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18: Basic Body Awareness Therapy (B-BAT)

1 Introduction

In today's medicine, it is very important to accept human beings as an integrated part of the physical, psychological and social environments and also as a whole. In this bio-psychosocial approach, physiotherapists focus not only on biological and physical aspects of the patients, but also on their psychosocial aspects. Body awareness therapy is related to wide range of professional fields such as physiotherapy, psychiatry, medical and psychotherapy. Body awareness knowledge is a general concept for the use and experience of the body, which represents body consciousness, body management and in-depth body experience (Roxendal, 1985). Basic body awareness therapy is a common name for a series of body-oriented physiotherapeutic approaches that use a holistic perspective in physiotherapy applications towards awareness about body function behavior, its interaction with himself and others, how the body is used (Gyllensten, 2001).

Body-oriented therapies address the boundaries between conscious and unconscious existence where the focus is based on bodily experience and non-verbal behavior (Roxendal, 1985). Compared with other body-oriented or mindfulness therapies, there is a systematic training of ego at the physical level that originates from certain body functions, intention and self-observation at the mental level (Hedlund and Gyllensten, 2010). In physiotherapy content, body awareness is defined in two ways: (1) body experience (dimension of experience) and (2) actions and behavior in movement and activities (dimension of movement). In the dimension of experience, body awareness therapy emphasizes subjective body experiences. In the dimension of movement, body awareness therapy aims to normalize the posture, balance, breathing, muscle tension or stiffness that can be observed and experienced in a movement pattern (Gyllensten et al., 2010).

The aim of body awareness therapy is to increase sensory-motor awareness, dysfunctional movement patterns, perception of habits and movement control by increasing grounding, stability at the centerline, centering, breathing and flow (Gyllensten et al., 1999). In this way, individuals awareness of themselves, their environment, other people and the world as a whole increase by strengthening their bodies (Gyllensten et al., 2010). This health effect provides opportunities to individuals to increase their creativity and make their own choices in life.

2 Development of Basic Body Awareness Therapy

Basic BAT (B-BAT) is the common name of several physiotherapeutic approaches for the body which use a holistic perspective in physiotherapy. The B-BAT was inspired from Western movement traditions such as Feldenkrais, Alexander technique and European movement traditions (Grindler and Silver). Body-oriented psychotherapy (Reich and Lowen) also affected the B-BAT. From the east, Zen meditation and Tai-Chi Chuan (Tai Chi) are important sources of influence. The B-BAT was developed from Tai Chi's starting exercises and therefore it tends to follow the same principles. French psychotherapist and actor Jacques Dropsy synthesized the traditions mentioned above and published two books explaining the method. Dropsy called the movement system as "Psychotoni" or "Basic Movements".

Swedish physiotherapist Gertrud Roxendal met with Jacques Dropsy, a French psychoanalyst and movement instructor in the early 1970s. She deemed Dropsy's movement practice significant and integrated it into the physiotherapy practice and curriculum under the name of basic body awareness therapy (Basal Kroppskännedom). She also developed body awareness scale, which was target basic body awareness therapy and measured grounding, posture, coordination, breathing and flow. She used the B-BAT method and the BA scale in the treatment of schizophrenia patients and published her results with a thesis at the University of Gothenburg Medical Faculty (Roxendal, 1985).

Then, the method was used in long-lasting pain rehabilitation, mostly in psychiatric physiotherapy. Roxendal developed the concept of body ego in the 1990s. The concept of body ego was first used by S. Freud in 1923; Roxendal described it as a bodily appearance of the inseparable unit of mind/body and being human (Gyllensten, 2001). Grounding, vertical balance in the center line, centering in movements, coordination from torso and solar plexus area, breathing, flow and awareness are seen as important aspects of body ego trained in the BAT (Gyllensten, 2001; Hedlund and Gyllensten, 2010).

3 Theories of Basic Body Awareness Therapy (According to J. Dropsy)

Basic body awareness therapy is based on Jacques Dropsy's theories. These theories are as follows:

3.1 Theories about Movements

Dynamic postural balance is essential for movement quality. It is stimulated by placing the weight slightly forward in front of feet. The ability to trust

the ground in carrying the body weight is also trained in this content. When dynamic postural balance is found, the body is experienced as weightless. One of his main theories is the organization of the muscular system in three layers, from its deepest layer to superficial muscle layer. The deepest layer, which is close to the bones, consists of antigravity muscles that have the function of protecting the body in a stable but in an elastic upright position against gravity. The next layer consists of the muscles associated with breathing function. The superficial layer of voluntary muscles is associated with the ability to direct voluntary movements. When the body is well balanced, the three layers work very well with respect to the natural basic functions. When the body is not balanced, the superficial muscle layer, which is only intended to direct movements, is used to hold the body upright against gravity. According to Dropsy, voluntary muscles cannot do this. Muscle cramps or pain and other musculoskeletal problems burst later. Respiration will not become well functional and be experienced as blocked or restricted. The movements are often uncoordinated; much more of effort is made even when making a small movement.

