

TOPEKA PRIDE: TWENTY YEARS OF TEAMWORK

BACKGROUND NOTES

The Topeka pet food plant was described as a "workplace experiment for America". It started-up in that time during the late 1960's and early 1970's when U.S. corporations (Proctor & Gamble, TRW) and Canadian (Alcan, Northern Electric) and European companies (Shell, Volvo) were breaking new ground with team/group-based work organizations. Topeka--twenty years later provides an opportunity to re-visit core concepts (some of which may have lost their clarity over time and re-use). Twenty Years of Teamwork also demonstrates the robust quality of this high commitment-high performance design.

THE COMPANY:

This Topeka, Kansas operation began as a Gaines dry dog-food plant employing 80 people in 1971, within the Pet Food Division of General Foods (Chicago). On the success of this first plant, three years later, a canned dog-food plant was added to the Topeka operation by General Foods.

In 1984, General Foods divested itself of its pet food division and sold the Topeka operation to Anderson Clayton Corp.(Houston). In 1986, the Topeka operation was purchased by the Quaker Oats Company. Numerous new product lines and plant expansions increased Topeka to a 250-employee operation. Then, in the next decade, the Topeka plant acquired its fourth corporate owner, H.J.Heinz Company.

THE TOPEKA PROJECT: A PROTOTYPE FOR CHANGE

In the fall of 1968, General Foods decided to build a new Pet Food plant (in addition to Kankakee, Ohio) to meet the needs of a growing Gaines franchise. By June, 1969, a project leader (the designated new plant manager, Ed Dulworth) and 3 other managers (to be part of the Topeka operating staff), reporting to the Kankakee operations manager (Lyman Ketchum) began development of the Topeka organization, with assistance provided by (among others) Prof. Richard Walton of Harvard Business School. By December, 1969, this project group had designed "the Topeka system".

The mandate given to the project was to design an organization that would achieve lowest possible operating costs with no sacrifice of product quality, and a high level of employee identification with success of the operation. A prime objective was to avoid the problems of employee "alienation" that were perceived to affect plant shutdowns, product waste, absenteeism, and even acts of sabotage at existing operations. This was a time when the United States economy was becoming sensitive to international competition, let alone the highly competitive nature of the pet food business itself, and substantial manufacturing costs were linked to worker alienation.

(Reference: Walton, Richard, "How to Counter Alienation in the Plant", Harvard Business Review, Nov-Dec 1972, Vol. 50, No.6.)

The organization design had limited effect on the plant's technical design. However, it led to a very intense and pro-active hiring process, starting with the first-level of management, 6 team leaders. Half of the initial team leaders came from other General Foods' operations. These team leaders screened and recruited 63 operators from 600 applicants. Time was taken during this pre-start-up period for operators, team leaders, and managers to debate the concepts of the proposed "Topeka system" and translate them into plant work procedures. Perhaps surprisingly, there was a healthy skepticism among the new work force. Indeed, the first year of successful start-up after January 1971 was marked by a number of "tests" to the system.

FEATURES of "THE TOPEKA SYSTEM":

First and foremost, the approach taken was "comprehensive", "systemic", or what has been referred to as "holistic". No one feature stands on its own. Strength comes from synergy among these elements .

(1) Semi-Autonomous Work Groups are the basic unit of the work organization.

- collective responsibility for large "chunks" of the work process are given to work teams, (as distinct from tasks being assigned to individuals in specific jobs)
- most teams are comprised of 7-14 members and a team leader, (large enough to encompass a significant end-product/service, yet small enough to permit effective face-to-face communication)
- assignment of individuals to specific sets of tasks (i.e. a "job") is subject to group consensus.

(2) Support functions are integrated into the work teams.

- there is no separate quality assurance, custodial, or maintenance department
- each team member is trained to do most of the operating maintenance for equipment (s)he operates.

(3) Individual (job) Assignments are designed to be Challenging (and relatively equally so).

- every set of tasks (job) includes more complex mental activities (e.g. planning, trouble-shooting)
- some less challenging but necessary physical tasks like forklift operation are combined with more mentally demanding tasks (e.g. shipping and receiving administration).

(4) Rotation of Individuals among Assignments is Mandatory.

- frequency of rotation may vary up to 2-3 years per assignment in office work
- most plant assignments are rotated every 3-4 months, although control room assignments may be rotated every 8-12 months, and others in packaging may be rotated every few days
- rotation helps maintain knowledge and skills for holiday relief, etc., but more importantly, it is to reinforce each individual's understanding of the whole work process for which the team is responsible, and to enable team members to support each other effectively
- rotation has also been found to keep alive a learning attitude, and more alertness on-the-job.

