SILESIAN UNIVERSITY OF TECHNOLOGY PUBLISHING HOUSE

SCIENTIFIC PAPERS OF SILESIAN UNIVERSITY OF TECHNOLOGY 2025
ORGANIZATION AND MANAGEMENT SERIES NO. 227

THE APPLICATION OF TRANSACTIONAL ANALYSIS IN IMPROVING TEAM WORK

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Purpose: The topic addressed in this article concerns the potential application of transactional analysis in the processes of managing people within organizations, particularly for enhancing team effectiveness.
Design/methodology/approach: The described research was conducted as complex case study using the following research methods: analysis and compilation of literature in management and social psychology, participant observation and questionnaire surveys.
Findings: The study revealed a lack of consistency between the ego states diagnosed at any stage of the transaction sequence and the predominant ego states identified both in the self-assessment of the subjects and in the opinions of their co-workers.
Research limitations/implications: The research sample size does not allow for generalization of the findings. They only concern the presented case studies and are not of a general nature. Moreover, the use of functional analysis involves potential cognitive biases on the part of the researcher, which may affect both the results obtained and the way they are interpreted. Future research could expand on these findings by including a larger number of cases and conducting the transaction analysis independently by at least two researchers, followed by a comparison of their results.
Practical implications: The author hopes that the study presented in this article will spark interest in the tools offered by transactional analysis, while also raising awareness among those deciding to use this theory in team management.
Originality/value: Managers willing to implement transactional analysis tools must be aware of the imprecision of the described techniques. This study can therefore be treated as a cautionary tale against blindly adapting methods of influencing employees based on the shape of their egogram.
Keywords: team work, transactional analysis, work effectiveness, interpersonal communication, case study.
Category of the paper: Research paper.

1. Introduction

The aim of this article is to present how transactional analysis tools can be used to shape team relationships and collaboration, while also pointing out the limitations of these methods. Currently, 70% of European organizations operate using various forms of teamwork, the dominant form of which (54%) is management-led teams. Attempts to popularize self-directed teams, undertaken in 15% of the surveyed institutions (Eurofound, Cedefop, 2020), are also worth noting. Additional challenges are provided by the increasing number of virtual teams, especially since the COVID-19 pandemic, whose functioning is inextricably linked to the spatial dispersion of members and communication via modern information technologies.

What distinguishes a work group from a team is the occurrence of a positive synergism effect, i.e. a situation in which individuals, as a result of joint action, achieve a level of efficiency higher than the sum of their individual inputs (Galata, 2006; Winkler, 2019). This explains why modern enterprises are so enthusiastic about developing a culture of work teams in their structures. Thanks to the synergy effect, it is possible to increase the efficiency of processes without increasing inputs, which is associated with a business benefit for the enterprise.

In the context of group work, the term "effectiveness" is commonly used. From a praxeological point of view, effectiveness of an action means that valuable results have been obtained as a result of it. In this work, the adopted definition states that an effective team is one capable of achieving the organization's intended goals (Pyszka, 2015).

The literature predominantly holds that the leader plays the most crucial role in shaping team effectiveness, specifically through the way this individual influences other team members (Cooper et al., 2017; Buchelt, Knop-Sapała, 2020; Dehghanan et al., 2021). This is because the leader's impact extends to almost all aspects of team functioning. The person in this role possesses resources, including both formal and informal authority, essential for setting goals, determining team size and composition, establishing norms and rules, shaping the environment and fostering team cohesion. Additionally, due to their informal authority, the leader has the capacity to shape interpersonal relationships, both among team members and between the team and the external environment.

The situational leadership model assumes that there is no universal leadership style, and therefore, the leader-manager should adapt their behavior to the requirements of the current situation, which is determined by, among other things, the level of experience of their subordinates (Goleman, 2000). Balancing between task orientation and people orientation requires an accurate assessment of colleagues' experience levels, which includes their readiness to pursue increasingly ambitious goals, tackle more challenging tasks and accept the associated responsibilities. Employee attitudes toward tasks can shift due to various factors, such as training in a specific field, commitment to organizational goals and alignment of outcomes with individual value systems (Cooper et al., 2017). Therefore, it is so important that the decision to adopt one of the leadership styles is preceded by the recognition of situational conditions that may affect the attitude of employees.

This introduces a challenge for managers: accurately diagnosing the needs and expectations of colleagues to offer the best possible support. Leaders have direct access to some of the information they need, including previous achievements of the employee, qualifications or declared level of proficiency in a given field. However, a less visible but equally important factor remains the psychophysical condition of individuals, about which the team can only infer. A perceptive leader will thus value any tools that enable them to assess the current disposition of colleagues and respond thoughtfully within the communication process.

