



Seeding competences and harvesting work inclusiveness for autistic people

INFUSE TRAINING COURSE

Manual Guide for professionals on job placement
training paths for autistic people



JOB PLACEMENT: SUPPORT TOOLS AND SOFT SKILLS

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JOB PLACEMENT: INDUCTION SUPPORTS AND SOFT SKILLS

Introduction

An important and recent review [Burgess S. et al., 2014], analysing the development of the employment outcomes of a group of 34,501 young adults on the autism spectrum, followed by state vocational rehabilitation services, from 2002 to 2011 in various Western countries, showed that the group of young autistic adults was able to obtain employment more easily than the other groups of young adults with different disabilities, precisely because of the presence of strengths, the so-called islands of ability typical of individuals on the autism spectrum, such as greater attention to detail. However, compared to the other groups with different types of disabilities, the group of young autistic adults worked fewer hours, obtained lower wages and incurred higher employment costs. The low success in obtaining jobs that guarantee a minimum wage seems to be directly related to the relatively low likelihood of this group to participate in post-secondary education or training programmes that allow for more competitive employment outcomes. There is a need for educational support actions aimed at both persons on the autism spectrum and those who interact with them during training and employment. In fact, studies on the neuro-psychological functioning of persons on the autism spectrum have shown that they benefit greatly from educational and vocational programmes which take into consideration their needs and abilities. Therefore, it is necessary for social inclusion efforts to abandon the direction of 'normalising' the autistic person, which has proved to be unsuccessful. Instead, favouring the personal growth and maturity of the individual is better reached by encouraging qualified and specific skills development paths that truly enable autistic persons to achieve a degree of personal, social and occupational autonomy through effective skills learning methods.

Within the INFUSE project, participants were divided into three groups according to rehabilitation needs.

Group 1 consists of end-users with maintenance rehabilitation needs (e.g. communication, motor and praxic skills). They will be educated in the ability to adapt to the environment and improve socialisation and autonomy skills and leisure time management.

Group 2 consists of adults on the autism spectrum over the age of 15 who have not yet reached their full enabling potential due to their age or characteristics. Their educational

programme aims to develop their potential in communication, autonomy, behaviour management, work skills and leisure activities. The INFUSE project will help them to develop these effective work skills, supporting them in a future entry into the labour market through sheltered employment or placement in work cooperatives.

Group 3 is composed of persons diagnosed with level 1 autism and over 16 years of age, who have completed the outpatient pathway. Activities have been established according to their needs and include: psychological support, occupational activities to develop work skills, school, university orientation and more.

It follows that training dedicated to users will be customised and designed for each group, specifically evaluated on a case-by-case basis, according to the personal characteristics of each participant.

The following manual, in the first part, will introduce the world of the autism spectrum and the specific needs of job placement with the aim of providing the skills to support autistic people in accessing the world of work, understanding the needs, strategies and methods to be used to support them in preparing for, searching for and acquiring the basic and transversal social skills useful for obtaining a job. Both manuals will be used in the training, i.e. a frontal teaching mode and a more dynamic and interactive mode through exercises and role playing.

1. Introduction to autism and the needs of autistic people with regards to employment.

Autism is a neurodevelopmental condition that manifests early, usually in the first three years of life, with difficulties in social interaction and communication, associated with repetitive behaviour and impairments in important areas of life such as social skills. Autism is often associated with other disabilities (such as, for example, intellectual disability) and their clinical manifestations can vary widely from mild to severe impairments in the degree of autonomy and social functioning. The profile of perceptual, sensory, attention, cognitive and memorising characteristics presents atypical developmental pathways, currently referred to as 'neurodiversity'. Within this continuum, however, it is necessary to specify levels of severity, ranging from a level 1 where minimal support is needed, to a level 2 where

substantial support is needed, to a level 3 where a very substantial level of support is needed. The diagnosis of autism also requires specifying the presence or absence of intellectual disabilities or language disorders, as well as other associated medical or genetic conditions, in order to have a complete description of the individual's condition [DSM-5: 2013].

According to the DSM-5, the basic manifestations of the autism spectrum are: 1) "persistent deficits in social communication in multiple contexts"; 2) "restricted and repetitive patterns of behaviour, interests or activities". 3) "Symptoms must be present in childhood, but may only fully manifest when social demands exceed limited abilities." 4) "The symptoms as a whole limit and impair daily functioning."

