support functions where the client system members reported to more than one supervisor. The third system was undergoing a re-organization and lacked a clear leader.

The majority of the client systems appeared relatively autonomous in terms of the change undertaken or considered as part of the OE effort. In two cases, however, the client systems were highly politicized, which effectively reduced the autonomy of the client sponsor. The OE efforts in these two systems proved to be unsuccessful.

Management Variables

These variables include the goals, styles, and control mechanisms of an organization's leaders and managers. The term "system goals" refers to the client system's overt or covert objectives. Management goals in the simplest division can be classified as task accomplishment or interpersonal

FIGURE IV.2

Distribution of Components by Cases

Number of Components or Subgroups	Successful Cases	Unsuccessful Cases	Total
0	4	0	4
1	2	2	4
2	0	1	1
3	0	0	0
4	0	1	1

relations. Management style describes the ways in which the leaders in the client system manage. The simple twofold division of management style into authoritative versus consultative practices, one of the most common methods (Vroom & Yetton, 1973), was used. Management control describes the reward and sanction powers managers can use to motivate and control subordinates.

Management Goals

Given the small size of most of the client systems, the system's goal tended to reflect the goals of the client sponsor. Management goals of the ten client systems were predominantly in the task accomplishment category. Interpersonal relations were an explicit management goal in only three client systems.

The data suggest that OE efforts in client systems with task accomplishment management goals are more likely to be successful than those with interpersonal relations management goals.

Management Style

The management style in eight of the ten client systems was authoritative. Due to insufficient data on the remaining two systems, determining the management style was not possible. The one-sided distribution is not particularly surprising, given military norms for leadership and the dominance of the chain of command.

Management Control

The management control system in military organizations is fairly standardized. At the officer level, it consists primarily of a performance evaluation system. More direct disciplinary action or sanctions, such as forced transfers, do exist for unit commanders. All ten cases operated under the same military system. However, not all the members of the client system were subject to the military system of management control. In three cases, significant numbers of civil servants were members of the client system. OE efforts in all three cases proved to be unsuccessful, although only in one instance, the STACOM case, did it appear that this difference contributed to the absence of success.

Technology Variables

These variables include the design of jobs, the nature of the work process, and the nature of the work environment.

(63)

Nine of the ten client systems involved principally managerial or professional types of jobs. The one exception was the computer operation at Fort Firefly, which resembled a batch production work process. Technology had little observable impact on the results of the OE effort, principally because of the task of variation in client system technologies.

Subordinate Variables

These variables are described in terms of demographic characteristics (age, sex, race, education, geographic origin, nationality, culture), motivation, type and level of skills, nature and amount of motivation, level in the organizational hierarchy, and peer leadership (the extent to which employees encourage one another to perform well). The implications of organization subordinate antecedent characteristics include the following generalizations. Subordinate motivation must be considered in job redesign: Motivated workers with higher level growth needs will respond to enriched or enlarged jobs with more responsibility, but employees lower in motivation may not (Srivasta et al., 1975). Lower level workers are more likely to be affected by changes in organization and context structure. Better educated, higher level professional and technical employees in noncrisis situations requiring individual discretion and innovation are more likely to respond to consultative or participative interventions and managerial styles. Lower level, less motivated subordinates in routine or crisis situations may respond more to unilateral structured interventions and managerial styles (Blanchard & Hersey, 1977).

The general population of the vast majority of client systems consisted of subordinates who were well-educated, white males with strong military backgrounds. Most subordinates were either officers or mid-level civil servants who had previously been military officers.

The characteristics of subordinates did have some impact on the success of the OE efforts, although in many instances it was difficult to collect sufficient data regarding this. In two cases, STACOM and Fort Firefly, subordinate characteristics contributed to the failure of the OE effort. In STACOM, differences in sex between a subordinate and the OESO played an important role in limiting the latter's effective performance. Ultimately, the OESO obtained the help of a female OE consultant to overcome this block. At Fort Firefly, the OESO was working with skilled computer technicians who had little motivation or experience in changing their work environments. Given the technical nature of their jobs, the absence of any motivation to initiate change left the OESO in a difficult position.

(64)

Organizational Climate Variables

Organizational climate refers to the general nature of the interactions within a client system or workgroup. Interpersonal norms, for example, help to define how the OESO and client handle problems that emerge as part of the change process.

Concrete data on the organizational climates were available for only a few of the cases. Where the data did exist, the climates were relatively poor. An evaluation of the statements client sponsors and the OESOs made concerning climate shows that seven of the ten client systems had poor organizational climates, and only one client system, Fort Firefly, had a relatively good climate. The main reason for the poor climates was an absense of clarity, with members of the client system stating that they did not know what their mission was nor what was expected of them.

Although the data suggest that organizational climate was more or less the same for successful and unsuccessful OE efforts, it did play a role in influencing the outcomes in three unsuccessful cases. In the STACOM and MISO cases, the climate appeared to be considerably poorer than in other cases. This suggests that the OESOs were tackling a considerably more difficult task. By contrast, the climate at Fort Firefly was so good that neither the client sponsor nor the members of the client system felt any motivation to seriously consider an OE change effort.

These results support Bowers and Hauser's (1977) findings that OE efforts in organizations with relatively good climates and those with relatively poor climates have the lowest impact.

System Effectiveness Variables

These variables include both an organization's general capacity to accomplish its goals and the degree to which it succeeds at attaining those goals. The two principal effectiveness variables are system performance and system satisfaction.

Few hard data on the objective performance of client systems were available. The subjective data developed in the assessment phase of OE operations indicated that only three client systems--STACOM, MISO, and G4 Logistics--were experiencing serious performance difficulties.

Clear data on satisfaction were equally difficult to obtain, although there was only one clear instance where the members of the client system were relatively satisfied. In the other two instances where quantitative data were collected, the client systems evidenced a reasonable amount of dissatisfaction. Overall, the data suggest that in five out of ten cases, sufficient dissatisfaction existed to prompt the client to contact the OESO. In two of the remaining cases, the two transition models, no obvious dissatisfaction was apparent. In the last three cases, the OE effort was initiated principally for political reasons.

Organizational Uncertainty Variables

These variables include any social or institutional factor, inside or outside the client system, that reduces the predictability of activities within the organization.

Overall, the level of uncertainty in the ten client systems was high due to personnel turnover. Uncertainty was relatively higher in the unsuccessful OE efforts and played a significant role in the outcomes of two cases: STACOM and MISO. In the STACOM case, the original sponsor of the OE effort announced his retirement shortly after the beginning of the OE effort. The OESO, moreover, reported directly to the original change sponsor, which created additional difficulties. In the MISO case, three of the senior client system members, including the client sponsor, left the client system shortly after the completion of the assessment and planning phase of the OE effort, with the result that no implementation took place.

Turnover occurred in the successful cases also, but in two instances (i.e., the two transition models) it was the stimulus for an OE effort . In two other cases, the OE effort succeeded despite turnover in key personnel. In the Combat Intelligence case, although the client sponsor was "short" (due to leave his position), he remained in the job long enough to implement actions recommended by the OE effort. In the second case, the Mechanized Infantry case, the lead OESO was short, but effectively planned and managed the transfer of his client to another OESO.

In summary, uncertainty in the form of personnel turnover tended to have a detrimental impact on OE efforts, although not always enough to cause an effort to fail. Unless there is an explicit contract to deal with transition cases, OESOs probably should not take clients in which the change sponsor is likely to leave before he or she can implement plans arising from the OE operation. OESOs due to rotate should take pains to transfer their clients to succeeding OESOs.

Client Problems

Client problems can be defined in terms of three general categories: the locus of the problem within the client system, the type of problem, and the pressure (urgency or crisis) associated with the problem.

Problem Locus

Client problems can be located in terms of which organizational components are most affected by the problem. The main organizational components include management, job design, subordinates, workgroup process, climate, and relations with some aspects of the external environment. Client problems can also be located by organizational function. For military organizations, these functions include operations, various operational support functions, administrative and technical support, and strategic support functions. Finally, client problems can be defined by the number of individuals involved and the hierarchical positions they hold. The five most frequently identified client problem locations in order of increasing size are: individual, interpersonal, intragroup, intergroup, and system. Hierarchical positions can be simply broken down into top, middle, and lower management and nonmanagement. A further breakdown could include the number of levels within one of these latter categories.

The ten cases studied included a wide variety of problem locations, both between cases and within cases. Figure IV.3 summarizes the data for the four location categories outlined above. Note that individual client systems frequently have more than one problem and, therefore, frequency counts exceed ten.

The two primary organizational components involved in client problems are the workgroup and management. Not surprisingly, the organizational component least frequently involved is subordinates. The location of the client problems by organizational component had little observable impact on the success of the OE efforts.

FIGURE IV.3

The Locus of Client Problems

Problem Location	Success	Failure	Total
Organizational Component			
Management	2	3	5
Job Design	1	1	2
Subordinates	0	1	1
Workgroup	6	3	9
External Relations	1	2	3
Organizational Function			
Operations	4	0	4
Operational Support	1	1	2
Administrative Support	0	2	2
Technical Support	0	1	1
Strategic Support	1	0	1
Size			
Individual	1	2	3
Interpersonal	0	2	2
Intragroup	3	2	5
Intergroup	0	1	1
System	3	3	6
Organizational Status			
Top Management	1	2	3
Middle Management	5	1	6
Lower Management	0	0	0
Nonmanagement	0	1	1

Sharper differences emerged when client problems were analyzed by organizational function. Operations was the most frequent location of client problems, with strategic support functions (e.g., intelligence, strategic planning, and technical support functions) being the least frequent locations of client problems. Successful OE efforts dealt with problems primarily in operations functions, whereas unsuccessful OE efforts dealt with problems in support.

Differences also occur with respect to the location of problems by organizational status. The majority of problems occur at the middle management level, followed by the top management level. The client problem at the nonmanagement level occurred at Fort Firefly, where middle management was involved early on but the focus of the OE effort was on the nonmanagement work force. (In the Fort Firefly case, no real client problem existed, although the OE consultants defined problems as existing in the job design components of an administrative support function associated with the organization's computer operations.)

Finally, client problems are manifested most frequently at the intragroup and system levels. Intergroup and interpersonal problems are infrequent, although where they do occur they are associated with unsuccessful change efforts. This suggests that OESOs may experience more difficulty handling conflict situations than other types of problems, although these situations are relatively rare.

In summary, successful OE efforts are more likely to occur when the client problem is located in a mid-level operations function and involves the workgroup. Unsuccessful OE efforts are more likely to occur when the client problem involves an interpersonal or intergroup issue or is located in a top level support function.

Types of Problems

Spencer and Cullen (1978) identified five main types of problems that summarize the typical problems facing organizational development consultants. These are defined as follows:

1. Task Problems. These stem from how a system's work is organized and carried out. This category includes job design and the technological and administrative aspects of organizing and carrying out tasks. Structural components such as decision making are included if they result primarily from the way a task is designed. Examples of this type of problem include inefficient job scheduling, ambiguous roles, and inadequate technical training.