In the 1950s, the American psychiatrist E. Berne developed an innovative therapeutic approach called transactional analysis (TA). Its assumptions refer to Freudian psychoanalysis, but the author himself saw the justification for its separation due to its accessible conceptual layer and universality of application. In one of the first published studies on transactional analysis, E. Berne (1977) described it as an approach based on the distinction and study of three ego states (exteropsychic, neopsychic and archeopsychic). According to the current definition of the International Society for Transactional Analysis, TA is considered a theory of personality and a system of psychotherapy focused on personal development and personal change (Erskine, 2009).

The theoretical achievements of TA constitute an exhaustive guide to human behavior in various environments, including the professional environment. The particular usefulness of TA in the area of interpersonal communication encourages attempts to apply its theory to teams, as structures in which the efficiency of the communication process has a special business significance. Knowledge of ego states can be used for (Hall, 2019; Szymanowska, Sękowska, 2000; Tassabehji et al., 2024):

- improving communication with individual team members - the ability to recognize the ego state from which the interlocutor communicates allows you to adjust your own ego state in such a way that the conversation achieves the expected result;
- conflict management - knowledge of ego states and different types of transactions makes it easier to prevent communication noise, and in the event of their occurrence allows you to efficiently explain the essence of the dispute,
- motivation - knowledge of the employee's dominant life attitude allows managers to adjust the methods of influence in order to strengthen commitment,
- change management – awareness of the needs of employees who adopt specific Ego states in conditions of uncertainty makes it easier for leaders to adapt their leadership style to the requirements of the situation,
- self-development and self-improvement – transactional analysis offers tools designed to examine the structure of one's own personality, and insights from such analyses can be applied to relationships with colleagues,

- supporting and promoting diversity – the differences in personality structure between individuals highlighted in TA can inspire employees to treat each other with respect and build understanding for different reactions or attitudes.

2. Methodology

The area of so-called organizational transactional analysis includes the use of TA tools in the professional environment, including the study of interactions between employees. Functional analysis consists in the diagnosis of the ego state of the subjects by the researcher (Harris, 2020; Stewart, Joines, 2021), which creates a research problem regarding the consistency of attitudes exhibited by employees in the opinion of their co-workers with the attitudes identified by the researcher and the self-assessment of the subject. This research problem has led to the formulation of the study's aim, which is to verify the effectiveness of using transactional analysis mechanisms in shaping relationships and fostering teamwork collaboration. The following research questions were posed:

- Is there alignment between the ego-state profile developed based on an individual's self-assessment and the ego-state profile developed based on the opinions of their colleagues?
- Is there consistency between an individual's behavior in a specific situation and the ego-state profile developed based on their self-assessment?
- Is there consistency between an individual's behavior in a specific situation and the ego-state profile developed based on the opinions of their colleagues?

The study was conducted using a mixed method, due to the difficult to quantify aspect of interpersonal relations and the need to perform an in-depth analysis in order to gain new knowledge related to the subject of the study (Czakon, 2015; Samul, 2016). In accordance with Podgórski's classification (2007), the author used a combination of the sociopsychological field research method with the sociometric method. The exploratory nature of the study is emphasized by its structure - the study was constructed as a comprehensive case study, enhanced by five techniques: observation, functional analysis of the material collected during observation, a sociometric test using the classic J. Moreno technique and the "Guess who?" technique, and the Personal Style Questionnaire psychometric test.

The study aims to determine the usefulness of selected theories and tools of TA in enhancing team effectiveness. The participants were selected employees of a company located in south-eastern Poland, responsible for overseeing production areas, who collaborate within an organisation. According to the author, an accurate diagnosis of ego states requires familiarity with the characteristic behaviors of the individual being studied. Therefore, in the present study, the functional analysis was preceded by participant observation. Due to the in-depth nature of the observation, it was necessary to limit the sample size. Table 1 presents a summary of demographic data for those who participated in the study.

Table 1.
Presentation of the research sample members by gender, position, age and work experience

Person	Characteristics			
	gender	job position	age (in years)	work experience (in years)
A	Male	Production Director	30-40	> 15
B	Male	Production Planner	30-40	10-15
C	Male	Production Planner	30-40	< 5
D	Female	Logistics	30-40	< 5
E	Female	Buyer	50-60	> 15
F	Female	Buyer	40-50	> 15
G	Male	Production Manager	30-40	10-15
H	Female	Production Manager	30-40	10-15

Source: Own study.

As part of the described study, a questionnaire consisting of four parts was prepared. Respondents filled out the sheets in writing, and then the obtained data was processed electronically by the researcher.