The quality of coordination in movements also follows three main ways of coordination in torso. They all consist of the area around the thoracic vertebra 12 region at the back and the center of movement in the solar plexus region at the front. Three basic coordination: a) Coordination of flexion/extension around the center of movement in the solar plexus region; this coordination, breathing coordination and emotional, instructive life are highly interrelated. The coordination in the center is shown in the peripheral movement of the extremities. b) Rotation around the vertical axis: This is the coordination of rotation with a spiral and twisting movement of the body around the vertical axis from the feet to the head. We can observe how the whole body rotates in the same direction as a whole. In rotation around the central axis, hip and shoulders move to the right or left side simultaneously. c) Torso rotation and counter-rotation coordination (walking coordination): Upper and lower part of body rotate in the opposite direction. In the search for coordination lines, the relationship between rotation and counter-rotation around the central region can be observed. These three coordination of the torso are considered to be the source of all possible actions which start in the torso center in other words diaphragm region. These coordination ways in the torso are the drivers of all other coordination in the body, including the arms and legs. The coordinations are closely related to respiratory and psychological functions (Gyllensten, 2001; Skjaerven et al., 2003).

3.2 Theories about Breathing

Theories about breathing play a fundamental role in the movement model. Breathing has a pair of innervations that are both voluntary and automatic stimulation. According to Dropsy, this means that breathing is a part of conscious and unconscious life, and acts as a bridge between these two aspects of life. Breathing can be somehow controlled by our conscious. We can breathe fast or slow if we want to. Unconscious factors also affect breathing. These factors may suppress the feelings or individuals may expend energy to adapt the situations such as stress and anxiety. This situation may cause tension in respiratory muscles. When breathing is inhibited, diaphragm retaining and short breath can cause symptoms such as disorders ftom stomach-to-heart and decreased vitality (Gyllensten, 2001).

3.3 The Theory of Three-Fold Contact Problem

Dropsy states that psychological problems are seen in three dimensions: the relationship with the body and self, relationship with other people and relationship with reality perception. In this theory, Dropsy suggested that the problems in getting in contact with one's own body indicate a problem in getting in contact with others and the perception of reality or vice versa. A lack of awareness can be observed in the body; it can cause dysfunction when there is no vitality, rhythm, flow and integrity in the body. According to this theory, the lack of awareness is expressed in the body and can be seen as non-functionality in other the movements with lack of dynamism, flow, rhythm and integrity. The clinical studies on three-fold contact problem showed that it is beneficial (Gyllensten, 2001; Gard, 2005; Skjaerven et al., 2010).

4 Body Functions

4.1 Daily Movements and Function

Functional skills in daily movements depends on stability in function, coordination, breathing, self-awareness and awareness of others and making contacts. This situation is consistent with the theories of Dropsy about balance, freedom and awareness. According to the World Confederation for Physiotherapists (WCPT), movement and functional skills are the main fields of physiotherapists and are of great importance for individuals' health-related life quality and physical, psychological, emotional and social well-being.

4.2 Balance and Posture

In order to maintain a balanced sitting and standing posture, a harmony between the upward and downward forces is required. The base of the balanced posture is the feet. In order to achieve dynamic balance, the weight of body should be placed in the middle of the feet and in front of the ankles. In this way, a dynamic and balanced posture is formed upwards along the balance line. This dynamic posture requires freedom in the knees and hips and thus balanced curvatures form in the spine with lumbar lordosis, thoracic kyphosis and cervical lordosis. A good posture should not contain any effort, be comfortable and provide the basis for functional movements. Balance and posture are closely linked to each other and cannot occur separately (Gyllensten et al., 2018).

Standing Function: A good contact between the soles of the feet and the floor gives a feeling of increase in safety, stability and balance and it makes the movements free. In the B-BAT, this is called as grounding. It is accepted as an aspect of optimal postural stability and is very important for daily functions. Grounding exercises are paid attention to movements and actively emphasized. Another training in B-BAT is the applications of staying within the stability limits. Stability limits are the areas in which the body can maintain stability without changing the support surface. This means that the soles of the feet remain in contact with the floor as the whole body moves backward and forward.

Sitting Function: Finding the internal stability in sitting is based on sitting in which gravity and correction functions balance each other. When relaxed balance is found, the superficial muscles gradually relax and the deep postural muscles such as multifidus and rotators, transversus abdominus and pelvic floor muscles are activated. In an unstable sitting posture, the person is assisted by being instructed to place his or her feet firmly on the floor and to consciously hold the sitting bones against the chair in the BAT.

Lying Function: There is minimal postural activity in lying; it is the easiest position to find relaxation. Lying on the ground and resting naturally provides a good recovery for a while. In B-BAT movements, the relationship with the ground is applied. For example, the relationship with the ground is consciously considered. An example of this is the ability to be carried by the floor and to leave it up to the gravity.