2. Goal Problems. These stem from either failure to state clear goal purposes or objectives, or failure to meet established goals. The labels in this category, as shown in Figure IV.4, stress the absence of goals, rather than poor performance. The inclusion of problems due to failure to meet goals, etc., permits greater coverage, in that specific problems or symptoms (e.g., short falls in projected profits, productivity, or reenlistments) are readily assigned to this category.

3. Interdependence Problems. These stem from the necessity of engaging in joint agreements or joint action. Included here are conflict resolution problems arising from the allocation of scarce resources, the determining of wage bargains, and the distribution of work loads or responsibility. Behavioral manifestations range from strikes and go-slows to a continuing failure to pay attention to the needs of certain groups.

4. Power Problems. These stem from the distribution and the utilization of power. Included here are problems such as the misuse or abuse of authority, the failure to follow orders, or the excessive use of or reliance on rules and regulations.

5. Climate Problems. These stem from the general pattern of behavior attitudes and feelings that exist in an organization. This is a catchall category and covers such diverse behaviors as rate setting, an unwillingness to do more than the minimum, and a lack of cooperation.

The following observation also needs to be made about this typology. The problem categories identified in the literature in no way exhaust the reasons that clients may have for initiating organizational interventions. In many instances, the client may not have an identifiable problem or admitting complaint in the clinical sense (although problems often surface in the course of the intervention). This suggests that clients can have growth and social motives as well as deficiency or "problem" (or external coercion) motives for initiating organizational intervention activities.

Figure IV.4 is based on the author's assessment of the main client problems and indicates that task and interdependence issues are the most frequent problems facing OE consultants. The type of problem appears to have little impact upon the probability of a successful OE effort.

As indicated above, it is important to recognize that not all OE efforts begin with a well-defined problem nor is the initially presented problem necessarily the one that the

FIGURE IV.4

Types of Problems

Problem Location	Success	Failure	Total
Task Problems	3	4	7
Goal Problems	1	1	2
Interdependence Problems	4	2	6
Power Problems	1	2	3
Climate Problems	1	2	3

client and consultant chose to focus on. In five of the ten cases, the OE effort involved the definition or redefinition of a problem. This redefinition of the problem was more likely to occur in unsuccessful OE efforts, suggesting that the initial contracting or diagnosis had not produced very clear definitions of the presenting problems.

In three of the unsuccessful cases, change sponsors and their OESOs did not agree on the definition of the problem; as noted, this lack of congruence predicts the failure of an OE effort.

Pressure of the Problem

Pressure refers to the client's felt need to resolve a particular problem. Generally, pressure can be assessed in terms of the urgency of the problem and the centrality of the problem to the continued performance of the system.

In the ten OE cases reviewed, external pressure was almost entirely absent. Clients had issues of concern, but they were in almost all cases relatively free to ignore the problem. The one possible exception was the Fort Cox transition model, where the client sponsor was clearly anxious about his new command and needed some help to overcome his concerns. This absence of pressure places the OESO in the position not only of helping the client evolve solutions to the problems, but also of continuing to motivate the client to implement the changes agreed upon. In the more successful cases, the OESO did this primarily through surfacing information which motivated the client to act.

To summarize, problem locus more than problem type seems to impact the success of an OE effort. The urgency or importance of a problem is less crucial, at least in the ten cases analyzed, than the ability of the OESO to create a sense that client action is desirable, important, and feasible.

Client Recipients

The effectiveness of change efforts depends upon the quality of the interactions between the change agent and two groups of individuals: change sponsors and change targets. While client system characteristics influence the quality of the interactions at a general level, personal factors have a more direct impact on the change process. Variations in the attributes of both the change sponsors and targets influence the development of the change process and the choice of an appropriate change method and change agent.

Change Sponsor

Considerable empirical research (Spencer & Cullen, 1978) has demonstrated the importance of the support of the change sponsor in sustaining a change effort. Support here involves lending authority or legitimacy to the change effort, providing material resources, acting in congruence with the goals of the change effort, and demonstrating a personal commitment and involvement in the change effort. Figure IV.5 summarizes the analysis of the ten cases.

Status of Change Sponsor

In nine of the ten cases, the change sponsor had enough status, as compared to the status of the change target, to legitimize the change effort. The one exception was the STACOM case, where the identity of the change sponsor was confused and the most active change sponsor was not respected by a number of his subordinates.

Status Discrepancy Between Change Sponsor and OESOs

Of more importance was the status of the change sponsor compared to the status of the OESO. In three unsuccessful cases, the OESO had difficulty working with change sponsors who had clearly superior status. In the Reserve Training and MISO cases, the change sponsors were general officers and the OESOs had a difficult time trying to act as consultants rather than as subordinates.

Resource Adequacy

In the cases studied, the only scarce resource confronting OESOs was time, and this was a factor in only two cases. In one case, the OESOs changed their intervention strategy to meet time resource restrictions; in the second, the OESO was transferred before the OE effort was completed. In other respects, the OE efforts suffered no resource constraints.

Managerial Style of Client Sponsor

As Figure IV.5 indicates, the majority of change sponsors were authoritative, with a small minority acting as pacesetters; that is, leading by example. In the majority of cases, this meant the OESOs had to work to maintain some congruence between the OE processes and the change sponsor's style. In most instances, this led to the OESO's attempting to "coach" the change sponsors to reduce their fairly directive leadership styles and help facilitate the OE process, as by inviting feedback and participant suggestions, listening without

FIGURE IV.5

Change Sponsor Characteristics

Change Source Characteristic	Success	Failure	Total
Status: (Power to Affect Change)			
• Yes	6	3	9
• No	0	1	1
Status Discrepancy Between Client and Consultant			
• Yes	1	3	4
• No	5	1	6
Resource Adequacy			
• Yes	4	4	8
• No	2	0	2
Managerial Style:			
• Authoritative	5	3	8
• Pacesetter	1	1	2
Commitment			
• Yes	5	1	6
• No	1	3	4

commenting, asking clarifying questions, and avoiding authoritarian statements. In the case of one of the two pacesetters, the OESO at STACOM worked to increase the change sponsor's authoritativeness as part of the change effort.

Commitment of Change Sponsor to the OE Effort

Perhaps the most crucial determinant of the success of the OE efforts was the change sponsor's commitment to the effort. In two instances, the failure of the change sponsor to follow-up on the work begun by the OESO meant that potential benefits were largely lost. In both cases, such a continued commitment required additional effort, particularly since both the change sponsors involved were generals. Unfortunately, it is conceivable that this led to a reluctance on the part of the OESOs to follow-up.

The Change Target

The change target(s) in the OE operations studied usually consisted of the change sponsor's immediate subordinates or workgroup. Four change target attributes have received emphasis in literature: values, power, skills, and needs.

Change target values are important in predicting the acceptability of different types of change methods. A change target group that does not value power-sharing, open communications, interpersonal trust, or sensitivity can be expected to resist collaborative change strategies, at least initially.

Change target power is important in two respects. First, the more power a target group has access to, the greater is its ability to resist change (Lee, 1977). The second reason for considering the power of a target group is that the target group may want to adopt certain changes or to engage in certain activities which others may find disturbing.

Just as a change process makes demands of the skills of the change agent, so too does it make demands of the skills of the other participants in the change effort. Friedlander (1970) and Hellreigel and Slocum (1976) note that many change methods demand a certain cognitive sophistication on the part of the change target. Other commentators have stressed the need to design change processes in keeping with the dominant skills and level of skills of the target group.

Change target needs also have to be considered. Armenakis et al. (1977) note that the level of need strengths acted as a moderating variable with respect to the correlation between job characteristics and worker satisfaction. The authors

observe that, on the basis of this finding, job enlargement or job redesign will be more effective where the target groups have high growth need levels. Similar conclusions can be derived from MacMillan and Langmeyer's (1975) report of a change effort in the New York City Public Schools, where the immediate needs of the target group of teachers was a reduction in the crisis atmosphere (or in Maslow's terms, a predominance of physical needs) rather than an increase in participative decision making.

Change Target Values

In seven of the ten cases, the values of change targets were congruent with those of the OE effort. OESOs seldom had any difficulty in getting the client targets to generate diagnostic information or engage in problem solving. The values of three groups were at odds with the OESOs: In the Fort Cox transition, a number of company commanders distrusted the OESO because of what had happened to some of their colleagues in another OE effort. In the Fort Firefly case, the change target exhibited a high level of dependence upon authority figures such as the OE consultant. This resulted in considerable difficulty for the consultant because he was utilizing a self-directed change strategy and because he knew nothing about the jobs he was endeavoring to help the change targets redesign. Finally, in the STACOM case, at least one critical member of the change target group distrusted the efforts of anyone who appeared to be aligned with her superior.

Change Target Power

Since the majority of the change targets were professionals, they possessed considerable ability to resist any change effort they found disturbing. Overt resistance to the change effort, however, was identified in only two cases: Fort Cox and STACOM. The resistance in the former was short lived, but the resistance of one change target in the STACOM case effectively brought the OE effort to a halt.

Demands on Change Target

The majority of the change processes did not make excessive demands of the change targets where the OESO's skills were adequate. One clear exception was the Fort Firefly case, where the change target experienced considerable difficulty in understanding what was meant by "job enrichment." A more complex example occurred in the MISO case, where OESOs initiated a problem-solving session that neither they nor the change target group could effectively manage. The consequence was that the goals which were set failed to reflect many of the issues that had already been surfaced.

Change Target Needs

Change target needs, with the exception of the Fort Firefly and STACOM cases, were generally in line with the high growth needs normally associated with effective change efforts. However, little data existed to make an accurate determination of the change target needs. In the two exceptions, the dominant needs of at least some of the members of the change target were at the low end of Maslow's need hierarchy.

To summarize, the change sponsor variables appear to be more important in determining the effectiveness of a change effort than do the change target variables. In particular, the absence of a major status discrepancy between the OESO and the change sponsor, and the change sponsor's continued support, increase the probability of a successful OE effort.

Summary

Client variables appear to have a significant impact on the effectiveness of OE efforts. Success is associated with OE efforts in task-focused operational client systems that are performing moderately well, that are relatively unpolitical, and that have low personnel turnover. OE appears to have the greatest impact on mid-level workgroup problems and in situations where the client and consultant agree on the nature of the problem. OE consultants seem to work most effectively with change sponsors who are respected by their subordinates, who have a status comparable to that of the consultants, and who are willing to continue their support of the OE effort even after the consultant has completed his agreement. OE tends to be unsuccessful in situations where the client system is performing very poorly or very effectively, and where the client system is made up of a number of potentially competing groups. OE consultants appear to be least effective when dealing with interpersonal problems involving high levels of conflict and with high status clients.

V. INTERVENTION METHOD AND PROCESSES

Intervention Method

A review of the organizational development literature indicated intervention methods could be classified into ten categories. This taxonomy was used to classify the methods used in the ten cases. The ten categories of intervention methods are:

1. Individual consultation (counseling/coaching) methods usually involve a change agent in a one-on-one helping interaction with a single client. Change methods can range from individual psychotherapy, with the objectives of bringing about intrapsychic changes, to provision of expert information and advice.