(5) Continuous Learning is Rewarded (Pay-For-Skills).

- pay increases are linked to learning more and more aspects of the office or manufacturing process, (as distinct from pay attached to specific assignments or positions)
- initially, there were 4 basic pay rates; starting rate, single job rate (for qualifying in one's first assignment), team rate (for learning all tasks within the team's area of responsibility), and plant rate.

(6) Leadership is Facilitative.

- team leaders are responsible for supporting team development and supporting team effectiveness in achieving results, (as distinct from planning, directing, and controlling the work of subordinates)
- this leadership principle applies at all levels of the organization, including plant management.

(7) "Managerial" decision Information is available to Operators and Office Staff.

- information systems are designed to provide team members with economic information and managerial decision rules ordinarily available only to supervisors with privileged access.

(8) Differential Status symbols are Minimized.

- there is an open parking lot (no reserved spaces), one cafeteria and one recreation area for all members of the organization, and a common decor for all offices.

THE PLANT STRUCTURE:

By 1975, the Topeka operation was composed of an Office/Manufacturing Service, and two Manufacturing plants--the initial Dry-Food plant and a new Canned-Food plant.

The Dry-Food plant started-up with 2 teams per shift, a Process Team, and a Packaging Team. Since start-up of both plants, the dry-food operation has been redesigned as one team of 22 operators per shift. There are 11 work stations/job assignments within this team:

- Raw Material Bulk Loading
- Resupply to Mix Ingredients
- Batching Processed Ingredients
- Expanding & Drying Finished Product
- Inspection
- Electronic Control Mechanic
- Coating of Surface Additives (and releasing of product to packaging)
- Packaging Line Operation
- Bagging Operation
- Palletizing & Placement of Finished Stock
- Shipping & Receiving.

The Canned-Food plant is structured into 2 teams on each shift, performing all support functions(e.g. Inspection, Mechanic) and the core tasks of meat Preparation, and of final product Canning:

- Cutting & Preparing Meat
- Cooking Meat in giant ovens
- Sterilizing & Labelling Cans
- Packaging Finished Canned Product.

THE OFFICE ORGANIZATION:

The office is organized into 3 teams, one to support the dry-food plant, one to support the canned-food plant, and an accounting service.

Within each plant support team, there are distinct assignments such as Purchasing & Stores, Traffic, Production Control, and Secretarial Assistance (including office reception).

The accounting team includes functions in Personnel, Payroll, and Cost Accounting.

(As mentioned earlier, rotation over a 2-3 year period exists for assignments in each of these teams.)

THREE LEVELS of MANAGEMENT:

From the time of start-up with 80 employees to an expanded operation of 250 employees, there has remained only 3 level of management.

A Manager of Topeka Operations is primarily responsible for long-range planning activities, maintains liaison with corporate office, and provides leadership for the overall organization. During its first twenty years, Topeka had only 2 Operations Managers.

At the next level, there is a Manufacturing Manager for each plant, with a Technical Assistant to coordinate engineering activities, plus a Manufacturing Service Manager who coordinates office and administrative practices and information systems.

At the first-level of management are the Team Leaders. Their role is primarily as a "resource" or "guide" to the team members. They are also "care-takers" of the principles, rules, and performance objectives that are the framework within which teams function autonomously. Team Leaders have the authority to over-rule or question a team's decision, but such intervention is meant to be the exception inasmuch as their primary responsibility is development of the team's own decision-making capability. Part of what limits any tendency for Team Leaders to be too "hands-on" or "interventionist" is the fact that much of their time has to be devoted to project/continuous improvement assignments, (given the relatively small number of technical specialists on staff).

PHASES OF DEVELOPMENT:

As a member of the original design team, and then, as a periodic observer of the Topeka operation, Richard Walton has identified distinct stages in the early implementation of the Topeka system.

References: "Work Innovations at Topeka: After Six Years", The Journal of Applied Behavioral Science, Vol 13, 1977; and, "Teaching an Old Dog Food New Tricks", The Wharton Magazine, Spring '78.

Pre-Start Up (1968-1970):

Noteworthy was the time and effort devoted to planning, education, recruitment, and team-building.

Technical and Social Start Up (1971):

One of the early "tests" of the system came when operators felt they were ready for their first pay increase, just after a number of weeks, when management was not anticipating such an expectation. When management ultimately agreed to review operators' qualifications, the system's responsiveness was reaffirmed.

Then, when a railroad strike interrupted regular production, management's commitment to stable employment was tested, especially given corporate pressure to lay-off employees, which did not occur since the strike ended abruptly.