1.1. Job placement

Autism is one of the most common neurodevelopmental conditions. People on the autism spectrum often have difficulties at school, which are reflected in their personal development, leading to school failure or dropping out and, consequently, unemployment in adulthood. In fact, today only 15% of people on the autism spectrum have a full-time or part-time job, compared to 31% of people with other disabilities, although 61% of them say they are willing to work [National Autistic Society].

In Italy, this statistic drops dramatically to 10% (Censis). The difficulties arise not only from the inadequacy of the legislative framework, but also from the absence of support services specialised in the integration of the disabled and, in particular, of persons on the autism spectrum.

Accessing employment for people on the autism spectrum is possible, including for those with higher support needs. Worldwide, the main experiences of work placement for autistic persons in companies or organisations only concern autistic people with lesser support needs (NAS, Specialisterne, etc.), often with adapted workstations. The Italian experience shows, however, that even in cases of autistic people with higher support needs it is possible to propose inclusion through workshops in social enterprises, provided that they are organised not as therapeutic clinics for work placements, but as real workplaces, with appropriate employment and entrepreneurial management of the activities.

It is therefore important to advise and direct autistic people towards a wide range of work such as data entry, quality control, stocking shelves, working in the library, cleaning mail,

etc., which are all jobs that require good visual attention skills. At the same time, educational support should be implemented and aimed both at people on the autism spectrum and at those who interact with them during training and job placement.

In conclusion, although the data currently available confirms the difficulty of finding job placements for young adults on the autism spectrum, the fact remains that a truly inclusive society should strive to remove the social, cultural and economic obstacles that prevent the autistic community from fully showing their potential and growth through work, a fundamental element in improving the quality of life of any person.

This creates the need to support autistic adults through innovative educational approaches that improve the identification and screening of skills and the design of customised pathways for accessibility to work and social inclusion. The INFUSE project aims to develop effective orientation and motivation strategies for the implementation of an innovative best practice for a job placement pathway in the agricultural sector for adults on the autism spectrum.

2. Basic social and soft skills for employment

2.1. Basic social skills

One of the main characteristics of autism is a difficulty with reading and responding to social cues and understanding certain social situations. Many adults on the autism spectrum require specific support with regards to social skills when interacting with family, friends, colleagues and society at large. Autistic people lack the implicit understanding of social skills and rules: he/she has to learn on a cognitive level the elementary components involved in social interaction, which is why it may be useful to propose situations that help him/her experiment and learn the skills and rules necessary to enter into positive relationships with others.

Social skills are defined as a set of behaviours. In them, habits, emotions and thoughts are integrated. They influence the communication between people. They also promote the creation of a state of well-being. This is possible both on a personal and community level. It can also be defined as a set of rules or guidelines with the function of helping people establish respectful relationships with others. They maintain a healthy balance in interpersonal relationships.

Social Skill Training (SST) is a set of strategies that help people on the autism spectrum better understand social interactions and interact with others. Social skill training (SST) refers to a

wide range of interventions used to help an individual understand and improve social skills. Social skills training utilises the principles of social learning theory. Through this intervention, the following basic social skills are addressed:

- The greeting
- Listening
- Starting a conversation
- Keep the conversation alive with the use of questions
- Concluding a conversation
- Adhering to the theme proposed by another person
- Recognition of emotions.

Each session consists of three moments: theory, in which the skill is explained, role play and/or other SST-specific methodologies, and the break, i.e. a small snack that is also used as positive reinforcement, a source of gratification.

Social skills are one of those skills that are necessary and required in all types of jobs and situations, and are now valued and considered important within the labour market, regardless of the position sought.

We will then explore how these skills develop and translate within the dynamics and environment of work.

2.2. Transversal competences

In many companies, when selecting candidates and evaluating employees, so-called soft skills or transversal competences are assessed in addition to the technical skills and knowledge included in the CV.

These are 'attitudinal characteristics' that make an employee - whatever his or her role may be - a good resource for any company and as such must be cultivated and developed day by day.

1. **Relational skills.** No employee is an island: you have to know how to interact, how to listen, how to make yourself available, how to ask if you don't understand something,

how to communicate if something is wrong, how to handle possible conflicts and how to put aside your personal experiences to work well with others and do your job well.