2. Unstructured group training methods involve individuals in a group that lacks any task purpose or structure except that of understanding individual or group dynamics. T-groups, sensitivity training, and uninstrumented racial awareness workshops are examples of this type of intervention. Team-building is included in this category (as well as in subsequent categories) because unstructured groups are sometimes used with work teams for team building purposes.

3. Structured group training methods include management and group development courses that are structured to change participant attitudes, convey some specific theory or body of knowledge, or develop specific skills. Structured educational experiences usually contain readings, lectures, and exercises, and may be "instrumented"--include tests or surveys used to give participants feedback on their attitudes, knowledge, or skills level. Examples include communications, problem solving, Grid Phase I, transactional analysis, MBO, supervisory skills, and equal opportunity training courses or workshops. Team building can be included in this category when used with work and as part of a shared educational experience.

4. Process consultation methods include any intervention used with small groups or work teams to identify and solve common problems. Task process consultation efforts focus on solving technical problems (e.g., work flows). Interpersonal process consultation sessions focus on "people problems": for example, communication patterns in meetings, clarifying

roles and responsibilities, or resolving conflicts among team members or between two competing teams. Team building is most clearly included in this category.

5. Survey-guided development (SGD) methods include interventions which collect data about client workgroup or organizational functioning and feed data back to workgroups to be used by them in problem solving. Three SGD designs can be distinguished, in order of increasing effectiveness:

- data handback, in which data are simply collected and returned to the client without change agent participation in problem solving;
- action research, data feedback, and action planning, in which data are collected and fed back to clients in a problem-solving meeting during which goals are set and action steps are planned to implement changes; and
- concepts training/data feedback/action planning, in which data are collected and fed back in the context of a structured workshop during which participants learn theories of management, the concepts behind the survey, and problem-solving skills, then practice using this learning to set goals and plan actions for improving their work situation.

6. Job redesign methods include interventions which alter the tasks, responsibilities, interaction patterns, or the technical and physical environment intrinsic in the work itself--the jobs performed by client personnel. This category includes job enlargement, enrichment, and rotation; work simplification; changes in working conditions; and some structural changes (e.g., the creation of autonomous work teams to increase employee interactions).

7. Personnel systems methods include interventions implemented through traditional personnel functions: (1) recruitment, selection, training, and placement of new employees; (2) termination, reassignment, or retirement of existing personnel; and (3) manipulation of rewards and sanctions such as pay, profit-sharing, incentive bonuses, fringe benefits, and other nonmaterial rewards (e.g., titles). Equal opportunity programs and manpower planning systems are included in this category.

8. Management information and financial control systems methods include the introduction of management by objectives (MBO), performance evaluation, cost-benefit analysis, and other methods of tracking and evaluating employee or workgroup performance.

9. Organizational design methods include any structural change in organizational authority and reporting relationships: creation of "matrix" project teams, decentralization, or consolidation of units.

10. Integrated approaches is a final catchall category for interventions which include more than one of the methods described above. It should be observed that many intervention categories overlap, and methods are in no way mutually exclusive. An intervention may begin with a survey-guided development sequence (number 5 above) which stimulates managers to plan for and act to provide management development training (4), job redesign (6), decentralization of responsibility (9), and a management by objectives system (8) with bonus incentives (7). The descriptive label(s) given an intervention are less useful than a detailed specification of the processes it involves.

Results

As indicated in Figure V.1, the most frequently chosen intervention methods were survey-guided development and process consultation. Three of the five cases using survey-guided development employed relatively standardized questionnaires. In the remaining two cases, the OESOs developed their own surveys based on interviews with members of the client system. All cases using survey-guided development followed up the data collection with some form of problem-solving meeting. Process consultation methods in all instances consisted of a problem generation phase, in which either the OESO collected the data from individuals or the OESO facilitated the group's generation of problems, and a problem-solving phase. The intervention method used had no clear relationship to the overall effectiveness of the OE effort. Only one example of the more specialized socio-technical intervention methods (methods 6, 7, 8, 9), job redesign/enrichment, was employed. Even in this case the primary consultant, lacking substantive expertise in job analysis, used a survey-guided development approach based on feedback of the Hackman-Oldham (1974) Job Diagnostic Survey.

In three cases, there was evidence that more than one intervention method was used. One case, as noted, combined survey-guided development and job redesign. In two other cases OESOs combined process consultation problem-solving methods with structured management development training and individual consultation with the client. The number of methods used had no obvious relationship to the outcome of the intervention.

FIGURE V.1

Choice of Intervention Methods

Intervention Method	Success	Failure	Total
Individual Consultation	1	1	2
Unstructured Group Training	0	0	0
Structured Group Training	0	0	0
Process Consultation	2	3	5
Survey-Guided Development	4	1	5
Job Redesign	0	1	1
Personnel Systems	0	0	0
Management Information, etc.	0	0	0
Organizational Design	0	0	0
Integrated Approaches	1	2	3

Intervention Process Variables

On the basis of existing empirical and theoretical research Spencer and Cullen (1978) identified eight major phases in an intervention. Each phase contained tasks or intervening variables that the literature suggested were important to a successful organizational change effort. The phases, tasks, and intervening variables are summarized in Figure V.2.

Figures V.2 to V.8 present the analysis of the ten cases in terms of this model. This data strongly suggests that differences do exist in the way successful interventions were undertaken. The data also indicates that not all the intervening variables are as important as the OD literature suggested. In some instances, the occurrence of the task led to dysfunctional consequences.

Phase 1: Scouting

In this phase, change agents identify and "market" potential clients, work together to build an effective team, and collect preliminary data about potential or identified client personnel and problems. The intervening variables which may predict success during this stage are:

1.1 Identification of Potential Early Adopters

Change agents should focus marketing efforts on clients with a reputation for innovation or known to be interested in or favorably disposed toward OD approaches. As early adopters also tend to be "opinion leaders," clients most likely to experiment with an intervention are also those likely to influence other potential clients to do so as well.

1.2 Active Marketing of Services

Services should be actively marketed through as many channels as possible to stimulate potential clients' awareness, interest, and trial of OD approaches. Active, if low key, professional marketing efforts are probably as important for internal consultants as for their private sector counterparts, particularly in voluntary programs where continued support will eventually depend on a flow of clients requesting service (Rogers, 1962; Havelock, 1969).

1.3 Collection of Advance Data on Potential Clients

Scouting potential clients by checking performance indicators (recent assignments, apparent felt needs, backgrounds

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FIGURE V.2

Phase 1: Scouting

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
1.1	Identify early adoptors	Yes	1	2	3	Client initiated majority of cases.
		No	5	2	7	
1.2	Active marketing	Yes	0	3	3	Active marketing not essential to successful OE effort and may create difficulties.
		No	6	1	7	
1.3	Collect advance data on client	Yes	5	0	5	Advance data on client more likely in successful cases.
		No	1	4	5	
1.4	Team building among change agents	Yes	3	2	5	Team building took place in the majority of cases where it was appropriate.
		No	0	1	1	
		N.A.	3	1	4	

of key personnel) can help change agents prepare for initial client contacts, appear credible and caring for obviously having done their homework, and be more likely to respond or propose appropriate next steps (Navy HRM Cycle, Munger, Spencer, & Thomson, 1976).

1.4 Change Agent Team Building

Consultant teams must be clear about respective members' roles, feel some consensus about values and objectives, and be reasonably secure consultants because confusion and incongruence may be disconcerting to clients. Change agent teams which have shared expectations, have worked out a sensible division of labor, and are comfortable working together stand a greater chance of success (Bennis & Schein, 1969; Beer, 1976; Buchanan, 1971).

Results

Significantly more of the successful cases were client initiated. There was no evidence that the identification of potential early adopters or active marketing on the part of OESOs had a negative impact on the outcome of the intervention. The cases suggest that OESOs who engaged in active marketing were more likely to push their own agendas at the expense of hearing or understanding the client's problems or objectives for the intervention and consequently to find themselves involved with clients who had hidden agendas. This occurred in three of the four unsuccessful efforts. Marketing appears to be unnecessary when the client has a specific concern and initiates the contact with the OESO.

Although the OESOs in the successful cases did not initiate client contacts, they were considerably more likely to collect advance data on their clients, than were those OESOs in the unsuccessful cases after the initial contacts had been made. This finding supports the recurring pattern of greater sensitivity to data on the part of OESOs in the successful cases.

Team building among the OESOs (working together on an intervention) took place where feasible in five of the six cases. In the one instance, Fort Firefly, where team building was feasible but did not take place, there is evidence to suggest that its absence had an adverse impact on the effectiveness of the intervention. The OE consultant involved was very inexperienced but was left to work on his own by a more experienced external consultant.

Phase 2: Entry

In this phase, change agents make initial contact with clients, assess client readiness for change, and contract with one or more client representatives for next steps in the intervention. Kolb and Frohman (1970) and others stress that entry involves a psychological as well as a task or legal contract: A sense of interpersonal trust and confidence must be established between consultant and client for subsequent activities to be successful (Derr & Demb, 1974). Intervening variables which may predict success in this phase include:

2.1 Support of Top Management

Numerous authors stress the importance of contacting and gaining the active support of persons as high in the management hierarchy as possible. OD practitioners rank this variable highest in priority (ASTD, 1975).

2.2 Development of Contact Networks and Reference Group Support

Effective change agents appear more able to meet a larger number of key members in a client organization, making friends and establishing a group of potential supporters (McClelland, 1975; Havelock, 1959; Yin et al., 1977). More effective change agents may be more aware of the various actors, factions, and influence mechanisms in client organizations.

2.3 Congruence with Change Agent Norms, Values, and Culture

Sensitivity to client norms, such as language, appearance, social status, education, may be critical to change agent acceptance. Shared qualities increase interpersonal attraction, trust, and credibility--key ingredients in forming psychological contracts (Berschied & Walster, 1969). Rank, experience in line assignments, and an ability to present OD concepts in military jargon may predict OESO success (Munger, Spencer, & Thomson, 1976).

2.4 Presentation of Intervention Alternatives Relevant to Client's Felt Needs

Change agents who listen carefully to clients to determine clients' felt needs and who then present intervention alternatives relevant to these needs will be more successful than consultants who attempt to sell their program irrespective of the client's needs (Havelock, 1969; Beer, 1976; Wittreich, 1966).

2.5 Agreement on Clear Objectives

Most authors stress the importance of consultant-client clarity and consensus on objectives for the intervention. Interventions appear likely to fail when the consultant implements his own agenda rather than responding to client needs, or when he surprises a client by doing something other than what that client thought had been agreed to. Objectives stated in behaviorally specific terms (Havelock & Havelock, 1973) and clearly related to the client organization's task or mission (Beckhart, 1969) may increase the chances of intervention success.

II.6 Detailed Contracting for Intervention Resources and Responsibilities

Client-consultant contracts which specify intervention structure, role relations, the specific change agent and client contact responsible for managing the intervention process, schedules of activities, cost, and professional relations minimize the chances of misunderstandings that may jeopardize the intervention (McGill, 1977).