Walking Function: The way of walking reflects both universal rules and individual characteristics. A person is easily recognized from a distance with his/her walking style. Walking is affected by both internal and external factors; the functional walking pattern is easily impaired. The aim of the BAT is to find a functional stable gait with walking along the longitudinal axis that is called as the

balance line. Making contact with postural stability requires effective walking. This balance line is not static and stiff, but it is dynamic; it gives a constant feeling and is also a flexible reference point. When the balance line is provided appropriately, walking becomes easy. In BBAT, walking trainings individuals' attention is directed to walking perception and different walking patterns. The exercises are done in relation with time (slow/fast, slower/faster), space-related (circle/straight/free), direction-related (forward, backward) and in coordination with others within the group (Roxendal, 1985; Gyllensten et al., 2018).

4.3 Breathing

Breathing is partly conscious and partly unconscious and people usually don't notice how they breathe. Breathing adapts to body movements and changes the degree of activity. It is prevented or stimulated by different feelings and emotions. Mental trauma or diseases often cause persistent disorders related to breathing (Roxendal, 1985). When a peaceful state of mind is reached, breathing becomes easier and there is no tension in the body. Free breathing provides freedom, efficiency and harmony in movements, and also comes into contact with internal needs and desires. When only the voluntary skeletal muscles in the torso, arms and legs are balanced and relaxed, the breathing wave may spread towards the periphery. The interaction between inhaling and exhaling is like a continuous tide consisting of a series of rhythmic contraction and relaxation. Breathing exercises are often initiated by directing the individual's attention to how breathing works alone. Then breathing is consciously integrated with movements and the training continues. The aim is to change one's habits of holding breath and tense up while doing movement or activity. In the BAT, breath relieving is also made by using of some sounds. Training with sounds functions by decreasing the muscular tension around the thorax and diaphragm by increasing the energy experience. Doing the exercises with breath and voice easily evoke emotional reactions. Therefore, it should be performed with great care and professionalism (Roxendal, 1985; Gyllensten, 2001; Gyllensten et al., 2018).

4.4 Rhythm

Human life and movements are subject to constant rhythmic changes like those of other living things. Physiologically dominant rhythms include heartbeat, breathing and menstrual cycles, and have an evident connection with psychic life. Each individual is considered to have his or her own basic rhythm that changes in different life situations. This personal basic rhythm fits other external rhythms. The sense of rhythm is trained in different ways. Breathing determines

the rhythm which fits movements. Rhythm is another aspect of centering. Well-coordinated and harmonious movement can be seen as a result of rhythmic change between tension and relaxation (Roxendal, 1985; Gyllensten et al., 2018).

4.5 Coordination/Center of Movement

The freedom in motor function depends on the ability of the body to effectively control of movements as well as the integration of breathing, balanced posture. This is achieved by contact with the center of movement. The center of movement is of great importance both for good functional coordination and for using of force and freedom in movements. When the movements are centered, they become fluent, circular or spiral, i.e., three-dimensional. The experience that is obtained from mevements is feeling the movement easily and free. The coordination depends on the balance between the center and the periphery. Muscle tensions in the waist, diaphragm or abdominal muscles can cause stress and stiffness in the area around the center of movement. The movement pattern may then become fragmented, rough and less coordinated. When the movements are centered and integrated, it is experienced and expressed as a smooth wave motion in which the least force is required and the whole body is in a connection. The stability in the longitudinal axis or balance line is also important for coordinating and centralizing the movement (Gyllensten et al., 2018).

4.6 Intention and Integrity

Both intention and integrity are important for the quality of movement. When performing B-BAT movements, intentions and images are often used to create meaning from a function or situation imagined. This involves imagining of "pushing something away" that results in stretching the legs or "sea waves" that cause rising of arms when the legs are fixed to the ground by an individual. Therefore, attention is focused on the task of movement, not on local muscle work. In the B-BAT, intention and purpose are defined by different images and aphorisms. Intention and purpose in movement define the quality of the movement and give clarity to the movement. Internal movements experienced as sensations and emotions are important in the B-BAT. The expression of "one eye in and one eye out" used in the B-BAT means to be in contact with both oneself and external contextual goals/world in movements and actions (Gyllensten et al., 2018).

4.7 Body Awareness and Relationship with Oneself

It has been shown that there is an interaction between increasing body awareness and improving ability to contact with oneself, others and environment.

Therefore, it is important that an individual should train own body awareness regularly. Body awareness is constanly updated sensory information about our ability to use our body and the information constantly provided by the motor system. Increasing body awareness means self-experimentation and self-contact by – internal perspective – which means strengthening the identity of the individual. The training on the ability of body awareness is started by focusing on the body parts that are in contact with the ground while lying on the floor. Patients are encouraged to experience everything as they are, without trying to change or evaluating them in practice (Gyllensten et al., 2018).

4.8 The Movement Quality Model_(MQM)

The phenomenon of movement quality is frequently used in the BAT, in which patients' attention is directed to how the movements are performed under the supervision of a physiotherapist. Movement quality can be defined as the way in which movements are associated with space, time and energy. The different aspects of movements and the quality of movement in connection with the B-BAT were expressed by Skjaerven et al. They focused on the movement quality related to different factors that are four existence dimensions: the physical, physiological, psychological/relational and existential perspectives of movement (Skjaerven et al., 2003; Skjaerven et al., 2008; Skjaerven and Gard, 2018) (Fig. 18.1).

