

Effectiveness of Organic horticulture training for young people with mental disorders

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Abstract

The social and therapeutic horticultural programmes within health facilities, social services or vocational training, aim to contribute to the clients or trainees wellbeing and improvement of their physical, mental and emotional conditions. The present study aimed to provide an insight on the benefits of the Training Course in Organic Farming and Gardening, designed for young people over 16 years old with mental disorders, since 1991. The course takes place in the Professional Training Centre, of the Association of Parents and Friends of Children with Disabilities, in Barcelos, Portugal. During a period of three months three questionnaires were performed to the trainees attending the course and the trainees' families were interviewed. The results indicate that horticulture, when used in a group-based setting, has a direct and positive effect on life satisfaction, wellbeing and self-confidence, which are all components of quality of life.

Introduction

Social Agriculture is an umbrella for many different forms of agricultural and horticultural activities that can be performed in commercial farms (social farming), within health facilities, social services or vocational training and in other facilities in the urban context (urban agriculture). The main transversal objective is to contribute to the wellbeing and social inclusion of disadvantaged people, through the activities and the promotion of solidarity and mutual aid. The challenge of a productive activity and contact with nature, for people with physical, mental, psychological, social or economic difficulties, can improve health, facilitate learning and knowledge, increase self-esteem and, consequently, participation in social life (Dessein and Bock, 2010).

The social and therapeutic horticulture (STH) falls into urban gardening programs; environmental education; support for the elderly, disabled or health care dependents; psychosocial rehabilitation and social inclusion. Provides opportunities for participation and socialization, senses stimulation, concentration and creativity and aims to contribute to the wellbeing and improvement of quality of life. The STH have different forms of organization, contributions and goals to achieve (Thrive, 2009), as follows: (i) Therapeutic horticulture (occupational) - through active or passive participation, consists of activities/experiences with plants, gardening and horticultural practices (indoor and outdoor), including alternative education programmes, with the aim of contributing to the clients wellbeing and health improvement; (ii) Horticultural therapy - in clinical practice in health facilities or social service, integrates programs aiming to achieve specific goals other than the horticultural activity itself and requires a trained therapist; (iii) Social horticulture (community) - relates to community gardens, gardening programs, independent living, health prevention and aims leisure and social interaction and the horticultural activities; (iv) Professional training in horticulture - learning and training activities with the goal of integration into the labour market, especially for people with physical and mental disabilities who participate according their capabilities. The present study is contextualized in the last goal and the objective is to provide an insight on the benefits of an organic horticulture professional training course for young people with mental health disorders.

Materials and methods

The Training Course in Organic Farming and Gardening (TCOFG) started in 1991, in the Professional Training Centre of the Association of Parents and Friends of Children with Disabilities (APFCD), in Barcelos, Portugal, which is certified for organic production since 2006 (Sativa). The institution has more three training courses: pottery, table service and laundry. The target trainees of the APFCD are young person's

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older than 16 years with intellectual disabilities or with a disability characterized by significant limitations in intellectual functioning and in adaptive behaviour. The design of the courses is adapted and adjusted to the personal and social needs of the target trainees. Firstly it is established an individual development plan involving the staff, the client and his/her family. This plan includes a synthesis of the initial situation (after a skills assessment), the perspectives of the client, the suitable goals, objectives, methodologies and training skills, in addition to the content that meet the specific training requirements. The TCOFG is organized into three training steps: the basic (600 h), the technological (1100 h) and the practical training (1200 h), the last taking place in companies. The development of the activities intend to train professionals who perform, under supervision, tasks in the organic production of vegetables and fruits and tasks related to the building and maintenance of gardens and green areas, with plain awareness of the environmental protection rules, hygiene and safety at work.

A group of 23 trainees between 16 and 24 years old entered the APFCD in 2011/12. After a trial period of a few days in the activities of the four training courses, the trainees were directed to one, namely, 8 started the TCOFG (1 female and 7 males) and 5 trainees went to each of the other three training courses. Despite the multiple assessment methods and variables in social studies, there is a common variable broadly defined as the perception of the level of satisfaction of clients or trainees, assessed from responses in semi-structured interviews, questionnaires and focus groups (Relf, 2012). Here, during a period of three months (March to May), three questionnaires were performed to the trainees attending the TCOFG and the first questionnaire was also carried out to the trainees of the other courses. The trainees' families were interviewed in May in order to assess their sons' progress at home and the main effects of the TCOFG on them. The semi-structured interviews were designed and conducted with the support of the psychologists of the institution, so that an accessible language and confidence of the parents could be achieved. One family declined to answer. The first questionnaire was intended to understand the motivation of the choice for the training course and the second aimed to find out the relationship of young people to the horticultural practice and what is most important when they are working in the field. The third questionnaire was designed to understand the behaviour changes that occurred with the trainees since they start the course, and if organic horticulture and gardening will be part of their lives in the future. Here, a selection of questions was chosen according their relevance for the aim of the study.

Results

1 - Comments of the trainees who have chosen other training course

Pottery trainees: farming is an activity that gives little money (2), it is very tiring (2), it is boring (1). Table service trainees: farming is boring (3), it is very tiring (1), does not have the required skills (1); Laundry trainees: farming is very tiring (4), does not have the required skills (1).