At times, team leaders struggled to find the balance between structure and autonomy for their teams. However, the norms about openness and involvement produced a working-through of these issues that strengthened credibility and commitment for the new work system.

Pushing the Technology (1972):

There was now a drive on for production volume, (restrained in the first year), and the plant responded very well. Ironically, as the plant "hummed", group problem-solving and development levelled-off. Despite the successful performance, Topeka managers were troubled by a corporate management change that now had them reporting to someone who was seen as philosophically unsympathetic to Topeka.

Turmoil, Decline, and Reversal (1973):

Continued emphasis on production volume led to long hours, fewer team meetings, and delayed learning (and pay advancement) opportunities.

Management was pre-occupied with start-up of the new canned food plant, and neglected the social system maintenance and development, at the same time that tensions were rising between employees of the two plants. It was apparent that the Topeka system did not have problem-solving mechanisms for the whole organization that were as effective as the processes of the face-to-face work teams.

Steady State with Traces of Erosion (1974-78):

Topeka was still a very productive operation, and by most accounts, (including Robert Shrank's study for the Ford Foundation) a superior place to work. However, "slippage" occurred in some of the system attributes like openness and candour within teams.

Three of the four managers who had been part of the design and start-up team left General Foods. A new plant manager took over in 1976, but he was cautious about tampering with a system that was performing very well. A sense of stagnation started to set in.

Organizational Renewal (1978-81):

New products and expansion came to the dry food plant. Team members joined ad hoc committees to deal with organization design and philosophy issues. A team leader career development program began. Overall, another upward trend to a very high level of commitment set in.

A "HIGH COMMITMENT" WORKPLACE:

The "Topeka system" was a total (psychological, social, and physical) work environment designed to elicit very high levels of employee commitment to work performance. Very high and even high levels of commitment are distinguishable from a "moderate" commitment, or what may be termed a "compliant" culture that is found in a generally well-managed conventional workplace. ("Moderate" commitment is, of course, very distinct from "low" commitment or a culture of "alienation".)

For the most part, and in a variety of ways, the designers of the "Topeka system" made correct assumptions about what employees (in office and plant work) would value. Data collected by the Institute for Social Research, the Ford Foundation, and the Harvard Business School all confirm this conclusion.

However, an historical trend line of employee commitment which Prof. Walton assessed in the Topeka plant shows variation: from an extraordinarily high level in the first 18 months after start-up, then a decline and recovery all in the same third year, before a gradual decline set in for the next 5 years. (Nevertheless, commitment was always higher than "moderate commitment".)

Reference: "Establishing and Maintaining High Commitment Work Systems" in The Organizational Life Cycle, Issues in the Creation, Transformation, and Decline of Organizations, by John R. Kimberly, Robert Miles & Associates, Jossey-Bass Publishers, 1980, pp. 208-290.

Walton sees this pattern as partly due to dynamics inherent in the maturation of new plant operations:

"These dynamics arise because the developmental tendencies affecting the plant's task technology are opposite to the developmental trends of the plant's human resources.

From initial start-up to normal operation, a plant's task technology evolves from uncertainty to certainty, from a greater to a lesser need for problem-solving capability.

In contrast, the new plant's work force develops from a lesser to a greater possession of technical skills, and from lesser to greater problem-solving capability."

The situation that Walton describes is a "potential skill gap" during start-up conditions, and a "potential skill surplus" during steady-state conditions. An adverse effect of the subsequent underutilization of skills and knowledge is employees' loss of challenge and erosion of interest in the work process.

Topeka did a much better-than-average job of narrowing skill gaps and minimizing a skill surplus; however, some of these dynamics did affect variation in employee commitment. What is more apparent is that Topeka lacked some of the wherewithal to make corrections for these dynamics.

Specifically, the "system" had no regular plant-wide forum or mechanism within which fundamental organizational design questions could be raised, assessed, debated, and dealt with participatively. (This did change in the 1978-81 period.)

Secondly, the founders and leaders of the organization had not implanted the idea that the "Topeka system" would need to evolve. Managers and employees who were most supportive of the system tended to apply their commitment to protect Topeka, rather than to renew it.

Part of this "defensive" posture was likely the result of an often unsympathetic corporate environment within which the Topeka operation nonetheless survived. The most obvious sign of this condition was the number of times that the Topeka plant was handed-off from one corporate "parent" to another. However, in the formative years, there was particular tension within the General Foods family.

CORPORATE "STONEWALLING PLANT DEMOCRACY"?:

An infamous March 28, 1977 article (pp. 78-82) in Business Week magazine implied that the plant was "too threatening to too many (corporate) people", and that "management resistance spells grief for [this] worker participation plan". The article claimed that General Foods' lawyers opposed the idea of allowing team members to approve co-workers' qualifications for pay raises. Personnel managers were said to object to team members making hiring decisions. Engineers were believed to resent Topeka workers doing engineering work.