Physical Perspective: It addresses the physical or anatomical body and shows the skeleton, muscles, tendons, ligaments, arteries, nerves, etc. It is associated with a biomechanical perspective and shows a spatial view of human movement. It includes two aspects: 1) Postural stability and 2) Movements characteristics of the path and shape in movement. Postural stability and balance are important prerequisites for the quality of movement at this level. Three basic coordination are parts of this perspective.

Physiological Perspective: It is associated with a physiological perspective that shows the appearance of time in human movements. It includes two aspects: 1) Free breathing and centering; and 2) Flow, elasticity and rhythm characteristics of movement. These qualities depend on muscle tension, balance and free breathing. Free breathing gives fluency to movement; it is like incoming and outgoing waves and is expressed as flow in movement. When flow, elasticity and rhythm are integrated, there will be an aliveness in movements.

Psycho-Social and Cultural Perspective: It is related to the psycho-social and cultural perspective and shows the use of energy. It includes two main aspects: 1) Awareness and 2) Emotional, cognitive, intentional and socio-cultural

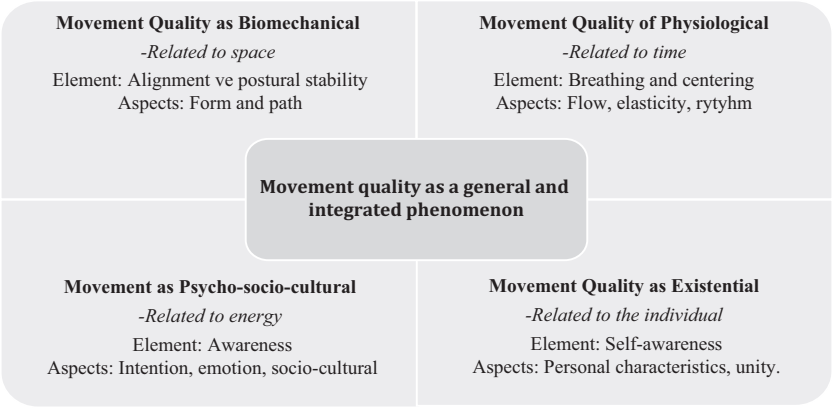

Fig. 18.1: Movement Quality Model (Skjaerven and Gard, 2018)

perspectives. This quality of movement or the expression of movement depends on attention and intention. Awareness is important in movement quality and is a prerequisite. If you are avaliable in your body, this situation will be expressed in movement quality. If you are not available in your body, you will incautiously move by using your automatic pilot.

Existential Perspective: It is associated with an existential perspective, and it also demonstrates personal and wholeness aspects. It includes two aspectss: 1) Self awareness and 2) Personal and integrity perspectives expressed in the movement. This existential dimension focuses on the clarity of the movement and the experience of self-awareness and "self" uniqueness. This existential dimension focuses on clearness of the movement and the experience of self-awareness with "I" uniquenes. It addresses a conscious person who has the experience of being "here and now" as in reflecting oneself. It is important to be in contact with the body and perceive the body as a whole thus a sense of integrity develops.

5 Basic Body Awareness Therapy in Clinical Practice

The B-BAT focuses on the basic movement functions associated with posture, coordination, natural breathing and awareness, which are essential in movement quality, self-expression, interaction with others and in performing daily life movements (Gard, 2005). When doing movements, it is important for the person to direct his attention on both what he/she does and experiences in the movements, and this stimulates awareness and movement performance. B-BAT

consists of stillness and simple exercises in movements. B-BAT movements represent daily movements such as lying, sitting, standing, walking, relational movements and massage (touching). The therapy environment does not require any equipment other than floor, mat and stool. Physiotherapist requests from patients to wear clothing that allows to breathe freely and to move easily in it. Physiotherapist acts as a guide by bringing daily life and needs in the therapy environment. The B-BAT method can be applied both as individual therapy and group exercise. In general, patients perform simple movement exercises together with their physiotherapist. Physiotherapist encourages the patients to perform postural control, balance, comfortable breathing and coordination more appropriately by using both his/her own body and words to guide the patients (Gard, 2005; Skjaerven and Mattson, 2018). This personal experience that is based on body is both verbalized by patients and approved as a reflection tool by physiotherapists (Hedlund and Gyllensten, 2010). Brief reflective speeches provide support to participants for learning and developing an insight about their own movement experiences (Roxendal, 1985).

In the application of body awareness therapy method, each therapy program consists of three parts:

- Relaxation: Body scan is passive relaxation or journey in the body. In lying exercises include breathing and sound working, opening-closing exercises, stretching and relaxation.
- Sitting and standing exercises include grounding, the relationship between the balance line and the body, flow and stability in daily movements.
- Massage: Massage applied on clothes involves bodily contact and affects the massage receivers and who apply massage. In terms of holistic approach, massage is not touching a body or tissue, but touching a person. Such a perspective helps to integrate, not distribute individuals who receive massage. In group practices, participants apply message to each other.

