<u>Alexander Technique and Self-regulation</u>

The effects of the Alexander Technique on competency and efficiency of self-regulation

Summary of a study by Inga Bronowski

University of Koblenz-Landau Psychology Department

Contact:

Inga Bronowski info@inga-bronowski.de

Scientific supervision and mentoring Prof. Dr. Nicola Baumann (Trier University) Dr. Thorsten Rasch (University of Koblenz-Landau)

1. Overview

Question

Does the competency of self-regulation of a student of the Alexander Technique, in comparison with those of a person in a control group, change after 8 lessons?

Sample

44 students of the Alexander Technique between the ages of 22 and 65, of which 10 were male and 34 were female.

44 persons in the control group were between the ages of 18 and 58. The control group consisted of psychology-students and persons with a background in the arts or body-work. 14 were male and 30 female.

Sequence

A preliminary test between February and March 2010, and a follow-up test after 8 lessons.

4 *Instruments* for the measurement of different aspects of access to the sense of self and self-regulation were used: the choice to disengage from patterns, an inventory of self-control (SSI-K3), HAKEMP, a questionnaire to access to the sense of self (SZF), as well as qualitative questions.

Results

General changes

Changes in the capacity to calm oneself, to motivate oneself, to follow one's own aims, to cope with failure, to plan, to actualize intentions and to stay in contact with oneself.

Differential Changes: state orientation

Persons who tend to remain in a negative affect, benefit more from the Alexander technique, presumably because their self-regulatory capacities are less developed.

2. Research question

The current study researched the questions: can psychological self-regulatory processes (as they are understood by Kuhl¹ 2001) be influenced by a body-orientated method like the Alexander technique, and what could be understood as the underlying mechanism?

These questions were inspired by findings in Autogenic training (a relaxation method) studies in which the changes in self-regulatory abilities were influenced (Krampen, 1996). Furthermore, results that emerged from research on the Alexander Technique indicate that psychologically not only well-being, contentment with life and depressive

¹ The present study is based on Julius Kuhl's PSI (personality system interactions) - theory (2001) which can be read on the internet if necessary.

states, but also the capacity for inner self-control, that means self-regulation, are positively influenced. (Stalibrass Sissons & Chalmers, 2002; Deichelbohrer, 1983)

3. What is self-regulation?

As the word says, self-regulation is the ability to *regulate* one's self. Many different components can be distinguished in this capacity. In summary it can be said that all those capacities through which a person can – appropriate to the situation and in accordance with themselves – deal with their own experience (being aware of and being able to assimilate their own feelings) and acting (to form goals and to be able to implement them).



4. Results

Notes on terms in graphic:

Selbststeuerung = Self-regulation; Kontrollgruppe = control group; Selbststeuerungskomponenten (siehe Beschreibung) = Components of Self-regulation (see below); Höhe der Veränderung = Degree of change

The ten bars in the chart show the variations in the components of self-regulation comparing the Alexander Technique group and the control group. As regards the components of self-control see the description under 5 below. It can be seen that the self-regulation capacities of the control group barely changed (grey bars), while some components in the Alexander Technique group increased markedly (black bars). The comparison with the control group makes it possible to interpret the results in a way that the changes in the Alexander Technique group were positively furthered, if not decidedly influenced by the Alexander Technique.

5. Description of the components of self-regulation

1. Self-determination

To what extent are your activities congruent with your needs and values?

2. Self-motivation

To what extent can you stay in a good mood when you have challenging tasks to carry out?

3. Calming oneself / Self-relaxation

How well can you reduce insecurity, nervousness and fear and process unpleasant experiences in a manner conducive to your own growth?

4. Planning

How well can you approach tasks and goals with structured planning?

5. Fearless goal orientation

To what extent are you free from internal pressure when pursuing goals and to what extent are you capable of not being led by fear of failure in your actions?

- 6. *Initiative* How well can you generate energy to initiate your own and other's activities?
- 7. *Actualization of intentions* How well can you actualize your intentions instead of procrastinating?
- 8. Concentration

How well can you withstand inner and outer distractions so as to remain concentrated on one task?

9. Coping with failures

How well can you learn from your mistakes and accept unpleasant outcomes instead of brooding over them for a long time?

10. Contact to oneself

How well can you feel what you want and who you are when under stress and pressure?

6. Who benefits from the Alexander Technique?

In this study, a personality trait which Kuhl & Beckmann (1994) call *Action versus state orientation,* was researched. This quality describes how quickly a person recovers from failures and returns to the ability to act, and how easily he/she can realize challening intentions. To summarize: does the person remain in a state or does he/she react quickly?

Every person has a dominant trait of either being state or action orientated. Neither of these qualities is good or bad per se. To remain in a state instead of reacting quickly can be an advantage when the situation is difficult and needs to be thought through. At the same time, individuals who are state orientated have the tendency to lose their sense of self when faced with stress or pressure. They tend to self-alienation by giving up their own wishes and adopting the expectations of others. In a relaxed atmosphere however, they are very concentrated and have a clear picture of who they are. Action orientated people often have an advantage in the situations which demand quick reactions and spontaneity. They know what they want and what suits them even under pressure.

Despite this, they find it difficult to accept negative emotions as they are without immediately trying to compensate for them.

The results say that especially with state orientated individuals, meaning those who habitually wait before planning and don't react spontaneously, some of the selfregulation components change. The following chart clarifies the difference between state- and action orientated people in the Alexander technique group. It can be seen that action orientated individuals already have a high level of self-motivation and the capacity to decide for themselves, and that their appraisal of their self- regulation competency does not change from the lessons, while the state orientated participants profit significantly.