2 - Motivations of the trainees to select the TCOFG

a) Main reasons to choose the course

Always enjoyed field work (3); enjoy plants, trees and flowers, to care them and to see how they grow (3); enjoy to touch the soil (1); for no apparent reason (1).

b) Familiarity with horticultural activities

Yes, within family farming (5); Yes, within home garden (2); No, not familiar (1).

3 - Personal feelings about horticultural activities

a) The horticulture activities are complex and tiring?

No (3), the activities are easy as they are familiar with them since they were very young; Yes (3), because when they are performing certain field activities they feel tired and breathless; With no opinion (2), some activities are difficult and others are easy.

b) Missing horticultural activities during the weekend?

Yes (4), they miss the daily routine and look for field work; No (3), because at home they usually help parents to work in the field (2) and because the weekend is to rest and not to work (1); With no opinion (1), because likes to be at home doing nothing, although sometimes miss the friends and the things they do together during field work.

4 - Comprehension about organic horticultural production

Organic production (OP) is healthy because it has no chemicals, although there are many people who do not know about this production system and therefore only eat conventional food (1); OP is good for the environment and the food has higher quality, but mainly elder people do not know about it (1); OP is to plant vegetables and flowers so that the soil is well preserved (1); With no opinion (5), as it is a very difficult question.

5 - Effects induced by the horticultural activities

a) Emotional feelings (each trainee selected two feelings)

Freedom (6), good mood (5), happiness/joy (4), sadness (1). Some reasons for joy feeling were the outdoors work environment, the company of friends and the variety of tasks that they learn/perform throughout the day.

b) Health benefits

- Yes there are health benefits (8) since the activities are being practiced outdoors they provide wellbeing through a feeling of comfort and happiness.

- When working in the field they feel free from fears and forget their own problems (6), because they are focused while doing what they like; other, in some days when feels upset or bored, cannot focus and so everything will go wrong (1); with no opinion (1).

6 - Effects induced by the course attendance

a) Changes in behaviour

Yes (6), on a personal (4), social (1) and family level (1), namely, talk more frequently, lost laziness, better organized, better related with colleagues, help colleagues with more difficulties, more involved in household tasks; No (2), there were no behaviour changes since horticulture does not cause this type of changes.

b) Which changes began to emerge

Become more responsible (2), more confidence in themselves (2), more sociable (2), lost shyness (1), nothing has changed (1).

7 - Plans to work in the horticulture sector in the future

Yes (5), they enjoy horticulture since they were younger; No opinion (2), admit they are still young to be sure about their future; No (1), plan to have another profession.

8 - Interviews to the trainees' parents

a) Comments on sons/daughter personal behaviour since they started the TCOFG:

greater willingness to interact with the family (6); increased autonomy in their daily tasks (6); more friends/more sociable (5); more alive (4); more helpful in domestic tasks (4); increased initiative to help at home (3); more confident/responsible (3); cheerful sense of humour (2); more calm and less angry (1); greater concern with their personal image (1); no significant differences (1).

b) Reasons why the course may induce to the professional future of their sons/daughter: they demonstrate motivation and commitment for horticultural activities, which is the most important for their personal development (5); they are happy with the outdoors environment (5); they enjoy the course activities (4); they have skills and willingness (4); they are learning and getting experience (2).

Discussion

The effects described here have been reported by other authors in different programs of social and therapeutic horticulture. For example, the use of horticultural therapy in a residential setting for people with mental illness, showed benefits in terms of promoting social interaction, providing opportunities for the development of creativity and self-expression, and increasing self-esteem and self-confidence (Parker, 2004). Horticulture therapy is associated with a diversity of physical, emotional, cognitive and social benefits, with results in the reduction of stress and symptoms of depression such as sadness and negative mood (Ulrich et al. 1991; Perrins-Margalis et al. 2000), showing a mutual relationship between people and plants. Professional training is one of the key supports of the process of socio-professional insertion. Furthermore, the practice of horticultural activities gave these TCOFG young trainees the opportunity to gain more responsibility, self-confidence, self-esteem, freedom, competences and friends. It was a way to forget their fears, problems and difficulties, helping them to assume their own life and independence and made their families more proud and confident on their sons' future. Results indicate that horticulture, when used in a group-based setting, has a direct and positive effect on life satisfaction, wellbeing and self-confidence, which are all components of quality of life.

References

- Dessein J & Bock BB (2010): The economics of Green Care in Agriculture. COST 866 - Green Care in Agriculture. Loughborough University, 94 p.
- Parker S (2004): Grass roots healing. *Mental Health Practice* 7:8, 20-22.
- Perrins-Margalis NM, Rugletic J, Schepis NM, Stepanski HR & Walsh MA (2000): The immediate effects of a group-based horticulture experience on the quality of life of persons with chronic mental illness. *Occupational Therapy in Mental Health* 16, 15-32.
- Relf D (2012): Advancing HT through research and publishing. *Acta Horticulturae* 954, 13-20.
- Thrive (2009): Using gardening to change lives - A guide to who we are, what we do, how we do it. Thrive, UK, 32 p.
- Ulrich RS, Simons RF, Losito BD, Fiorito E, Miles MA & Zelson M (1991): Stress recovery during exposure to natural and urban environments. *Journal of Environ. Psychology* 11, 201-230.