6 Observation and Evaluation in Body Awareness Therapy

Some reliable and valid assessment tools have been developed to assess body awareness and movement quality. Physiotherapeutic assessment focusing on the movement quality has been reported as a useful measure to understand the clinical needs of the individual and to develop an effective rehabilitation program (Bergström et al., 2014). Body Awareness Scale (BAS) and Body Awareness Rating Scale (BARS) are examples of body awareness assessment tools used in evidence-based studies.

6.1 Body Awareness Scale Movement Quality and Experience (BAS MQ-E)

The BAS MQ-E was inspired by the Body Awareness Scale (BAS), BAS-Health (Roxendal, 1985) and the international function classification (ICF). The BAS MQ-E consists of movement test, a short questionnaire and a short interview form. Movement test is structured and it includes daily movements. Movement test are assessed for balance, stability, coordination, breathing and ability of relationship with one's own body and others. The questionnaire includes 9 questions about pain, muscle tension symptoms, ability to do daily activities, exercise habits, body experiences such as appearance and relationship with breathing. Quality interviews focus on patients' experiences of stability, movement coordination, breathing, the ability of standing up and being present (Probst, 2018).

6.2 Body Awareness Rating Scale-Movement Quality and Experience (BARS-MQE)

It is originated from psychiatry and was most recently developed by Skjaerven and Sundal. The BARS-MQE consists of two parts: 1) Evaluating of patients' movement quality by physiotherapists and 2) A phenomenological interview on the patient's explanations during the movement experience (Probst, 2018).

7 Evidence-Based Studies Evaluating Body Awareness Therapy

The B-BAT has been found to be useful in various diseases such as long-lasting musculoskeletal pain, fibromyalgia, rheumatic diseases, schizophrenia, eating disorders, personality disorder and irritable bowel syndrome.

7.1 The BAT in Chronic Pain and Musculoskeletal Disorders

The principles of movement are increasingly applied in somatic health care, including the care of patients with rheumatology and hip arthrosis. Compared to traditional physiotherapy in patients with chronic musculoskeletal system disorders, the BAT with cognitive and relaxation therapy have a positive effect on quality of life (Grahn et al., 1998); The BAT and Feldenkrais method have been reported to be more effective (Malmgren-Olsson et al., 2001), particularly in terms of increased general health and improved movement harmony (Kendall et al., 2001; Mannerkorpi and Arndorw, 2004). In the studies on fibromyalgia, the patients expressed positive experiences in the process of learning. Health-related life quality and treatment efficacy have increased with the discovery of new movement strategies (Mannerkorpi and Gard, 2003; Gard, 2005).

Improvement in movement quality and decrease in vegetative disorder experience were observed with the BAT (Gustafsson et al., 2004). It has been reported that the BAT may be an effective intervention for pain, movement quality and anxiety in fibromyalgia patients followed up at 12 and 24 weeks (Bravo et al., 2018). In a randomized clinical trial, the BAT compared to exercise therapy provided more recovery on physical function in chronic Whiplash Syndrome (Seferiadis et al., 2016). In chronic rheumatic diseases, touching the body with the B-BAT can help patients to discover and develop their own resources for a more functional movement quality in daily life (Olsen and Skjaerven, 2016); it also strengthens physical functions and coping strategies (Sundén et al., 2013); the planning of patient education after the therapy may provide permanent benefits that will positively affect daily life functions (Strand et al., 2016; Olsen et al., 2017).

7.2 The BAT in Mental Health and Psychiatric Patients

The BAT was reported to be effective in patients with schizophrenia, somatoform, mood and personality disorder in short-term and long-term. A first randomized, prospective study on the BAT showed significant improvement in movement quality, body image, anxiety and interest in the patients with schizophrenia (Roxendal, 1985). Another randomized controlled trial conducted with the psychiatric patients, the B-BAT showed improvements in psychiatric symptoms, body and movement attitudes (Gyllensten et al., 2003a). With BAT, positive results were obtained in personal participation, awareness and use of body signs and movement control. As the patients' awareness of body signs develop and their bodies strengthened in movement, their self-confidence increased (Gyllensten et al., 2003b). It was concluded that BBAT the regulation of emotions, body awareness and self-esteem, clearer thinking and social abilities were affected, moreover BBAT was also an effective intervention in long-term psychiatric care in the patients with somatic symptoms (Gyllensten et al., 2009; Hedlund and Gyllensten, 2010). In a study conducted with the patients with moderate psychiatric disorders and pain, it was shown that patients experienced reintegration of their bodies and created new meanings for their bodies (Johnsen and Råheim, 2010).

The BBA group therapy as the main component in the treatment program of the patients with personality disorders was showed in two studies. It was concluded that the BAT promotes psychological growth and personal development via "harmonizing-accommodating" (Skatteboe et al., 1989). Other study was showed that the patients with personality disorders had more contact with both their emotions and their physical senses; they also focused more attention. The

major change in function and symptoms was found as significantly high (Leirvåg et al., 2010). In the patients with irritable bowel syndrome, the BAT was shown to both reduced somatic complaints and psychological symptoms and normalized tension; it was also showed that improved body awareness had a positive effect on the ability to take care of their own resources (Eriksson et al., 2002; Eriksson et al., 2007).