2. **Teamwork.** Working in a company means first and foremost knowing how to work in a team, regardless of one's hierarchical position. Teamwork must not be taken for granted and must be cultivated day by day to be effective.
3. **Communication skills.** Whether it is conversing with a colleague, sending an e-mail or conducting a quick briefing for your team, being able to communicate clearly and effectively is crucial.
4. **Reliability.** Working independently without supervision, honesty, integrity, punctuality and everything that leads us to trust a colleague.
5. **Time management or knowing how to manage one's time effectively and efficiently.** There are times when everyone has so little time and so many tasks to perform that knowing how to manage one's time and assign the right priorities is crucial.
6. **Organisation.** Being organised does not necessarily mean having a tidy desk and a desktop with a reasonable number of icons. Rather, it is a personal working method that leads us not to constantly forget commitments, tasks, appointments. For example: write down what you have to do if you have many tasks and are afraid of forgetting them, use your telephone diary to mark appointments.
7. **Flexibility.** In today's ever-changing world of work, one must have the ability to adapt to novelty and change without losing one's orientation. A flexible employee will not be displaced by changes in practices, tools and tasks.
8. **Creativity.** Creativity is not a soft skill useful only for those who are involved in design, writing, marketing, etc. Those who are creative are also capable of finding new solutions to old problems, instead of following ways of working that may have become obsolete. At the same time, creativity is indispensable in order to quickly emerge from crisis situations and strong change, thanks to new winning ideas.
9. **Analysis capacity.** To be able to solve a problem (see next point), it is essential to fully understand its nature, facets and implications in an initial analysis phase. One must be able to think logically, breaking the problem down into sections and identifying cause and effect relationships.
10. **Problem solving.** Closely related to the previous transversal competence, problem solving is the capacity that allows us to study and find a solution to a problem every time

we are faced with an 'obstacle' that we cannot overcome instinctively or through habitual behaviour. There is no job that does not present us, more or less frequently, with new 'challenges' to solve.

11. **Multitasking.** multitasking is a transversal ability that allows us to perform more than one action, or activity, at the same time.
12. **Passion and enthusiasm.** An employee who puts passion into what he does not only works better, but often has a beneficial effect on the company climate and the commitment of colleagues, who are motivated by his enthusiasm.
13. **Respect and empathy.** In an increasingly 'multi' working environment (cultural, religious, etc.) one must have respect for everyone, know how to put oneself in the other's shoes and find points of contact and dialogue.
14. **Professionalism.** It seems obvious that an employee is also a professional, but this is not always the case. The true professional behaves in a mature and responsible manner in all contexts and situations and never loses his bearings even when faced with the most difficult customer or colleague.
15. **Personal motivation.** Staff motivation should not always be the task of management, human resources and the company in general. An employee must always be ready to give his or her best and to take the initiative, if necessary, without needing to be prompted.

According to studies, verbal autistic people often have difficulties participating in communicative activities involving common references or shared topics and, in particular, providing new information relevant to the listener's purposes. The aim of teaching these skills is to increase the person's confidence in communication, improve understanding and knowledge of non-verbal communication, and develop understanding of different ways of communicating depending on the situation. Helping the young person to acquire and master soft skills is essential to help him/her find and/or keep a job or become more involved in the world of work.

In conclusion, the experiences of people on the autism spectrum in the world of work are still few. However, it is of paramount importance to aim for an innovative approach that takes into account the specificities of each individual and that uses the strategies identified so far to support the person in learning specific and transversal skills entering the work environment and managing social interactions within it.

3. Methodologies and support tools

Introduction

With regards to teaching new skills, a number of modalities that facilitate learning in people on the autism spectrum have been shown to be effective; the main ones used within the INFUSE project are listed below.

Role-playing, video modelling, visual aids and structuring the environment are essential methodologies when working with young people on the autistic spectrum.

3.1. Video modelling

Video modelling, already present in the early 1990s, is a rehabilitation and teaching strategy of self-learning by imitation. Video modelling is based on the repeated viewing of short films describing appropriate behaviour in different environments and situations.

Videos can be made in different ways, depending on the perspective used and the subject to be modelled:

- a first-person video, also called Point of View (POV), in which the subject-model's hands are filmed while performing a certain action;
- a third-person video in which the model-subject is filmed from an external perspective. The subject can be the person themselves (self-model), a peer or an adult.

Since the tendency is to imitate more frequently and effectively subjects more similar to oneself in characteristics and age, it is preferable to make videos with a peer or self-model. Although autistic people show great difficulties in learning by direct imitation, scientific evidence shows that the use of video modelling strategies is effective.