Notes on terms in graphic:

Treatmentgruppe: Group that received Alexander Technique; Handlungsorientierung x Selbstregulation = Action orientation x self-regulation; Skalenwert = Scale value; Messzeitpunkt = Time of measurement; Handlungsorientierte Selbstbestimmung = Action orientated selfdetermination; Lageorientierte Selbstbestimmung = State orientated self-determination; Handlungsorientierte Selbstmotivierung = Action orientated self-motivation, Lageorientierte Selbstmotivierung = State orientated self-motivation

6. Interpretation

As the Alexander technique does not work directly on the psychological or psychotherapeutic self-regulation components, the question is raised why these components nevertheless change in the Alexander technique group. In this study, the operating mechanism is explained following the work of Kuhl (2001) with the system-conditioning model, in which the interaction between the different systems is strengthened.

These four psychological systems can be compared metaphorically with a ship:

System of the self

Our ship has an owner who wishes to travel from A to B but needs a qualified crew, as he does not have a license to drive a boat.

In the PSI theory, the self-system is part of the memory extension and therefore it is not an independent control system.

1. Extension memory (feeling)

A ship needs a captain with a vision, who has an overview of all the necessary activities on board, but does not need to do every detail himself as he has sailors who receive orders from the first officer.

2. Object recognition system (sensation)

A sailor sits on the mast of the ship, looking out for individual islands and possible signs of danger. Through his position, he does not have a large overall view, but can nevertheless be clearly aware of individual things and report them.

3. Intention memory (thinking / analysing)

The first officer on board gives orders to the sailors about what they are to do. He translates the captain's vision (the destination) into a plan with all its small steps and knows exactly when and in which order to implement them.

4. Intuitive control of behaviour (acting)

Finally, there are the many sailors who must put into effect all the important work needed to be done on board. They are well practiced and have no need to think about how, for example, to raise a sail.

In order that the ship can sail, everyone must communicate with each other and do their jobs well. Now an individual person is like a ship and can only effectively reflect experiences, generate goals from within and be effective in the world when all systems communicate with each other well. The Alexander technique has a saying: "Use defines function". When applied to the psychological systems, it means that only with good use (good connection and meaningful communication) they can support a person's "functioning" in the world.



 $A \rightarrow Sensitivity$ (Fear of punishment)

Figure: Presentation of psychological systems. The two independent affect dimensions and the central self-regulatory componetencies of calming oneself and motivating oneself.

A - = Negative affect; A (-) downward regulated negative affect: A + = positive affect; A (+) = downward regulated positive affect

What happens according to the System conditioning model in an Alexander technique lesson?

As we learn impulse-reaction mechanisms in which designated impulses are paired with specific reactions, so can we also learn to wire specific areas of the brain with each other by using them synchronously or shortly after each other. By applying the principles and procedures of the Alexander technique, a system in the brain that coordinates complex regulatory processes (System of the self) is getting connected with the brain's executive system. This superordinate control system also regulates the connections between the executive systems within each other. As state orientated persons have, under stress and pressure, a weaker connection to their self-system, as a consequence they experience it as harder to keep up the connection between these different systems. Thus, they benefit from the Alexander technique in particular because precisely these connections are strengthened. In comparison, action orientated persons can find the connections between the systems are well connected with each other, they can also be effective in other contexts.

Alexander technique students improve their self-regulatory competencies although psychology is not directly addressed in the sessions. The connection between the systems, which is the basis of self-regulatory competencies, is strengthened. This can be seen on the psychological level.

In this work the use of quality and quantity methods of measurement, allow a broader spectrum of effects from Alexander technique sessions to be recognised. Particularly strong changes have been observed in body awareness, the self-regulatory capacities and, partly, the ability to prepare an action, evidenced qualitatively as well as quantitatively. Furthermore, participants reported more ease, heightened awareness, a greater capacity to relax and ease pain, as well as a better access to themselves. Alexander technique does not only improve wellbeing, in other contexts it also supports the processing of uncomfortable experiences and feelings, strengthens the congruence between what persons want and what they do, allows, out of personal strength, to overcome hurdles and difficulties, and supports the realisation of plans and their outcome because the access to the self is strengthened.

This study cannot answer the question of how long the observed changes will last and how deeply their effects are. Such propositions would require a follow-up study and the use of objective measurement instruments.

Literature

- Krampen, G. (1996). Evaluation of the Effectiveness of Autogenic Training in the Gerontopsychology. Its Role in Developmental Intervention and Its Effects on Development Related Cognitions and Emotions as well as Psychosomatic Complaints in the Elderly. European Psychologist 1 (4), 243-254.
- Kuhl, J. & Beckmann, J. (1994). Volition and personality: Action versus state orientation. Göttingen/Seattle: Hogrefe.
- Kuhl, J. (2001). Motivation und Persönlichkeit. Interaktionen psychischer Systeme. Göttingen: Hogrefe.
- Stallibrass, C., Sissons, P. & Chalmers C. (2002). Randomized controlled trial of the Alexander Technique for idiopathic Parkinson's disease. Clinical Rehabilitation 16, 705–718.
- Deichelbohrer, G. (1983). Untersuchung zweier Körperverfahren hinsichtlich ihrer Anwendungsmöglichkeiten in der Psychotherapie. Unpublished diploma thesis der Universität Freiburg i.Br.