The BAT was shown to have a positive effect on depression, anxiety and post-traumatic stress disorder (Danielsson and Rosberg, 2015; Madsen et al., 2016). It was showed that the patients with major depression were more aware of their bodies as a means of attachment to life and their inner senses and emotions were more regulated. Depression-related symptoms were decreased by improving motivation towards behavior change (Danielsson and Rosberg, 2015). Traumatized refugees have been positively affected by B-BAT; they largely experienced the movements to transfer in daily life (Madsen et al., 2016). In another study showed that Body Awareness Scale Movement Quality Evaluation (BAS MQ-E) is an applicable and benefical measurement tool of the movement function, somatic complaints and subjective body experiences in the patients with post-traumatic stress disorder (Nyboe et al., 2017).

The results in patients with eating disorders related to body and body image have special importance. The studies showed that the B-BAT is beneficial in providing a realistic body image with positive effects on distorted body image (Wallin et al., 2000; Thörnborg and Mattson, 2010; Catalon-Matamoros et al., 2011). It was emphasized that family therapy and the BAT have a positive effect on impaired body perception in young adolescents with eating disorders (Wallin et al., 2000); In the individuals with eating disorders, Basic Body Awareness can be a therapeutic tool in establishing a realistic body image (Thönborg and Mattson, 2010). Moreover it can improve eating attitude and thus it can help to reduce the severity of eating disorders (Catalan-Matamoros et al., 2011). The results showed that the BAT is useful in creating a more realistic body image.

8 The Training of Physiotherapist in Body Awareness Therapy

Becoming a certificated body awareness therapist requires a five-stage training program – the Swedish example – (www.ibk.nu). The program consists of theoretical, practical and clinical training by taking into account of the treatment experience and process of physiotherapist. Students do their homeworks by attending in a one week training session for 5 times. The first two levels focus on developing body awareness and understanding the process with an internal perspective. In working with patients with the theoretical framework and historical

development of body awareness also focus on how goals and motivational aspects will be verbailzed. At the third level, students are trained on the body awareness scale. They write the report about on the role of the therapist in the BAT and the process of treating patients as individual and group with the BAT method in the fourth and fifth level training. Students also read about 2000 pages of literature related to the subject which is seriously evaluated from a clinical perspective. All reports are evaluated by a teacher who approves and gives feedback (Hedlund and Gyllensten, 2010). Training on the B-BAT method is given as a post-graduate certificate program at institutes or universities in different countries. After this training, students become certificated specialist therapists of the B-BAT method. While other professionals such as psychologists, social workers are accepted to the first level training, five levels of training are only for graduate physiotherapists. The training of a therapist consists of 25 weeks during 4–5 years. In the last 30 years, quality improvement, professional development and research have been started by the International Association of Teachers in Basic Body Awareness Therapy – IATBBAT (Skjaerven and Mattson, 2018). The Teachers group comes together by organizing annual seminars to study on method development and quality issues. Nowadays, Sweden, Norway, Denmark, Finland, Estonia, Iceland, the Faroe Islands, England, Holland, Switzerland, Austria, Spain and Turkey constitute teachers network (http://www.iatbbat.com).

9 Conclusion

Basic Body Awareness Therapy (B-BAT) is a treatment method that is used in physiotherapy and rehabilitation to provide physical and emotional balance. In the B-BAT, western therapeutic methods and daily movements inspired from Tai Chi are used to improve balance, stability and movement quality. The method includes biomedical, physiological, psycho-socio-cultural and existential perspectives. The B-BAT is used in mental healthcare and psychiatric physiotherapy, pain rehabilitation, primary health care, preventive health services and the protection and promotion of health. There is a need for clinical evaluation, research and clinical review besides to the opinions patients and the society about B-BAT.

References

Bergström, M., Ejelöv, M., Mattsson, M. & Stalnacke, B.M. (2014). One-Year Follow-Up of Body Awareness and Perceived Health after Participating in a Multimodal Pain Rehabilitation Programme – A Pilot Study, *European Journal of Physiotherapy*, 16(4), 246–254.

Bravo, C., Skjaerven, L.H., Espart, A., Sein-Echaluce, L.G. & Catalan-Matamoros, D. (2018). Basic Body Awareness Therapy in Patients Suffering from Fibromyalgia: A Randomized Clinical Trial, *Physotherapy Theory and Practice*, 3, 1–11.

Catalon-Matamoros, D., Skjaveren, L.H., Labajos-Manzanares, M.T., Arboleas, M.S. & Sánchez-Guerrero, E. (2011). A Pilot Study on the Effect of Basic Body Awareness Therapy in Patients with Eating Disorders: A Randomized Controlled Trial, *Clinical Rehabilitation*, 25, 617–626.