Prof. Walton's view of the friction between Topeka management and corporate executive is as follows:

"Topeka's success, for one, was threatening to other managers whose leadership style was built on opposing principles. Moreover, the plant management's demands for autonomy in certain areas and its requests for exception from other corporate procedures was resented by [corporate] staff groups...And, many corporate executives simply did not understand the Topeka system.

"For their part, the Topeka managers did not develop an effective strategy for educating and winning the support of higher management...We who planned the system were partly to blame for not devising ways to avoid this [inevitable] friction...The effect of the friction was to sour the career opportunities within General Foods for most of the original Topeka managers...

"But 'Stonewalling Plant Democracy'...was an exaggeration and misleading. In fact, some GF officials were actively supporting the spread of such innovations. One of the reasons why the Topeka approach did not spread throughout GF was because some company executives labeled the Topeka system as a "problem" for the corporation, despite its apparent economic and human successes. Equally important, there were no natural champions...among top corporate officers, (as there were, for example, in Cummins Engine Corp. and General Motors during the early 1970s, two companies with good diffusion records.

"Yet, as weak as Topeka was as a stimulus to further innovation in General Foods, the plant became a compelling example for many management teams from other corporations, who visited Topeka and whose own plant innovations were inspired by what they had observed."

Perhaps, the most accurate assessment of the plant-corporate relationship has been given by a long-service Topeka manager who is quoted in the "Topeka Pride" video as follows:

"We had sanction, but not support."

Herm Simon, the engineer who was brought into Topeka as new plant manager in 1976, and served as plant manager for approximately 20 years is said to have been under instructions from GF "to cut the missionary crap". In fact, Herm Simon who is featured in the "Topeka Pride" video became one of the strongest advocates, staunchest defender, and a true developer of the "Topeka system":

"It drove me up a rope when I first came here...[Consulting on decisions with team leaders] would take 2 or 3 days, when you could have made a decision 'like that'. Invariably they came back with the same answer or a better one. Through all layers of an organizations you have capable people, and the more freedom you can give them, the greater they're going to use their capabilities to the betterment of the entire organization."

"HIGH PERFORMANCE" RESULTS:

The Topeka plant's corporate owners may not always have been supporters, but what held off the criticism has been a very high level of performance.

Productivity has improved every year, except for one. Controllable costs--from labour to maintenance--have been 10-40% less than in comparable production. Overhead costs for the size of the organization are relatively low, because of the small number of management and support departments. Quality of product has remained uniformly high.

The dry food plant started up in 1971 and went almost 4 years without a lost-time accident. Safety performance has continued to be exemplary. Absenteeism is less than 2%. Turnover is less than 1%, so low that of the 80 people hired in 1970, 60% were still on staff 20 years later.

Perhaps, best indicator of all is the sustained growth of that intangible human factor, "Topeka Pride".

REFERENCES:

Business Week, "Stonewalling Plant Democracy", March 28, 1978, pp. 78-82.

Human Resource Executive, "Topeka Revisited", May 1990, pp. 55-58.

Ketchum, Lyman, "A Case Study of Diffusion", The Quality of Working Life, Vol.II, ed. Louis Davis, Albert Cherns, and Associates, The Free Press, 1975, pp. 138-163.

Lawler, Edward, Jenkins, G.D., and Herline, G.E., "Topeka Pet Foods Plant--selected Survey items", Institute for Social Research, Ann Arbor, Michigan, July 1974.

Schrank, Robert, "On Ending Worker Alienation: The Gaines Pet Food Plant". Edited by Roy Fairfield in Humanizing the Workplace, Prometheus Books, 1974, pp. 119-140.

Walton, Richard E., "How to Counter Alienation in the Plant", Harvard Business Review, Nov-Dec 1972, Vol. 50, No. 6.

Walton, Richard E., "The Diffusion of New Work Structures: Explaining Why Success Didn't Take", Organizational Dynamics, Winter 1975, pp.3-22.

Walton, Richard E., "The Topeka Story", The Wharton Magazine, Spring 1978, pp. 38-48.

Walton, Richard E., "Establishing and Maintaining High Commitment Work Systems", The Organizational Life Cycle, Issues in the Creation, Transformation, and Decline of Organizations by John R. Kimberly, Robert H. Miles and Associates, Jossey-Bass Publishers, 1980, pp. 208-290.

Walton, Richard E., "From Control to Commitment in the Workplace", Harvard Business Review, March-April 1985, pp.77-84.