The first part of the questionnaire was a sociometric test constructed using the classic J. Moreno technique. The questions contained in it concerned interpersonal relations between members of the studied team. Two sociometric criteria were adopted - professional and non-professional situation. The aim of the test was to learn about the sociometric structure of the team and to determine the position of individual units.

Parts II and III of the questionnaire contained another sociometric test, prepared specifically for the needs of the study, consisting of 30 statements in Part II and 20 descriptions in Part III. The descriptions given had to be matched with one person from among the team members who best met the criterion included in the statement (sociometric technique "Guess who?"). The wording in these parts of the questionnaire was constructed in such a way that, based on the answers, it was possible to determine the dominant ego state adopted by each of the team members. When formulating the criteria, the author used the following tools:

- "Egogram Strukturalny. Kwestionariusz Samooceny Stanów Ja" by A. Pierzchała, A. Sarnat-Ciastko (2011).
- "Egogram EFP" proposed by J. Jagieła (2011),
- "Kwestionariusz Stylów Osobistych" by E. Szymanowska, M. Sękowska (2000).

Part IV of the questionnaire was a psychometric test prepared on the basis of the "Kwestionariusz Stylów Osobistych" by E. Szymanowska and M. Sękowska (2000). Respondents performed a self-assessment according to 40 statements, so that it was possible to compare the assessments obtained from other group members with the subject's own assessment.

The research procedure of the empirical part assumed conducting the study in two stages. The first stage was an observation, conducted from July 2021 to July 2023. During this time, the author noted observations regarding situations in which the effectiveness of the work of the studied team could be disrupted. Eight people supervising production processes were subjected to observation. The choice of the research group was purposeful. The second stage included a questionnaire survey, to which seven of the eight people mentioned above were subjected - it did not include person A, due to the hierarchical dependence in the organizational structure to which the author belonged as part of the participant observation.

3. Results

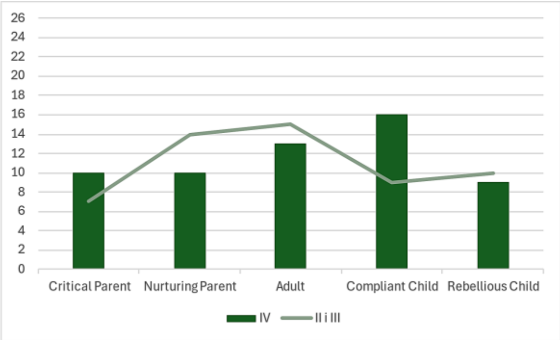
The result of the observation was a description of five situations, for which the interviewees' ego states were then indicated. In turn, Parts II and III of the questionnaire examined how the respondents perceived the behavior of other team members in the context of the theory of ego states of transactional analysis. Data analysis from the sociometric study allowed for the creation of a matrix indicating the intensity of dominant ego states within the team (see Table 2). Primarily, the analysis identified "sociometric stars", that is employees who, according to other respondents, most strongly exhibit characteristics of a particular dominant ego state.

Table 2.
Matrix of the Intensity of Dominant Ego States Based on Respondents' Choices in Parts II and III of the Questionnaire

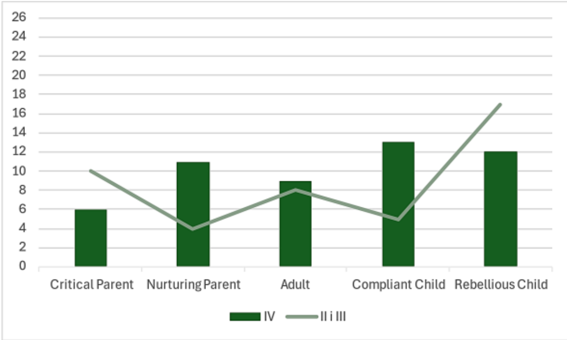
Ego State	B	C	D	E	F	G	H
Controlling/Critical Parent (CP)	7	10	5	5	17	4	20
Nurturing Parent (NP)	14	4	13	1	11	13	4
Adult (A)	15	8	9	8	7	14	6
Compliant Child (CC)	9	5	7	12	6	6	9
Rebellious Child (RC)	10	17	4	4	20	12	4

Source: Own study.