Danielsson, L. & Rosberg, S. (2015). Opening Toward Life: Experiences of Basic Body Awareness Therapy in Persons with Major Depression, *International Journal of Qualitative Studies in Health and Well-being*, 7, 10.

Eriksson, E., Nordwall, V., Kurlberg, G., Rydholm, H. & Eriksson, A. (2002). Effects of Body Awareness Therapy in Patients with Irritable Bowel Syndrome. *Advances in Physiotherapy*, 4, 125–135.

Eriksson, E.M., Moller, I.E., Soderberg, R.H., Eriksson, H.T. & Kurlberg, G.K. (2007). Body Awareness Therapy: A New Strategy for Relief of Symptoms in Irritable Bowel Syndrome Patients. *World Journal of Gastroenterology*, 13, 3206–3214.

Gard, G. (2005). Body Awareness Therapy for Patients with Fibromyalgia and Chronic Pain. *Disability and Rehabilitation*, 27, 725–728.

Grahn, B., Ekdahl, C. & Borgqvist, L. (1998). Effects of a Multidisciplinary Rehabilitation Programme on Health-Related Quality of Life in Patients with Prolonged Musculoskeletal Disorders; A 6-Month Follow-Up of a Prospective Controlled Study, *Disability and Rehabilitation*, 20, 285–297.

Gustafsson, M., Ekholm, J. & Ohman, A. (2004). From Shame to Respect: Musculoskeletal Pain Patients' Experience of a Rehabilitation Programme, A Quality Study, *Journal of Rehabilitation Medicine*, 36(3), 97–103.

Gyllensten, A.L. (2001). *Basic Body Awareness Therapy*. Thesis. Lund University, Department of Physiotherapy, Sweden.

Gyllensten, A.L., Ekdahl, C. & Hansson, L. (1999). Validity of The Body Awareness Scale-Health (BAS-H), *Scandinavian Journal of Caring Sciences*, 13(4), 217–226.

Gyllensten, A.L., Ekdahl, C. & Hansson, L. (2009). Long-Term Effectiveness of Basic Body Awareness Therapy in Psychiatric Outpatient Care. A Randomized Controlled Study, *Advances in Physiotherapy*, 11(1), 2–12.

Gyllensten, A.L., Hansson, L. & Ekdahl, C. (2003a). Outcome of Basic Body Awareness Therapy. A Randomized Controlled Study of Patients in Psychiatric Outpatient Care, *Advances in Physiotherapy*, 5, 179–190.

Gyllensten, A.L., Hansson, L. & Ekdahl, C. (2003b). Patient Experiences of Basic Body Awareness Therapy and the Relationship with the Physiotherapist, *Journal of Bodywork and Movement Therapies*, 7(3), 173–183.

Gyllensten, A.L., Skär, L., Miller, M. & Gard, G. (2010). Embodied Identity – A Deeper Understanding of Body Awareness, *Physiotherapy Theory and Practice*, 26(7), 439–446.

Gyllensten, A.L., Skoglund, K. & Wulf, I. (2018). *Basic Body Awareness Therapy. Embodied Identity*. Vulkan, Stockholm.

Hedlund, L. & Gyllensten, A.L. (2010). The Experiences of Basic Body Awareness Therapy in Patients with Schizophrenia, *Journal of Bodywork and Movement Therapies*, 14(3), 245–254.

http://www.iatbbat.com, (accessed on 23.05.2019).

http://www.ibk.nu/, (accessed on 23.05.2019).

Johnsen, R.W. & Råheim, M. (2010). Feeling More in Balance and Grounded in One's Own Body and Life. Focus Group Interviews on Experiences with Basic Body Awareness Therapy in Psychiatric Healthcare, *Advances in Physiotherapy*, 12(3), 166–174.

Kendall, S.A., Brolin-Magnusson, K., Sören, B., Gerdle, B. & Henriksson, K.G. (2001). A Pilot Study of Body Awareness Programs in the Treatment of Fibromyalgia Syndrome, *Arthritis Care & Research*, 15, 304–311.

Leirvåg, H., Pederson, G. & Karterud, S. (2010). Long-Term Continuation Treatment after Short-Term Day Treatment of Female Patients with Severe Personality Disorders: Body Awareness Group Therapy Versus Psychodynamic Group Therapy, *Nordic Journal of Psychiatry*, 64(3), 153–157.

Madsen, T.S., Carlsson, J., Nordbrandt, M. & Jensen, J.A. (2016). Refugee Experiences of Individual Basic Body Awareness Therapy and Level of Transference into Life. An Interview Study, *Journal of Bodywork and Movement Therapy*, 20(2), 243–251.

Malmgren-Olsson, E.B., Armelius, B.A. & Armelius, K. (2001). A Comparative Outcome Study of Body Awareness Therapy, Feldenkrais, and Conventional Physiotherapy for Patients with Nonspecific Musculoskeletal Disorders: Changes in Psychological Symptoms, Pain, and Self-Image, *Physiotherapy Theory and Practice*, 17, 77–95.