2.7 Express Positive Expectations for Intervention Success

Positive expectations by change agent and client have a well-documented self-fulfilling prophecy effect. If participants are led to believe that the intervention has a high likelihood of resulting in meaningful changes, these results are more likely to be achieved. Conversely, if the intervention is seen as a routine exercise or "something that won't really change anything," the probability of success is reduced (Rosenthal, 1976; McClelland, 1975). Wittreich (1966) emphasizes the importance of reassuring clients by minimizing their feelings of risk or uncertainty about the intervention.

Results

The data in Figure V.3 suggest that what was crucial to a successful intervention was not so much the obtaining of a clear resource contract but the development of an understanding of the client's essential needs, a psychological contract. This is reflected in the higher frequency, in the successful cases, of explicit top management support (2.1), OESO congruence with client norms (2.3), and identification of specific next steps (2.4). OESOs in successful cases were more likely to strongly believe that the issues confronting the client were important (2.3). This, however, did not

FIGURE V.3

Phase 2: Entry

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
2.1	Gain top management support	Yes	5	1	6	*Within the client system, successful cases were more likely to have clear top management support.
		No	1	3	4	
2.2	Build contact networks	Yes	3	0	3	*Although infrequent, OESOs in successful cases were more likely to have developed contacts within the client system.
		No	3	4	7	
2.3	Change agents congruent with with client norms	Yes	5	0	5	OESOs in successful cases were more likely to identify themselves with the issues confronting their clients and/or the client norms.
		No	1	4	5	

(Figure V.3, continued)

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
2.4	Present next steps relevant to client felt needs	Yes	6	1	7	OESOs in successful cases design effort around the client's felt needs.
		No	0	3	3	
2.5	Agreement on clear objectives	Yes	4	2	6	The psychological contract between consultant and client needs to be clear. This does not mean that the objectives and and resource requirements have to be explicitly agreed upon before an OE effort can go forward.
		No	2	2	4	
2.6	Detailed contracting for intervention resources	Yes	4	2	6	
		No	2	2	4	
2.7	Change agent expresses positive expectations	Yes	0	0	0	Realistic expectations rather than negative or positive expectations are the hallmark of successful OE efforts.
		No	0	3	3	
		Mixed	6	1	7	

lead to any reluctance to confront clients on issues related to the problems nor to OESOs' excessive ownership of the problem. OESOs in successful cases were more likely to develop networks (2.2) within the client system. This, however, was not a frequent occurrence.

Resource contracts (2.6) did not appear to be crucial to the success of the OE effort. In two of the successful cases, no clear contract was agreed to. In both instances, the client felt it was inappropriate to make any formal commitments. By comparison, in the MISO and Fort Firefly cases, clear contracts were agreed to but in neither instance did they reflect the felt needs of the client.

In summary, what is essential in the entry phase is not the obtaining of a contract but the development of an accurate understanding and trust between the OESOs and their clients. Explicit contracts are not detrimental per se, but they do not predict success if they fail to reflect clients' real objectives for an intervention.

Phase 3: Diagnosis

This phase consists of activities by change agent and client to collect and analyze data about the client's system. Data collection can be formal or informal, and both change agent and client can take more or less active roles in collecting and interpreting data from observation, interviews, surveys, and other data collection methods. The diagnostic phase often includes planning activities which become part of the intervention itself. The following intervening variables may contribute to success in this and subsequent phases.

3.1 Active Client Participation in Data Collection

Clients who are appropriately motivated and who participate in providing information about themselves are more likely to own the resultant data and diagnostic conclusions. Respondents should understand why data are being collected, who will see those data, and how those data will be used. Respondent samples which include persons from more than one hierarchical level may provide more accurate data.

3.2 Accurate Diagnosis

An effective diagnosis should provide a client with both an accurate assessment of his actual situation and some indication of what an ideal situation would be. The tension or

discrepancy between the actual and the ideal states can provide motivation and direction for change (Kolb & Boyatzis, 1974; Boyatzis & Spencer, 1976). The presentation of the data and the change agent's diagnosis constitute a test of the effectiveness of the earlier phases of the intervention process because of the energy and tension that surround this phase (Argyris, 1970; Nadler, 1977). A good diagnosis includes a realistic appraisal of client resources and constraints which set parameters for possible intervention actions (French & Bell, 1973; Buchanan, 1971).

Results

As Figure V.4B indicates, OESOs in successful cases collected considerably more data and used more methods of data collection than did OESOs in unsuccessful cases.

Some form of data collection was used in nine of the ten cases. Data collection in the successful cases, however, was more systematic and reflected a more accurate assessment of the clients' needs. For example, in the Army Reserve Division case, the OESO searched for a survey that would be tailored to the special needs of his client. By comparison, in the Fort Firefly case, a standard survey was used prior to any assessment of its appropriateness. In the successful cases, OESOs used an average of nearly three different methods of data collection, as compared to the one method used by OESOs in unsuccessful cases.

These differences appear to be significant for two reasons. First, the more extensive data collection effort provided OESOs with a greater understanding of the client system, regardless of whether the data were used to develop a formal diagnosis of the system. Second, data provided OESOs with an important lever for change. The more systematic the data, the less likely it was that clients could dismiss or ignore the data.

Interviews and surveys were equally popular as methods of collecting data. Observations and document analysis were much less frequently used for diagnosing the functioning of client systems.

In those cases where the size of the client system was small, OESOs invariably collected data from all the organizational members. Of the three cases involving large client systems, only one (the Reserve Training case) collected data from a small representative group. The other two cases collected data from all available organizational members.

FIGURE V.4A

Phase 3: Diagnosis

Task		Occurrence				Comment
		Present	Success	Failure	Total	
3.1	Client participates in the data collection	Yes	3	2	5	Where standard, predesigned survey was used, there was little active participation on the part of the client in the collection of the data. Participation appears neither necessary nor sufficient for an effective OE effort.
		No	3	2	5	
3.2	Accurate diagnosis	Yes	4	2	6	Where applicable, the majority of OESOs developed accurate diagnoses. However, not all diagnoses were based on data that could be formally shared with the client system.
		No	0	1	1	
		N.A.	2	1	3	

FIGURE V.4B

Diagnostic Methods

Method	Success	Failure	Total
Individual Interviews	5	1	6
Group Interviews	4	1	5
Surveys	5	1	6
Observation	2	0	2
Other (e.g., document analysis)	2	1	3
Average Number of Methods Used	2.9	1.0	2.2

Active client participation in data collection occurred in six out of the ten cases but had no visible impact on the outcome of the OE effort.

Accurate diagnosis appeared to be important to the success in seven of the ten cases. (The remaining three cases were primarily team-building interventions.) Six of the seven assessments appeared to provide accurate diagnoses of client problems. No clear differences existed between successful and unsuccessful OE efforts in terms of the accuracy of the OESOs' diagnoses. In one case (MISO), however, where an accurate diagnosis was not developed, it caused the effort to fail because the action plans developed by the client organization were based on inadequate data and were neither appropriate nor realistic.

Phase 4: Planning/Problem Solving

During this phase, change agents feed diagnostic data back to client representatives and help them use this feedback to solve problems, set goals, and plan action steps for improving organizational functioning. Intervention activities can include training in concepts relevant to the OD process. The following intervening variables may predict success in this phase.

IV.1 Involve Work Teams in Family Groups

Several authors (e.g., Beer, 1976; Zeira, 1973) assert that interventions have the greatest impact when they involve natural work teams (e.g., a supervisor and his immediate subordinates). Alternatives are peer groups (all participants drawn from the same hierarchical level of the organization), cousin groups (participants drawn from several hierarchical levels), and stranger groups. These may be less effective because they cannot deal with the specific task or interpersonal problems encountered in participants' actual jobs.

4.2 Client Participation in Setting Objectives for the Intervention Meeting

Data feedback, training, or problem-solving activities are best started with yet another brief contracting discussion to surface expectations and set objectives for the specific meeting at hand (Knowles, 1970). Diagnostic activities may have raised questions and issues which must be dealt with before participants are ready to confront problem data or work together to solve problems.

4.3 Creation of a Climate of Psychological Safety

Change agents must put participants at ease and establish norms of open communication, trust, and self-control. Consultants create these conditions by appearing congruent with client norms, stating ground rules for behavior during the session, listening empathically during the contracting discussion, and modeling appropriate behavior. The client also contributes to a climate of psychological safety. Unconfronted or unconfrontable issues within the client system may limit the change agent's freedom.

4.4 Use of Varied Learning Style Inputs

Adult learning theorists observe that mature persons use a variety of learning styles. Kolb (1971) has described four such styles:

(1) Abstract Conceptualization (AC): a preference for learning via academic lectures, reading, and other formal methods which impact abstract concepts and principles

(2) Active Experimentation (AE): a preference for learning through practical, "hands-on doing" and active trial and error experiments with different sessions

(3) Concrete Experience (CE): a preference for learning by feeling and direct experience of learning material in the job or training simulations

(4) Reflective Observation (RO): a preference for learning by passive observation and reflecting on observed material to derive abstract principles.

Kolb asserts that while most adults have a preferred learning style, learning proceeds most efficiently when a learner uses all four styles: learns or formulates an abstract idea (AC), tries it (AE), gets feedback (CE), and reflects on this feedback (RO), to develop a refined idea of how to do the task better (AC), etc. The change process implicitly covers each of the four styles if all the phases are completed.

A number of authors (e.g., Greiner, 1967; Franklin, 1976) stress the importance of providing the clients with a conceptual framework that aids both in organizing the data collected in the first diagnostic phases and providing some systematically linked change goals.

Two hypotheses follow from analysis of learning inputs. The first is that interventions should be designed to the dominant learning style of client participants. The second hypothesis is that training and organizational interventions which include varied learning style inputs will be more successful in causing change (Kolb, 1976).

4.5 Data Feedback

Several authors assert that OD programs which provide participants with objective data are more likely to result in constructive change. Feedback information should be accurate and timely, within a month of the time it is collected, lest it become stale or invalid due to changes in organizational situations during the intervening period.

4.6 Problem Solving by Participants

For feedback to be meaningful, participants must use it actively to solve problems. The data used during the diagnostic phase also can be used to develop action strategies. The change agent can use such data to test the feasibility of potential solutions generated by him or the client. Additional data may also be collected to determine which action steps are most appropriate. The key ingredient here is that clients take, and are encouraged to take, the initiative to adapt learning or solutions to their own situations (Havelock & Havelock, 1973).

4.7 Goal Setting

Several studies indicate that if participants set realistic, time-phased, measurable goals as a result of the intervention, these goals are more likely to be accomplished (Kolb & Boyatzis, 1974; Kay, French, & Meyer, 1965; Carroll & Tosi, 1973).

4.8 Statement of Action Steps

The more that action steps for goal accomplishment are spelled out, the more likely it is that change actions will occur (Kolb & Boyatzis, 1974; McClelland & Winter, 1969).