In particular, it was effective:

- in learning patterns and behaviour in social play;
- in the acquisition of autonomy;
- in improving communication with others;
- in learning the rules of conversation;
- in the management of behavioural problems.

People are more engaged if they watch videos that show themselves or peers as protagonists. With regards to focused attention, video format is an excellent support to concentrate on the task at hand, especially in POV videos, eliminating all contextual variables that may cause distractions. Indeed, filming, especially those aimed at acquiring a particular autonomy, should be done in as neutral a context as possible and with a background free of possible distractors. Videos involve less stimulation and stress: there is no eye contact or real interaction between the person and the model, which is often a source of stress for people on the autism spectrum.

3.2. Role-playing games

Role playing is one of the most widely used training techniques because it allows one to interpret, literally, the professional roles that are the subject of the training intervention or other roles, not related to hard skills/technical-professional competences in particular, but necessary to interpret in order to put into practice soft skills/transversal competences (e.g. communication, stress management, problem solving, ability to work in a team, ability to work autonomously, mediation, negotiation, initiative, time management, organisational skills, leadership, flexibility, decision-making skills, planning and strategy, etc.).

The role-play is structured in 3 phases:

Briefing. In role playing, it is crucial to emphasise and remind learners of the importance of recreating (as realistically as possible and ideally without pauses as they could negatively affect the necessary concentration) the professional situation to be staged in a protected context.

Running the simulation. This is the moment when participants will have to put themselves into play using all the necessary methodologies, techniques, tools and skills they will have acquired for the particular professional situation being staged.

Debriefing. This is a fundamental teaching moment, without which everything that has been done up to that point through Role Playing would be of little use. It is in fact through the feedback, structured in 3 phases (which you will find below), that the teacher will stimulate important reflections.

Let's look at the characteristics of each phase of the Debriefing:

Learner self-assessment: the teacher should first of all help the protagonist of the role-play reflect on his or her own 'performance', through a free description of subjective impressions and feelings about what he or she has just done during the simulation. In fact, the teacher will use questions such as: "how did it go?"; "would you like to share your impressions of the experience you have just had?"; "would you like to describe the feelings you experienced?"; "how did you feel in the role you have just played?" and so on.

Evaluation, observations and possible questions from the learners who witnessed the simulation: After the conclusion of the learner's self-assessment, the teacher will stimulate the participation of the group of learner-observers, through questions such as: "what do you think?"; "would you like to add observations/reflections?" and so on.

Evaluation by the teacher: it is essential to start by emphasising the strengths, so as not to undermine the learner's motivation, through statements such as "this point is very good"; "I am really glad I observed this other one"; "very good, you understood perfectly how to do this other one" and so on. It is then necessary to make the learner reflect on the points to be improved, without ever using the expression "weak points", or expressions such as "you got this one wrong" and so on, again so as not to undermine the learner's motivation: instead, phrases such as "you need to work on this"; "you need to improve more on this"; "concentrate more on this" and so on should be used. The teacher will deepen, through the sharing of their assessment, fundamental aspects related to the competences at stake, dwelling on methodologies, techniques, tools that are the object of the training intervention, which precisely through didactic moments such as Role Playing have the possibility to be put into practice in a protected context, such as the training classroom, where participants will have the opportunity to experience on a concrete level all that is dealt with on a theoretical level during the frontal/active lessons.

When we teach young people on the autism spectrum what to say and do in social situations, we must never expect them to practise this learning on their own. They need to practise it in a safe environment where they can be taught, guided and encouraged.

3.3. Structuring the environment

Another important issue is that of workplace adaptation, as reported and protected by Council Directive 2000/78/EC of 27 November 2000 establishing a general framework for equal treatment in employment and occupation.

Spaces and times must be well structured and defined, with visual strategies, as visual-spatial abilities are a strength of autistic persons. Spatio-temporal structuring also promotes predictability and enables anxiety to be kept under control.

Changing the person's living environment also facilitates learning: it is necessary to adapt the environment to the person, progressively presenting him or her with difficulties.

A model of visual communication strategies should be used, although the choice of the most suitable form of communication always depends on the individual predisposition of each person.

An individualised educational programme must also be adopted, with continuous and frequent checks: if the person has a good programme, they learn in a reasonable time, otherwise the programme must be revised.