Mannerkorpi, K. & Arndorw, M. (2004). Efficiancy and Feasibility of Combination of Body Awareness Therapy and Qigong in Patients with Fibromyalgia: A Pilot Study, *Journal of Rehabilitation Medicine*, 36(6), 279–281.

Mannerkorpi, K. & Gard, G. (2003). Physiotherapy Group Treatment for Patients with Fibromyalgia – An Embodied Learning Process, *Disability and Rehabilitation*, 25, 1372–1380.

Nyboe, L., Bentholm, A. & Gyllensten, A.L. (2017). Bodily Symptoms in Patients with Post Traumatic Stress Disorder: A Comparative Study of Traumatized Refugees, Danish War Veterans, and Healthy Controls, *Journal of Bodywork & Movement Therapies*, 21, 523–527.

Olsen, A.L. & Skjaerven, L.H. (2016). Patients Suffering from Rheumatic Disease Describing Own Experiences From Participating in Basic Body Awareness Group Therapy: A Qualitative Pilot Study, *Physiotherapy Theory and Practice*, 32(2), 98–106.

Olsen, A.L., Strand, L.I., Skjaerven, L.H., Sundal, M.A. & Magnussen, L.H. (2017). Patient Education and Basic Body Awareness Therapy in Hip Osteoarthritis – A Qualitative Study of Patients' Movement Learning Experiences, *Disability and Rehabilitation*, 39(16), 1631–1638.

Probst, M. (2018). Observation and Evaluation Tools within Physiotherapy in Mental Health, (Eds. Probst, M., Skjaerven, L.H.), *Physiotherapy in Mental Health and Psychiatry. A Scientific and Clinical Based Approaches*, (98–119), Elsevier. Poland.

Roxendal, G. (1985). *Body Awareness Therapy and the Body Awareness Scale, Treatment and Evaluation in Psychiatric Physiotherapy* (Doctoral degree), University of Göteborg. Department of Psychiatry, Göteborg.

Seferiadis, A., Ohlin, P., Billhult, A. & Gunnarsson, R. (2016). Basic Body Awareness Therapy or Exercise Therapy for the Treatment of Chronic Whiplash Associated Disorders: A Randomized Comparative Clinical Trial, *Journal Disability and Rehabilitation*, 30, 442–451.

Skatteboe, U.B., Friis, S., Kvamsdal, H.M. & Vaglum, P. (1989). Body Awareness Group Therapy for Patients with Personality Disorders, *Psychoterapy Psychosomatics*, 51(1), 11–17.

*S*kjaerven, L.H. & Gard, G. (2018). Perspectives on Human movement, the Phenomenon of Movement Quality and How to Promote Movement Quality through Movement Awareness as Physiotherapy in Mental Health, (Eds. Probst, M., Skjaerven, L.H.), Ph*ysiotherapy in Mental Health and Psychiatry. A Scientific and Clinical Based Approaches*, (23–31), Elsevier. Poland.

Skjaerven, L.H. & Mattson, M. (2018). Basic Body Awareness Therapy (BBAT): A Movement Awareness Learning Modality in Physiotherapy, Promoting Movement Quality, (Eds. Probst, M., Skjaerven, L.H.), *Physiotherapy in Mental Health and Psychiatry. A Scientific and Clinical Based Approaches*, (59–68), Elsevier. Poland.

Skjaerven, L.H., Gard, G. & Kristoffersen, K. (2003). Basic Elements and Dimensions to the Phenomenon of Quality of Movement – A Case Study, *Journal of Bodywork and Movement Therapies*, 7(4), 251–260.

Skjaerven, L.H., Kristoffersen, K. & Gard, G. (2008). An Eye for Movement Quality: A Phenomenological Study of Movement Quality Reflecting a Group of Physiotherapists' Understanding of the Phenomenon, *Physiotherapy Theory and Practice*, 24(1), 13–27.

Skjaerven, L.H., Kristoffersen, K. & Gard, G. (2010). How Can Movement Quality Be Promoted in Clinical Practice? A Phenomenological Study of Physical Therapist Experts, *Physical Therapy*, 90, 1479–1492.

Strand, L. I., Olsen, A.L., Nygard, H., Furnes, O., Magnussen, L.H., Lygren, H. & et al. (2016). Basic Body Awareness Therapy and Patient Education in Hip Osteoarthritis: A Multiple Case Study, *European Journal of Physiotherapy*, 18(2), 116–125.

Sundén, A., Ekdahl, C., Magnusson, S.P., Johnsson, B., & Gyllensten, A.L. (2013). Physical Function and Self-efficacy – Important Aspects of Health-Related Quality of Life in Individuals with Hip Osteoarthritis, *European Journal of Physiotherapy*, 15, 151–159.

Thörnborg, U. & Mattson, M. (2010). Rating Body Awareness in Person Suffering from Eating Disorders – A Cross Sectional Study, *Advance in Physiotherapy*, 12(1), 24–34.

Wallin, U., Kronvall, P. & Majewski, M.L. (2000). Body Awareness Therapy in Teenage Anorexia Nervosa: Outcome after Two Years, *European Eating Disorders Review*, 8, 19–30.