4.9 Identification of Effects on Other Parts of the Organization

Problem-solving processes that include identification of helpful and hindering forces, and links and impacts the intervention may have with other actors in the organization may increase the likelihood that change will be accepted (Kolb & Boyatzis, 1970), assuming that such information is acted upon.

4.10 Adequate Hygiene Factors

A comfortable environment (e.g., accomodations, meals, absence of noise and distracting stimuli) may contribute to intervention success (Buchanan & Reisel, 1977; Lynton & Pareek, 1967).

4.11 Feedback Loops to Diagnosis, Planning, or Intervention Design Steps

Several authors stress the importance of feedback loops in intervention processes--the change agent's ability to sense when the intervention is getting into difficulties (or the client's needs change *in medias res*) and to respond by taking actions to get it back on course. This may mean returning to an earlier point in the intervention cycle or terminating the effort. It should be emphasized that the change can get into difficulties at any point. Key people can leave or go on vacation (Luke et al., 1973; McMillan & Langmeyer, 1975). Resistance can develop as the implications of the diagnosis and action steps are considered (Argyris, 1974; Luke et al., 1973). Moreover, change agents may make technical or judgmental errors (McMillan & Langmeyer, 1975). It may be that problems stemming from the earlier phases of the change effort manifest themselves only when the level of commitment is increased. Latent misunderstandings can suddenly surface when either clients or change agents are required to take specific, risky action steps. Effective intervention strategies will be those that build in the means and motivation for detecting errors either on the part of the client or the change agent.

4.12 Contract for Follow-Up Activities

The effects of many interventions, especially training programs, do not last beyond the end of the program because no provision is made for follow-up activities designed to ensure that changes are, in fact, implemented and reinforced in the work place environment (Franklin, 1976). Sometimes called re-entry activities, follow-up alternatives include provision for continued change agent contact, goal progress review meetings, establishment of reference groups of persons committed to the intervention objectives, or evaluation of the effort. More effective interventions may include contracting for follow-up activities as part of the intervention meeting (Rogers, 1962; McClelland & Winter, 1969; Lynton & Pareek, 1970).

FIGURE V.5

Phase 4: Planning and Problem Solving

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
4.1	Problem solving within family groups	Yes	5	3	8	
		No	1	1	2	
4.2	Participation of clients in setting objectives in the session	Yes	2	3	5	Participation is not necessary for success. However, in its absence it requires the OESOs to have a fairly accurate understanding of the client system.
		No	4	1	5	
4.3	A climate of psychological safety	Yes	4	2	6	Most OESOs developed psychologically safe climates. The absence of a psychologically safe climate had an adverse impact on the ability of the client system to resolve sensitive and crucial issues.
		No	0	1	1	
		Insufficient Data	2	1	3	
4.4	Learning styles	Yes	2	1	3	Learning styles were not considered as crucial inputs into the design of OE efforts.
		No	4	3	7	

Figure V.5, continued)

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
4.5	Feedback to participants	Yes No	6 0	1 3	7 3	Specific formal feedback sessions existed in all the successful cases. Feedback was given in two of the unsuccessful cases but in only one instance was a formal feedback session arranged.
4.6	Problem solving by participants	Yes No	4 2	4 0	8 2	Problem solving by participants was the means of resolving issues. While no practical difference in frequency existed between successful and unsuccessful cases, distinct differences existed in the quality of the problem solving.
4.7	Goal setting: high quality goals that are realistic, time-phased and measurable	Yes No N.A.	4 1 1	0 3 1	4 4 2	The quality of goals in the successful cases was considerably higher than in the unsuccessful cases.

(Figure V.5, continued)

Task		Occurrence				Comment
		Present	Success	Failure	Total	
4.8	Action steps	Yes	3	1	4	Where appropriate, successful cases were more likely to develop action steps.
		No	1	2	3	
		N.A.	2	1	3	
4.9	Identified effects on other parts of the organization	Yes	1	1	2	Most cases had limited scope.
		No	0	1	1	
		N.A.	5	2	7	
4.10	Adequate hygiene factors	Yes	6	3	9	Hygiene factors generally well covered.
		No	0	1	1	
4.11	Change in intervention as a result of client reaction	Yes	2	3	5	The change occurred faster and earlier in the successful cases.
		No	0	0	0	
		N.A.	4	1	5	
4.12	Contract for follow-up activities	Yes	4	1	5	In two of the unsuccessful cases OESOs expressed minimal interest in remaining involved in the group.
		No	2	3	5	

Results

Some form of planning or problem solving took place in all ten cases. As Figure V.5 indicates, the planning or problem solving was undertaken by work teams in family groups (4.1) in eight out of ten cases, with no apparent relationship with the outcome of the OE effort. In five cases, clients participated in setting the objectives (IV.2) for the planning and problem-solving sessions, but the participation had no impact on the overall success of the OE effort. In the remaining five cases, participants responded to feedback provided by the OESO. In all but one case, the clients had control over what was discussed either through their involvement in formulating the agenda or in prioritizing issues raised by the OESOs. Only in the Fort Firefly case was the agenda primarily fixed by the consultants. Even in this instance, the consultants ultimately changed the agenda to reflect the concerns of their clients.

A climate of psychological safety (4.3) was identified in five of the seven cases. The climate in the remaining three cases was difficult to determine because of an absence of data. No obvious relationship existed between the existence of a psychologically safe climate and the outcome of the OE effort, although in the MISC case a number of sensitive issues were left undiscussed, and in the Reserve Training case, the battalion commanders in the issue generation meeting were seen as defensive.

There were few indications that any OESOs designed their interventions on the basis of learning styles (4.4). The one major exception was in the case where the OESO used a simple theory-based instrument (the FIRO-B) to stimulate discussion of the client's management style. Other OESOs used short perception exercises, but predominantly as ice-breakers. The feeding back of data, however, was an area where serious consideration was paid to the client's learning style. In two successful cases and one unsuccessful case, the OESOs specifically and deliberately designed the data feedback session in keeping with Army norms around briefings.

In one case, Fort Firefly, a failure to consider the learning style of the client target group seriously hampered the OE effort. The job enrichment model adopted by the consultants in the Fort Firefly case was never fully understood by the participants. As a result, the primary consultant was continually confronted by the need to redefine what was meant by job enrichment.

Figure V.5 indicates that a clear difference exists in how feedback to participants (4.5) was handled in successful and unsuccessful cases. This reflects, in part, the fact that systematic data were collected only in the successful cases. In each of the successful cases, the clients received carefully developed feedback privately and/or publicly. The OESO in the Army Training case attempted to provide feedback to the client, but the data were relatively unorganized and incoherent.

Problem solving by participants (4.6) was appropriate in nine of the ten cases and occurred in all nine of these cases. (As noted above, problem solving, goal setting, and action planning may not be appropriate in certain transition and team-building efforts, where the objective of the OE session is limited to information sharing, and/or in organizations which assessment data indicate lack problems requiring OE intervention.) While there was no difference in the frequency of problem solving between successful and unsuccessful cases, the quality of the problem solving did affect the success of efforts, through the quality of the goals that emerged from the problem-solving efforts.

As Figure V.5 indicates, in all four successful cases where goal setting (4.7) was appropriate, the quality of the goal setting was high. Goal setting in the successful cases was typically concrete, limited, and directly related to data on present system functioning.

The three unsuccessful cases where goal setting was appropriate were typified by a lack of goals (the STACOM case), unchallenging goals (the Fort Firefly case), and unrealistic goals (the MISO case). The MISO case is particularly instructive since it is probably representative of a recurring difficulty faced by OESOs: specifically, a failure to insist that goals be adequately reality tested when there is a strong need to produce something regardless of the quality.

One important factor contributing to the poor quality of goal setting in the unsuccessful cases was the position of the OESO vis a vis the client. In two cases, the OESOs were working with generals. Given the marked tendency of senior executives to delegate tasks and to expect "can do" responses from subordinates, and given the disparity in status between the clients and the OESOs, the OESOs in these instances demonstrated a reluctance to reality test goals accepted by general officers. In one of the remaining two cases, the OESO was working in a technical environment he knew very little about and thus found it difficult to suggest more challenging goals.

Specific action steps (4.8) to implement goals or recommendations identified by the OE effort were developed in half of the ten cases. Development of action steps was somewhat associated with successful interventions where it was part of the contract for the intervention effort. For example, "transition model" efforts, such as the Fort Cox intervention, did not include specific action planning, but nevertheless led to actions by the client and positive outcomes for the organization. Good goal setting clearly facilitated the development of implementation action steps.

Consideration of an OE intervention's impact on other parts of the client oragnization occurred in only one case, the G4 Logistics operation. For the most part, the OE efforts were internal to the client organization in their scope and potential impact. In most cases, an "open systems" assessment was probably not relevant. In the MISO case, consideration of the organization's external relations may have been appropriate because of the high degree of interdependence between the MISO and the organizations it served. The absence of such an assessment limited the likely impact of the OE effort, although it is not clear whether it directly contributed to the failure of the intervention.

Hygiene factors (4.10) played a significant factor in only one of the ten cases. In the STACOM case, the clients complained that they could never be sure where the next meeting with the OESO would be held. While this problem was beyond the immediate control of the OESO, it did result in a considerable waste of time and a lack of continuity in a highly intensive OE effort. In the nine remaining cases, the hygiene factors had no material impact on the OE effort. OESOs were sensitive to the issue, however, and showed a marked preference for holding meetings off-site.

The planning/problem-solving phase in the intervention process includes the possibility of adjusting the intervention design on the basis of the reactions of the client (4.11). In five of the ten cases, the OESOs were forced to reassess either their OE designs or their own behavior. In two cases, both successful, the readjustment occurred early in the design process, and the changes proved to be effective. In the remaining three cases, all of which ultimately proved to be less successful, the OESOs responded to their client reactions considerably later in the intervention, and in two instances the OESOs chose to terminate the effort.

Contracting for follow-up activities (4.12) occurred in five of the ten cases, with the successful cases showing a

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markedly greater frequency of follow-up activities. It cannot be assumed that follow-up activities reflect the effectiveness of the OESOs, since in three of the five cases where no follow-up activities were contracted, there was a turnover either in OESOs or in client sponsors. However, in two of the unsuccessful cases, MISO and Fort Firefly, the OESOs expressed reluctance to continue their involvement with the client.

In summary, the ten cases demonstrate that an effective OE effort differs from an ineffective OE effort in the planning/problem-solving phase principally in the ability of OESOs to provide accurate and understandable feedback, and aid their clients in effective goal setting and implementation planning. Successful consultants corrected defective intervention strategies earlier, identified more relevant goals and action steps, and followed up their clients' progress. Unsuccessful efforts were characterized by deficiencies in implementation planning. For example, at Fort Firefly, the client target group had a difficult time understanding job enrichment; in the MISO case, sensitive topics were left undiscussed; and in MISO and the Army training case, the OESOs experienced difficulty confronting their high status clients about the purpose of the OE effort.