3.4. Visual aids

A visual aid refers to the use of an image or other visual element to communicate with a person who has difficulty understanding or using language. Visual aids can be photographs, drawings, objects, written words or lists. Research has shown that visual aids work well as a means of communication and as a learning support.

The use of visual aids is recommended both to structure the environment and to make the material visible/accessible, while encouraging autonomy. Specifically, "step-by-step" visual aids were used, i.e. sequences of images reproducing the entire activity to be completed. Their function is both to act as a "reminder" for the activity to be carried out, in its sequentiality, and to develop the autonomy of the person who is not dependent on the continuous prompting of the operator.

3.5. General strategies/recommendations to be adopted for the inclusion of people on the autism spectrum

Within the manual Start Autism , some strategies to support young autistic people within work contexts were highlighted. Start Autism is in fact a Manual drafted within the Start

Autism Project "START AUTISMO - Sistema Territoriale per l'Autonomia e la Realizzazione dei Talenti di persone con Autismo" (START Autism - Territorial System for the Autonomy and Realisation of the Talents of Persons with Autism), approved by the Abruzzo Region within the tender for the assignment of the service of "Accompagnamento all'inserimento socio-lavorativo dei soggetti autistici" (Accompanying autistic persons to social and work integration). This manual contains guidelines for the work placement of people on the autism spectrum, for example. These strategies allow the autistic person to better understand the task to be performed, the methods, the roles, etc. in order to lower anxiety levels by structuring and organising work by defining times and ways.

The strategies identified are as follows:

- Be clear, consistent and direct: non-verbal communication is bound to be 'lost' and/or misinterpreted;
- Establish clear lines of communication;
- Provision of facilities: schedules, plans, etc;
- Work analysis: identify each individual task that makes up the work and provide clear guidance for each task. Create, if necessary, a work file (folder);
- Produce clear guides/checklists;
- Communicate any changes in advance where possible;
- Provide regular feedback, both positive and negative;
- Reassure;
- If necessary, make sure the worker knows where he/she is going wrong and why;
- Careful attention must always be paid to the framing of operational tasks in the workplace of the autistic person:
 - Explain the purpose of each task;
 - Divide each task into manageable components;
 - Openly state the expected impacts or purpose of the project;
 - Communicate expected quality;
 - Establish a timeline for completion;
 - Check that the instructions have been understood.

Various experiences concerning the job placement of persons on the autism spectrum, such as, for example, the START AUTISMO project, provided for the training of a new professional figure specialised in the job placement of autistic people and defined the professional reference profile of the figure of the "Professional qualification technician for persons with autism" (T.A.P.), whose first training experience was represented by the project's specialised training course. In terms of classification, the profile falls within the professions classified by ISTAT and the Ministry of Labour under code 3.4.5.3.0 "School and vocational information and guidance service technicians". The exercise of this profession with autistic people, while falling within the profiles relating to work mediation of disadvantaged persons and the profile of the "Work Placement Technician", already defined by the Abruzzo Region with Regional Council Resolution no. 636 of 19/09/2011, requires specific technical-professional skills due to the specificity of the autism, methodological approaches and communicative-relational techniques. The definition of this profile represents a pilot experience at both regional and national level. At an international level, there are some system experiences in the United States (Vocational Rehabilitation Professionals - VRP) and in the United Kingdom.

4. Conclusion

The pathway of workplace inclusion for people on the autism spectrum is in fact still a pioneering process, since there are still too few experiences that testify to an effective employment outcome and, although there are national experiences in this sense, they often refer to sheltered workshops rather than to a real entry into the labour market. This difficulty, which is undoubtedly impacted in part by the specific and continued support required for autistic people, does not justify the fact that a majority of autistic young adults never reach any kind of employment. In fact, we know that, despite their support needs (such as communication skills, lack of flexibility and difficulty with social contact), people on the autism spectrum possess special skills in specific areas where their contribution would be an added value for the very companies willing to hire them. Starting from this consideration, it is important to try to identify an appropriate pathway to assess the specific characteristics on each autistic individual, enhancing specific interests and activities. It is also essential to educate and train technicians and operators who deal with the rehabilitation and integration of autistic individuals in work contexts through awareness-raising and training on specific methodologies supported by effective experiences and validated by the literature. In fact, studies on the neuropsychological functioning of people on the autism spectrum note that they benefit from learning through means and methods adapted to their specific needs and strengths.

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