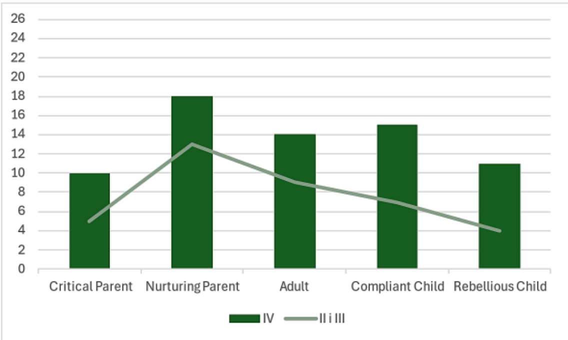
The analysis of the respondents' answers in Part IV of the questionnaire allowed the development of an egogram for each of the surveyed persons. Then, line graphs illustrating the answers from Parts II and III of the questionnaire were plotted on the constructed histograms. In this way, an individual profile of ego states was developed for each of the surveyed team members, taking into account the self-assessment of the surveyed person and the opinions of their colleagues. The creation and interpretation of individual profiles of ego states of the surveyed team members allowed the illustration of the potential for influencing the effectiveness of their work. Figure 1 presents a graphical interpretation of the surveyed answers using histograms.



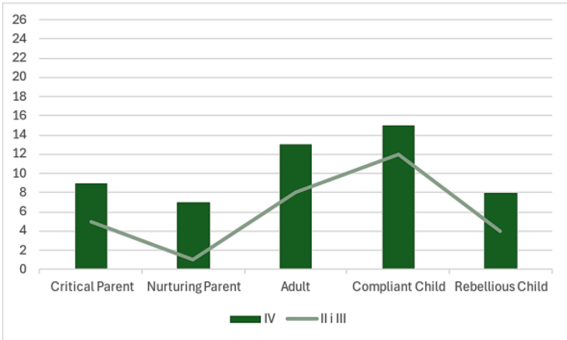
Person B



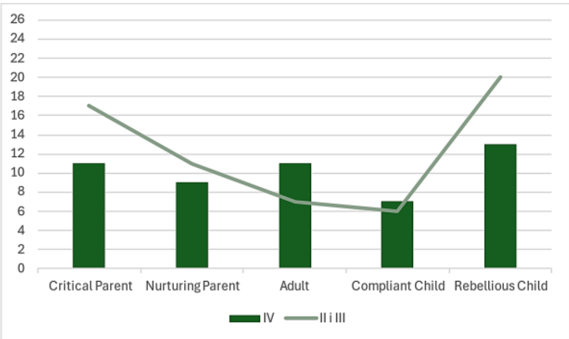
Person C



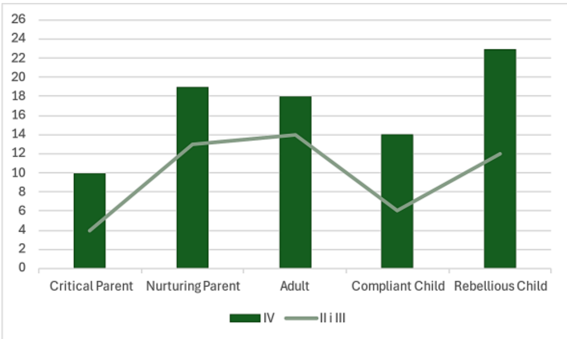
Person D



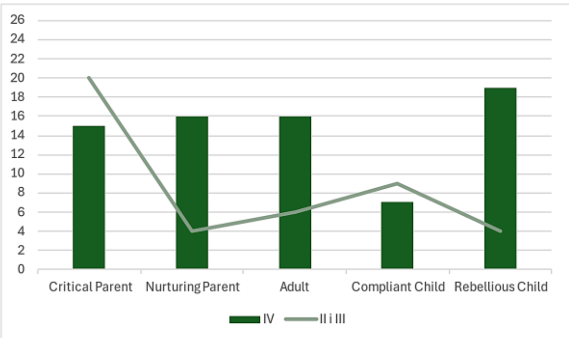
Person E



Person F



Person G



Person H

Figure 1. The intensity of traits associated with each ego state of research participants based on sociometric and psychometric assessments.

Source: Own study.

4. Discussion

Comparison of the highest and lowest rated ego states reveals that only two out of the seven participants show consistency between their self-identification results and the opinions of others. It can therefore be concluded that there are significant discrepancies between the profiles based on self-assessment and those based on the sociometric technique, making it impossible to clearly determine which method of perceiving an individual's behaviors should provide insight into the adequate mechanisms of transactional analysis.

The above-mentioned discrepancies in the way an individual's behavior is perceived as manifestations of specific ego states provide a starting point for verifying the consistency of the functional analysis results with:

- the ego state profile developed on the basis of self-assessment,
- the ego state profile developed on the basis of co-workers' opinions about the individual.