Phase 5: Action by Clients

In this phase, clients implement any action steps identified in the preceding intervention planning phase. Change agents normally have no direct role in this phase. Specific action by the clients was appropriate in terms of their original objectives in seven of the ten cases (see Figure V.6). Only minor actions resulted from the unsuccessful cases: In the MISO case, a briefing was made; in the Fort Firefly case a new candy machine was obtained; and in the Army Reserve Training and STACOM cases, no actions were taken. The client in the Army Reserve Training case, however, had specified in the contracting phase that he was interested in information only, and did not want to take any specific action.

Significant action occurred in all six successful cases. (As noted, this finding may have been biased by the researchers' definition of a "successful" intervention.)

Phase 6. Follow-up Technical Assistance and Support

In this phase, change agents maintain supportive contact with the client, providing feedback, additional assistance,

FIGURE V.6

Phase 5: Action by Client

Task		Occurrence				Comment
		Present	Success	Failure	Total	
5.1	Action by client	Yes	4	0		Not all OE efforts require independent action by clients to be successful.
		No	0	3		
		N.A.	2	1		

and reinforcement to client personnel implementing changes. The following factors may predict successful implementation and endurance of changes.

6.1 Change Agent Maintenance of Contact with Clients

Social interaction theorists observe that innovations and individual "changers" are naturally insecure and need continued help from prestigious and/or expert change agents to see that changes in fact take hold (Rogers, 1962; Havelock, 1969). Broshowski, Memos, and Khajavi (n.d.) argue that, to keep changes alive, organizations need "stay agents" as well as change agents. Interventions in which consultants maintain contact with clients during and after the planning and action phases may be more successful (Argyris, 1977).

6.2 Feedback on Change Goals (or Use of Learning)

Self-directed change theory (Kolb & Boyatzis, 1974; McClelland & Winter, 1969) indicates that the more feedback people receive about change goals they have set, the more they change. Investigations of management by objectives programs have produced similar findings. Interventions which include goal progress review meetings (Caroll & Tosi, 1973; Straub et al., 1976) at regular intervals after the planning and action phases should similarly result in more observable results.

6.3 Top Management Attention and Support

Indications of continued interest and support from top management should stimulate maintenance or confirmation of change (Lynton & Pareek, 1970).

6.4 Rewards and Reinforcement (or Sanctions) for Change Objectives

Learning theory experiments have repeatedly demonstrated the effects of rewards on reinforcing subject's new or changed behaviors. Clear rewards for implementing change objectives (top management attention, new titles, enhanced "visibility" or status, new job responsibilities, increased pay, opportunities for further education, or other self-development activities) are some of the rewards that can be used to reinforce interventions. Sanctions (for example, downgrading on an employer's performance appraisal for failure to meet affirmative action goals) are a possible, if less common, method of sustaining intervention effects. (Negative reinforcement is generally considered less effective than positive reinforcement.)

6.5 Establishment of Reference Groups

One powerful method of sustaining change is to encourage intervention participants to continue to meet on a regular basis to discuss intervention learnings, review progress and problems in achieving innovation goals, and generally support and reinforce one another (Schein, 1969; Rogers, 1962; McClelland & Winter, 1969).

6.6 Diffusion of Changes to Other Parts of the Organization

Organizational interventions may be more effective if they involve change on a systematic basis by a number of organizational workgroups, each in a way that reinforces the change by the others. In this way, the change may become institutionalized, so imbedded or interwoven in the organization's bureaucratic functions, structure, and budget that it becomes difficult to uproot or stop.

Results

The majority of OESOs maintained contact with the clients (6.1) after the main intervention effort was completed. Continued contact was more likely in the successful cases, where it occurred in all but one instance. The data suggested, however, that a prolonged professional relationship had been established in only two cases. The smallness of this number may be a result of the relatively rapid turnover of OESOs and clients.

For example, by the time of the 15th month case study follow-up data collection, three of the ten different OESOs interviewed were no longer in the Army, and two other OESOs had returned to a unit command position. In the ten cases, five major clients transferred during or shortly after the OE effort, not including the two transition models. This personnel turbulence occurred in both successful and unsuccessful cases.

The follow-up contacts that did take place were relatively informal and seldom included any assessment of or feedback on the goals or actions of the client (6.2). As Figure V.7 shows, OESOs gave feedback to clients only in the successful cases. The data is ambiguous, however, since it does not permit any inference about whether such action leads to greater effectiveness or whether OESOs only maintain contact with cases that are likely to be effective.

FIGURE V.7

Phase 6: Follow Up Technical Assistance and Support

	Task	Occurrence				Comment
		Present	Success	Failure	Total	
6.1	Change agents maintain contact	Yes No	5 1	2 2	7 3	Despite the relative emphasis upon continued contact in the successful cases, only two of the cases presented data suggesting prolonged contact. This is because turnover of clients and OESOs is frequent.
6.2	Change agent feedback on action	Yes No	3 3	0 4	3 7	What follow-up contacts that do exist tend to be informal. Formal evaluation oriented contacts were restricted to the successful cases.
6.3	Top management attention and support	Yes No	5 1	1 3	6 4	Most clients had high levels of autonomy. In unsuccessful cases, top management seemed far more ready to forget about the OE effort.

(Figure V.7, continued)

Task		Occurrence				Comment
		Present	Success	Failure	Total	
6.4	Rewards for change activities	Yes	1	0	1	Military units have little discretion over the majority of rewards in the Army.
		No	5	4	9	
6.5	Reference groups for change participants	Yes	0	0	0	Reference groups rarely an issue in this group of OE cases.
		No	6	4	10	
6.6	Diffusion of change to other parts of the organization	Yes	4	0	4	Diffusion was limited to successful cases and to development of new contacts.
		No	2	4	6	

A majority of OE efforts received continued support from top management (6.3) after the main effort was completed. In the majority of cases, because the clients were relatively autonomous, this can be interpreted as the continued involvement of the client sponsor in what the OESO had started. Successful efforts retained top management support and attention more frequently than unsuccessful efforts. This lack of top management support was clearly crucial in two of the unsuccessful efforts. In one case, the Reserve Training case, top management involvement expressed limited objectives from the beginning of the effort. In the MISO case, turnover among top management reduced the amount of support given to the OE effort.

Rewards or sanctions (6.6) were used only once to explicitly reinforce the objectives of the change effort. In the Fort Cox transition case, the client sponsor kept his word by not punishing officers for reporting mistakes when a junior officer reported that some grenades had been stolen; delegation of responsibility permitted this officer to conduct an investigation which led to the recovery of the stolen material. Reinforcing change through rewards and sanctions had no identifiable relationship with the success of an OE effort.

Reference groups were not used to reinforce change in any of the cases (6.5). This reflects the informal nature of many of the OESOs' follow-up contacts with the client.

Diffusion of OE to other parts of the client's system (6.6) occurred in four cases, all of them successful efforts. The two transition cases seemed to have been the most successful in diffusing a particular type of change effort. It appears that one outcome of a successful OE effort is additional clients.

Phase 7: Evaluation

In this phase, change agents and/or clients make some attempt to assess the effects of the intervention, either to improve intervention methods (formative evaluation) or to summarize final results (summative evaluation). Evaluation, by its very nature, has the effect of reinforcing change objectives by providing feedback on goal attainment (the follow-up mechanism described under 6.2 above).

7.1 Level of Evaluation

Kirkpatrick (1967) has suggested that intervention can be evaluated at four levels.

(1) Reaction: how much participants like a program--for example, a questionnaire asking client workgroup supervisors whether they found an OD program or seminar very valuable, somewhat valuable, or not at all valuable

(2) Learning: what participants learn from a program--for example, knowledge of Army equal opportunity directives as measured by a multiple choice or short answer test on legal rulings or proper procedures for handling discrimination complaints

(3) Behavior: whether or not participants actually change their behaviors as a result of a program--for example, whether or not a command actually develops a written action plan after completion of a goal-setting and planning workshop

(4) Results: whether or not the command actually changes on hard outcomes as a result of a program--for example, whether or not a command's retention rates, combat preparedness ratings, non-judicial punishment actions, or percentages of minority persons promoted from E4 to E5 change as a result of the intervention

Commitment to higher levels of evaluation may predict intervention success (Kolb & Boyatzis, 1974; Munger, Spencer, & Thomson, 1976). Formative post-mortem evaluation efforts, in which consultants review why a given intervention succeeded or failed, can improve both change agent skills and intervention methods. Formal cost-benefit evaluations may reinforce intervention outcomes because they involve some of the follow-up mechanisms previously discussed: top management attention, feedback, or rewards and sanctions.

7.2 Evaluation Design

Several references reported detailed analyses of OD studies using the internal and external validity criteria proposed by Campbell and Stanley (1966). More elaborate experimental designs, reporting results less susceptible to artifacts caused by these factors, are considered more successful by academic standards (Pate et al., 1976; Srivasta et al., 1975; Cummings, Molloy, & Glen, 1977). It is questionable, however, whether elegance of methodological design carries much weight with operating managers.

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7.3 Political Sensitivity in the Use of Evaluation Findings

Evaluation findings can have potent political impacts. Data which indicate programs favored by top management are ineffective, or otherwise embarrass influential persons or organizational interest groups, can result in intervention failure and termination of the change agent. Favorable data astutely used can add considerable impetus to the change effort. Consultants who carefully calculate the political impacts of evaluation data may be considered more effective.

Results

Formal evaluations of the OE efforts occurred in three cases: the Combat Intelligence, the Army Reserve, and the Fort West Transition cases. All three cases focused on evaluating the results of the OE efforts. In the Army Reserve case, the OESO undertook a time series analysis of retention data, comparing the client system's retention figures to those of the other reserve units. The OESOs in the Combat Intelligence case resurveyed the client system using the same survey they had developed in the diagnosis phases. The survey permitted an evaluation of the impact of the OE change effort as indicated by perceptions of the client system's performance. In the third case, the OESOs undertook a simple cost-benefit analysis of the transition model by using some simple estimates of the benefits of the effort described by the client and their own cost calculation based primarily on the opportunity costs of those involved.

The OESOs involved in the three cases made use of their findings. Articles summarizing the results of the Army Reserve and the Fort West Transition case appeared in an in-house publication, the OE Communique. The results of the Combat Intelligence case were used to justify the continuation of the part-time OE consultant program in one Army command.

In summary, formal evaluations occurred relatively rarely and only in successful cases. Their presence seemed to indicate a greater measure of professionalism among the OESOs and a greater awareness of the importance of documenting the effectiveness of OE efforts.

Phase 8: Termination

In this phase, the change agent withdraws from the client system. Termination characteristics generally associated

with more successful interventions include:

8.1 Transfer of Capability to the Client

Effective consultants work to transfer their knowledge and skills to their clients, enhancing the latter's capability to continue development efforts with less external assistance. Interventions in which consultants succeed in transferring capability to their clients (as perceived by the client) may be more successful (Havelock & Havelock, 1973; Lippitt & Lippitt, 1975).

8.2 Pace of Termination

Franklin (1976) observed that change agent termination of contact with clients can be gradual or abrupt, and planned or unplanned. The implication is that, in effective interventions, termination is gradual and planned.

8.3 Reason for Termination

Successful interventions presumably are terminated because their original objectives are achieved or the client has developed the capability to continue developmental efforts without external assistance. Neutral reasons for termination include exhaustion of resources, withdrawal of change agent or client for reasons beyond either's control, or completion of the agreed upon sequence of activities. (Simple completion of a series of steps may connote either success or failure.) Unsuccessful interventions are terminated for reasons of dissatisfaction by client or change agent (e.g., because of inability to agree on objectives or methods, failure to achieve objectives, personality clashes, or excessive use of resources).

Results

The transfer of the capability to the client (8.1) of the OESOs' OE skills and knowledge occurred twice. In one case, the client used OE assessment techniques to prepare a transition briefing document for his successor; in the other, the client taught his staff time/meeting management techniques. In both instances, the transfer was unplanned on the part of the OESOs. Both the cases involving a transfer of knowledge were successful.

Several OESOs reported that clients accepted coaching in how to receive feedback and "picked up our OE group processing methods and took over and ran the (assessment or problem-solving/planning) meetings," but there was no evidence that

these clients continued to use these techniques outside of an OE context.

Transfer of technology in the sense of explicit training in specific management methods, especially time and meeting management, was also cited in these cases. One team of OESOs believed that their ability to provide this type of "expert" consultation was important to their success.

As Figure V.8 indicates, the terminations (8.2) of the majority of the OE efforts were planned and relatively gradual. Successful OE efforts were more likely to undergo planned termination than were unsuccessful efforts. Unsuccessful efforts were characterized by confusion in determining at what point the OE effort was complete. In two instances, the OESOs stated that memoranda were awaiting action by a senior officer. The OESOs' continued involvement in the case, however, remained unclear. By comparison, all but one of the successful cases had well-defined end points. The one exception, the Mechanized Infantry case, ended because the OE was transferred before the OE effort could be completed. Five cases were terminated because the original objectives of the clients or the OESOs were achieved (8.3). All five were successful cases. Two unsuccessful cases, the Fort Firefly and Reserve Training cases, were terminated for the relatively neutral reason that a series of formal steps had been completed.

The terminations of successful and unsuccessful cases differed significantly. Successful cases were brought to well-defined ends, with both client and OESO satisfied that the original objectives had been achieved. The terminations of the unsuccessful cases were significantly less well-defined and more formalistic.

Conclusion

The foregoing analysis of the intervention processes identified in the ten cases provides some sharp contrasts between successful and unsuccessful OE efforts. A successful OE effort is typically client initiated. The OESO collects a considerable amount of data before and after the client has agreed to "hire" the OESO. The OESO works closely with the client system, accepts the importance of the client's problem, and develops with the client a psychological contract which allows for a relatively open relationship. The OESO quickly develops a set of realistic expectations about how far the client can go and shares with the client both the OESO's expectations and his general diagnosis. The successful OESO

FIGURE V.8

Phase 8: Termination

	Task		Occurrence			Comment
		Present	Success	Failure	Total	
8.1	Transfer of capability to client	Yes	2	0	2	Any transfer of capability to the client was unplanned.
		No	4	4	8	
8.2	Gradual, planned termination	Yes	5	1	6	All but one of the successful cases had clearly defined endpoint. Three of the unsuccessful cases simply drifted into inactivity.
		No	1	3	4	
8.3	Success reasons for termination	Yes	5	0	5	One of the successful cases terminated because of the transfer of the OESO.
		No	1	4	5	

helps the client problem solve the issues raised by the data collected and the feedback by the OESO, and emphasizes the need to develop realistic, measurable, and time-phased goals. Where appropriate, the successful OESO follows up to check on the progress toward the goals established by the client. These later contacts include more formal efforts by the OESO to evaluate the impact of the intervention on outcome measures. The client in a successful OE effort informs his colleagues of the benefits of OE and successful OESOs obtain new clients. Finally, a successful case is brought to a well-defined close.

VI. SUMMARY AND CONCLUSIONS

Development and analysis of the ten OE case studies in the field research phase of this project produced findings about (1) the utility of the methodology, variable taxonomy, and data collection procedures developed for the study (Spencer & Cullen, 1978) and (2) findings about OE intervention variables--outcomes, consultant and client characteristics, intervention method, and processes--associated with successful OE operations.

Findings Regarding the Research Methodology

The essential finding concerning methodology is that the variable taxonomy and data collection methods proposed in the prospectus for the research did prove applicable.

The model and variable classification system developed in Spencer and Cullen (1978) provided an exhaustive empirical coding scheme for relevant variables identified in the field research cases. (Only one additional process variable category was identified through "grounded theory" inspection of the case data: OE consultant "coaching" of client sponsors in techniques of facilitating group feedback meetings and problem solving sessions.)

If anything, the variable taxonomy and case coding form proved insufficiently parsimonious. Not all variable categories were readily scorable from the case data. Many variables were observed to have minimal impact on the success or failure of an OE operation.

Use of the data collection procedure, which consisted of an unstructured critical incident interview followed by a structured case documentation interview protocol administered to the principal OESO and the client sponsor involved in each intervention, indicates that very detailed case data can be developed with a relatively minor commitment of OE consultant and client sponsor time. Total OESO interview time required averaged 1½ hours; total client interview time required averaged 1 hour.

It may be concluded that the case development and analysis methodology developed in Spencer and Cullen (1978) does provide a useful tool which OE consultants and other Army researchers

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and evaluators can use to document the inputs, processes, and results of OE operations and/or to develop detailed OE intervention cases for teaching, research, and evaluation purposes.

Findings Related to the Success or Failure of OE Operations

Outcomes

A general finding is that the outcome results of OE operations are absent or limited to the documentation of behavioral changes in the client system in most cases. Successful OE operations do generate concrete behavioral outcomes, although these results tend not to be documented or quantitatively measured.

Implementation and evaluation remain the weak points in the Army OE APIE (Assessment, Planning, Implementation, and Evaluation) procedure. OESOs rarely collect data in any systematic way on the outcomes of their interventions despite the fact that cost accounting methods and benefit calculation methods do exist and have been shown to be applicable to OE operations (Spencer, 1978).

Perhaps the most significant action that OE consultants could take to improve OE operations in the Army would be to systematically prepare "after action reports" in a standard format which documented the implementation action steps and outcome results, costs, and benefits resulting from any OE operation undertaken.

OE Consultants

OE consultant competence accounts for a major portion in variance in the outcome of OE operations. Effective OESOs are significantly more likely to:

- Gain meaningful client acceptance and commitment through accurately hearing client concerns and needs and developing an intervention approach congruent with those concerns.
- Identify, through systematic data collection and diagnosis, real client problems and confront clients with those problems. "Confront" in this context means providing concise and straightforward feedback and maintaining professional standards by consultants' "standing their ground," insisting upon data-based diagnosis and

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action, and retaining independence as opposed to simply meeting clients' espoused needs. The better OESOs continually negotiate and recontract with clients to focus attention upon and work on real client system needs. Successful OE consultants identified and raised meaningful issues; unsuccessful OE consultants did not.

- Identify realistic implementation action steps to solve organizational problems. In the assessment phase, effective consultants were able to break up large, unmanageable problems into specific issues that could be solved, and in the implementation phase, these consultants focused on action recommendations that the client had the power and resources to undertake.

- Be concerned with outcome results and follow up with clients to document such results. OE consultants who were concerned about and looked for outcomes tended to achieve them; those who were unconcerned with outcomes were unable to recall or document anything that resulted from their efforts.

Client

OE operations were most effective in mid-level operational commands, line combat units in which the client sponsor had the power and authority to change organizational processes. OE operations were less effective in (1) organizations undergoing major leadership transitions (when the OESO did not have an explicit contract to deal with the transition issues), and (2) civilian agencies and large complex headquarters systems headed by general officers.

Complex clients systems were more likely to involve political issues, large status differentials between the client sponsor and the OESO, and hidden agendas which restricted support for the OE effort. Large, complex client systems also tended to offer fewer action levers, under the client sponsor's direct control, which could be used to change organizational structures or processes. The lack of OE consultant success with large system clients may be due to the restricted OE methods used, or to a lack of OESO skills in dealing with complex politicized situations and policy issues. These findings suggest that OESOs should be reluctant to undertake interventions in which the client organization is undergoing transition (without a clear contract to deal with transition issues) or where top management is in conflict about the use of OE, presents vague or politicized objectives for the OE effort, or lacks the resources or will to implement change recommendations.

Intervention Methods

The OE operations studied revealed a very restricted range of intervention methodologies. Basically only two were observed: process consultation (including action planning and transition workshops) and survey-guided development methods. It is possible that socio-technical or "open systems" strategic policy planning methods more relevant to the situations faced by top management would lead to a higher success rate with large systems clients.

Intervention Process

Marketing does not appear to be crucial in the early stages of an intervention if the OESO has a good professional reputation: Most successful clients initiated contact with an OE consultant to begin an OE operation. Formal contracting during the entry phase of an OE operation per se is not crucial. What is critical is that the OESO accurately hear the client's needs, develop a congruent plan to deal with these needs, and continually renegotiate or recontract with the client for each succeeding phase of work over the course of the OE operation. Effective OE cases are characterized by good diagnosis and clear, parsimonious data feedback on real issues.

High quality goal setting and the identification of specific implementation action steps is crucial to achieving meaningful results outcomes in OE operations. OESOs must reality-test implementation options with their clients. When goals or action steps are not related to the client's real problem, or require resources beyond the client's control, often no actions are taken and no results are achieved. Successful cases identified and concentrated on producing small changes either in the behavior of key individuals or in organizational processes, structure, and work flow variables the client sponsor had the power to change. Effective OESOs were much more likely to initiate follow-up contacts with clients, assist in implementation activities, and document OE intervention outcomes. In unsuccessful cases, the OESOs tended not to provide any client follow-up services, implementation support, or evaluation documentation.

In conclusion, factors most likely to improve the conduct of OE operations in the U.S. Army include:

- improved training of OE personnel in consultant competencies related to establishing meaningful relationships with clients, diagnostic data analysis and feedback, and implementation and evaluation skills;
- targeting OE resources on middle-level line commands;
- training OESOs in a broader range of intervention methods, especially "open systems" techniques appropriate for use on large complex systems; and
- training or even requiring that OE consultants follow-up interventions with clients to develop after-action reports which document the implementation action steps, results outcomes, and where possible, costs and benefits of all OE operations undertaken.

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APPENDIX A

Structured Interview

STRUCTURED INTERVIEW

OESO Change Agent Questions

I. Scouting

1. How did client come to your attention?
2. What did you know about client at this point? find out?
3. Did you do anything with your team at this point? What?

II. Entry

1. Who did you first talk to in the client organization? Results of this meeting?
2. Did you talk to anyone else in the client organization?
3. Did you feel you and client were "on the same wavelength?" Why/why not? (Probe: congruence? recognition of client felt needs?)
4. What did you see as client's problem, needs or objectives at this point? What did he/she want?
5. What objectives for intervention did you agree on?
6. What resources, time or personnel commitments was client willing to provide at this point? Did you think these were adequate? Did you say anything?
7. How did you feel about prospects for intervention at this point?