For this purpose, three key moments were identified for five selected situations from the material collected during participant observation and subjected to functional analysis. These situations, according to the author, posed a threat to the effective work of the team under study. The three key moments are:

- the beginning moment, when the behavior of the interlocutors is most often spontaneous, natural and unthoughtful,
- the turning point, when transactions usually cross and both the agent's and respondent's behaviors may have been premeditated,
- the end of the transaction sequence, when the interlocutors adopt the most comfortable postures for them.

For each of the stages listed, the ego state from which the message was sent was indicated. Then, the consistency of the identified attitudes with the results of the study of dominant ego states conducted using a questionnaire was checked. 30 transactional stimuli were analyzed (for three stimuli, there was consistency in both self-assessment and in colleagues' opinions). In 16 cases, there was a lack of consistency, which constitutes 53% of all stimuli considered. For 9 situations, it is possible to indicate consistency between the identified ego state and the dominant ego state from the sociometric study (opinions of co-workers). The remaining 8 cases are consistent with the result of self-assessment. Additionally, no observed consistency was related to the stage of the transaction sequence. For example, the ego state initiating the conversation was consistent with the self-assessment in only 2 out of 10 cases, and with colleagues' evaluations – in three cases.

The above analysis of five situations shows a lack of consistency between the ego state diagnosed at any stage of the transaction sequence and the dominant ego states defined both in self-assessment and in the opinions of others. Based on the conducted study, it can therefore be stated that a thorough knowledge of the mechanisms of transactional analysis, especially the ego states of team members, does not allow for a direct translation of this knowledge into improving the work of teams. However, it should be noted that in this study the ego state diagnosis was not carried out by a trained transactional analyst, and therefore it would be premature to dismiss transactional analysis as ineffective in the context of team management. It would be more appropriate to accept the interpretation that the use of TA tools by non-experts, such as ambitious managers seeking innovative ways to influence their colleagues, should be accompanied by an awareness of the imprecision of the described techniques. The variety of interpretations, compounded by the different perceptions of each analyst, creates a broad scope for drawing incorrect conclusions. This study can therefore be treated as a cautionary tale against blindly adapting methods of influencing employees based on the shape of their egogram.

5. Summary

Teams operating in times of unpredictable crises, dynamic economic changes and increasing competition face numerous challenges, among which the key to survival seems to be continuous improvement of efficiency. Innovative ways to enhance cooperation and strengthen interpersonal relationships are being sought to contribute to the success of the organization. Transactional analysis, offering a unique approach to interpersonal relations, provides exceptional techniques dedicated to shaping relationships, including among employees.

In the described study, an attempt was made to test whether the mechanisms of transactional analysis constitute an effective tool for improving team performance. The synthetic conclusions from the conducted research can be summarized as follows:

- the study showed a discrepancy between the self-assessment of the behaviors undertaken by the employee and the opinion of others about them,
- the study showed a lack of consistency between the ego states diagnosed during the functional analysis at different stages of the transaction sequence and the results of the dominant ego states from self-assessment,
- the study showed a lack of consistency between the ego states diagnosed during the functional analysis at different stages of the transaction sequence and the results of the dominant ego states from the sociometric study.

Based on these findings, the use of only the "Kwestionariusz Stylów Osobistych" to determine tendencies in employee attitudes can be questioned. The essence of using this tool is for the respondent to make a self-assessment of their behavior. This is therefore associated with the risk of giving thoughtful, cautious answers, often adjusted to an imagined pattern of desired attitude. The way colleagues evaluate the behaviors of others is also influenced by their subjective understanding of a given statement in the questionnaire and by their personal likes and dislikes towards the individual.

On the other hand, the reason for the lack of consistency between the ego states identified during the functional analysis and both the self-identification and the colleagues' evaluations may lie in the problematic nature of the selected situations. Participants in the described cases faced a professional challenge, which undoubtedly influenced the intensity of their reactions. In such situations, individuals may prefer to use mechanisms consistent with the organizational culture, including implicit norms or their own learned and proven ways of coping with discomfort. Furthermore, the way ego states are manifested through behaviors may change under the influence of situational factors, including the environment, professional relationships, and potential consequences of the behavior, etc.

The author hopes that the research results achieved will make all those interested in the subject of transactional analysis aware that, despite the accessible conceptual framework, the use of the proposed techniques is associated with the subjectivity of perception and interpretation, and therefore carries a significant risk of cognitive distortions, both on the part of the researcher and the individuals being studied. The results should be of particular interest to managers considering implementing the TA methodology in their daily work.

The study described in this article leaves space for more detailed and extensive research, such as those based on the analysis of a larger number of cases and repeated observations of a given employee. In addition, a way to minimize the likelihood of distortions and cognitive errors could be conducting transactional analysis by at least two researchers.

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