III. Diagnosis

1. What diagnostic method did you use? Individual interviews? Group interviews? Surveys? Observation?
2. Who did you get data from? (Sampling design? Number of respondents at each level?)
3. How did client participate in data collection?
4. Did client think data were right? Actual problems? What he wanted to do about them (ideal)?

IV. Planning/Problem-solving/Training

1. Who involved in data feedback/problem-solving/training sessions? (family group)
2. How did you introduce session? (Probe: participant inputs to objectives, agenda)
3. How did it go? any resistance? what kind? (Probe: evidence re psychological safety)
4. What was the design of the session? (varied learning styles?) Did they seem to be getting it? (appropriate learning style?)
5. Did participants get any feedback during session? What kind? How did they react to it?

6. Did participants solve any problems during the session? What were they? How did they solve them?
7. Did participants set goals during the session? Example of goal set? (challenging but realistic, measurable, due date?)
8. Did participants identify action steps? Example?
9. Intervention in this group likely to have any impact on other parts of organization?
10. Where was session held? (retreat setting?) Any complaints about accommodations, setting, food? (hygiene factors)
11. Did anything during the session lead you to modify your intervention design?
12. Do you have any plans for further contact with the client?

V. Action

1. What did the client do as a result of the intervention?

VI. Follow-up Technical Assistance and Support

1. Have you been in touch with client since intervention session? Who contacted whom?
2. What did you do? (technical assistance, feedback on goal progress)
3. How does client top management feel about intervention? (support/lack of support)
4. Have participants received any rewards/sanctions for acting as a result of intervention?
5. Do participants get together? (reference groups)
6. Has the intervention had any effect on the rest of the organization?

VII. Evaluation

1. Is intervention being evaluated? How? When? What are the criteria for success/failure?
2. How are findings being used? Who gets them? What reactions?

VIII. Termination

1. Has client used any of intervention methods on own? (evidence of transferred capability)
2. How did termination occur? Why?

Client Sponsor Questions

I. Scouting

1. How did the OE program come to your attention?
2. How did you make contact with OESO (who initiated)?

II. Entry

1. What happened at first meeting with OESO?
2. What were your objectives at this point? problems? What did you want?
3. Did you feel you and OESO were "on the same wavelength?" Why/why not?
4. What objectives/next steps did you and OESO agree on?
5. What time, personnel or other resources did you agree to provide? Did you/OESO feel these were adequate?
6. How did you feel about the prospects for the intervention at this point?

III. Diagnosis

1. How did the consultant collect data? (individual interviews? group interviews? surveys? observation? other?)
2. Who was data collected from? (Sampling design: number of respondents at each level)
3. Did you participate in data collection? Who else in your organization?
4. Did you/they feel adequately informed about purposes, uses, confidentiality?
5. Did you think the data/diagnosis were right? Did they tell you anything you didn't know? problems (actual)? ideas for change (ideal)?

IV. Planning/Problem-solving/Training

1. Who involved in data collection/problem-solving/training? (family group)
2. What input did you/other participants have?
3. How did it go? Any resistance? What kind? (evidence re psychological safety)
4. What was design of session? theory? practice/experience? (varied learning styles? appropriate learning styles?)
5. Did you/participants get any feedback during session? What kind? How did they react to it? Did they think it was meaningful, accurate, relevant?

6. Did you/participants do any problem-solving during the session? How? What was the result?
7. Did you/participants set any goals during the session? Example? (challenging yet realistic/nontrivial? measurable? due dates?)
8. Did you/participants identify action steps to reach goal? Example?
9. Is intervention likely to have any impact on other parts of the organization? Who? What?
10. Where was session held (retreat setting)? How were accommodations, setting, food (hygiene factors)?
11. Did you/participants feel any part of intervention needed to be changed? Did OESO pick up on this? Did he change anything? (feedback loops)
12. Do you have any plans for further contact with OESO? (contract for follow-up activities)

V. Action

1. What did you do as result of intervention session?

VI. Follow-up Technical Assistance and Support

1. Have you been in touch with OESO since intervention session? Who contacted whom?
2. Has OESO given you any help or feedback on your change activities? What?
3. How does your superior (top management) feel about the intervention effort at this point? How do you feel?
4. Has anyone received any rewards or reprimands for taking any action stemming from the intervention?
5. Have participants gotten together since intervention session (reference group)?
6. Has intervention had any impact on other parts of the organization? What?

VII. Evaluation

1. Is intervention being evaluated? How? What are your criteria of success/failure?
2. How will findings be used? Who gets them? What reactions?

VIII. Termination

1. Have you used any intervention techniques on your own? Gotten anything you can use?
2. How did termination occur? Why?
3. All in all, do you feel intervention was a success or failure? Why?

APPENDIX B

Case Analysis Observation Form

CASE ANALYSIS OBSERVATION FORM

Change Agent Variables	Evidence	Yes	?	No	NA
I. Characteristics					
A. Demographic variables					
1. age					
2. sex					
3. race					
4. military rank					
*B. Values and attitudes					
C. Job-related training					
D. Work experience					
1. line commands					
2. staff experience					
E. Consulting experience					
1. # months					
2. # interventions					
3. # clients					
*II. Competencies					
A. Psychological safety					
B. Diagnostic					
C. Initiatory					
D. Executive					

* To be determined from analysis of Behavioral Event Interview data

Case Analysis Observation Form
Change Agent Variables (continued)

	Evidence	Yes	?	No	NA
III. Role(s)					
A. Type					
1. advocate					
2. expert					
3. trainer					
4. collaborative problem-solver					
5. processor					
B. Dimension					
1. specific technical expertise					
2. general expertise					
3. interpersonal expertise					
4. power					
5. locus: independence/ marginality					
6. goal congruence					
7. task focus					
8. interpersonal focus					
9. directive vs. collaborative					
10. didactic					

Case Analysis Observation Form

Client Variables	Evidence	Yes	?	No	NA
I. Systems Characteristics					
A. Demographics					
1. size					
2. age					
3. mission					
4. occupational status of employees					
5. geographic and national location					
6. area of operations					
B. Structure					
1. components					
2. reporting relations					
C. Management					
1. goals					
2. style					
3. control (rewards and punishments)					
D. Technology					
E. Subordinates					
F. Organizational climate					

Case Analysis Observation Form
Client Variables (continued)

	Evidence	Yes	?	No	NA
G. System effectiveness					
1. performance					
2. satisfaction					
3. maturity					
H. Uncertainty					
II. Problems					
A. Locus					
1. component					
2. function					
3. size (individual, interpersonal, intra-group, intergroup, system)					
4. status level (top, middle, lower, nonmanagement)					
B. Type					
1. task					
2. goal					
3. interdependence					
4. power					
5. climate					
C. Pressure					

Case Analysis Observation Form
Client Variables (continued)

	Evidence	Yes	?	No	NA
III. Client Recipients					
A. Change sponsor					
1. status/power					
2. resources					
3. managerial style (attitudes, values)					
4. personal commitment and involvement					
B. Target					
1. values: trust, open communication, participation					
2. power					
3. skills: learning style, knowledge					
4. needs					

Case Analysis Observation Form

Intervention Method Variables	Evidence	Yes	?	No	NA
I. Individual Consultation					
II. Unstructured Group					
III. Structured Group Training					
IV. Process Consultation					
V. Survey-guided Development					
VI. Job Redesign					
VII. Personnel Systems					
VIII. Management Information/ Financial Control Systems					
IX. Organizational Design					
X. Integrated Approaches					

Case Analysis Observation Form

Intervention Process Variables	Evidence	Yes	?	No	NA
I. Scouting					
A. Identification of potential "early adopters"					
B. Active marketing					
C. Collection of advance data on potential clients					
D. Change agent team-building					
II. Entry					
A. Top management support					
B. Develop contact networks and support					
C. Congruent with client norms					
D. Present next steps relevant to client felt needs					
E. Agreement on clear objectives					
F. Clear contract for intervention resources and responsibilities					
G. Change agent positive expectations					

Case Analysis Observation Form
Intervention Process Variables (continued)

	Evidence	Yes	?	No	NA
III. Diagnosis					
A. Data Collection Method					
1. individual interviews					
2. group interviews					
3. survey					
4. observation					
5. other (e.g., document analysis)					
B. Sample Design					
1. percentage of work group members					
2. top level					
3. middle level					
4. lower level					
5. other					
C. Active client participation in data collection					
D. Accurate diagnosis (realistic actual and ideal)					
IV. Planning/Problem-solving/ Training Intervention					
A. Family group					
B. Participation in setting objectives for session					

Case Analysis Observation Form
Intervention Process Variables (continued)

	Evidence	Yes	?	No	NA
C. Climate of psychological safety					
D. 1. Use of varied learning styles					
a) new cognitive input					
b) experiential input					
2. Input keyed to learning style of client					
E. Feedback to participants accurate, timely (created actual-ideal discrepancy)					
F. Problem-solving by participants					
G. Goal-setting					
1. challenging but realistic (not trivial)					
2. measurable					
3. due date					
H. Action steps					
I. Identify effects on other parts of organization					
J. Adequate hygiene factors					

Case Analysis Observation Form
Intervention Process Variables (continued)

	Evidence	Yes	?	No	NA
K. Feedback loop: change in intervention session as result of client reaction					
L. Contract for follow-up activities					
V. Action					
VI. Follow-up Technical Assistance and Support					
A. Change agent maintain contact					
B. Change agent feedback on action, progress toward goals					
C. Top management attention and support					
D. Rewards/sanctions for change activities					
E. Reference groups of change participants					
F. Diffusion of change to other parts of organization					

Case Analysis Observation Form
Intervention Process Variables (continued)

	Evidence	Yes	?	No	NA
VII. Evaluation					
A. Level					
1. reaction					
2. knowledge					
3. behaviors					
4. outcome					
B. Design					
C. Politic use of findings					
VIII. Termination					
A. Transfer of capability to client					
B. Gradual, planned vs. abrupt, unplanned					
C. Success vs. failure reasons					

Case Analysis Observation Form

Outcome Variables	Evidence	Yes	?	No	NA
I. Reactions					
A. Perceived effectiveness					
B. Attitudes					
C. Norms					
D. Tension release					
E. Organizational climate					
II. Learning					
A. Motivation					
B. Knowledge					
C. Cognitive					
D. Interpersonal					
III. Behavior/Performance					
A. Skills					
B. Group process					
C. Approach adoption					
D. Job procedures					

Case Analysis Observation Form
Outcome Variables (continued)

	Evidence	Yes	?	No	NA
IV. Results					
A. Performance					
1. IG score					
2. ARTEP score					
3. TSI/CTT/NSI score					
4. accident rate					
5. OR rate					
6. other					
B. Withdrawal					
1. reenlistment rates					
2. #NJP (Article 15)					
3. delinquency reports					
4. UA					
5. sick calls					
6. other					
C. Attributes					
1. personnel (number, age, sex, race, competence)					
2. structure					
3. technology/job design					