

Impact case: The IT-track

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Abstract:

In this impact case, we describe our ethnographic study of an educational program in Information Technology for young adults associated with high-functioning autism, which aimed at making the students employable. Our study proved to be unique in that we actually interviewed and followed the students, rather than studying them “from outside”.

The impact is on four levels:

- *first*, the program was a success, which is not our doing, but making this point to various stakeholder – and describing *why* it was a success – would have been more difficult without our research results.
- *second*, our research contributed to “saving” the program – a continuation was planned partly as a result of our research and documentation, thus giving more individuals opportunities for a tailored education and a chance in the job market.
- *third*, the knowledge and expertise we developed as a result of our study has been in great demand – we have been asked to continue studying programs for people associated with high functioning autism in other educational settings, and we are invited to speak about our studies for stakeholders all over the country. This will influence future programs for the target group.
- *fourth*, more tailored programs for the target group, and necessary adaptations to the target group at work places – adaptations that are detailed in our research – promises to save human suffering and societal costs in the long run.

In the following we describe the case in chronological order, providing more details on the study as well as on the impact.

THE IT-TRACK

In the Swedish society, people associated with disabilities face great difficulties in getting a foothold in the labor market. For people associated with neuropsychiatric disabilities this has been especially challenging – this group has the second lowest employment rate. Furthermore, once they enter the labor market, they are four times more likely to be subjected to discrimination compared to the general population. The aim of the program the IT-track was an effort to make the students employable and ease their entry into the labor market.

15 students were recruited to a tailored IT education program. Adaptations to the target group were made in terms of facilities, teachers, pedagogy and home/study support. It was project based and planned for the period 2012-2015.

The project owner was a consortium of regional and municipal public stakeholders, and it was supported by funding from the European Social Fund (ESF). The stakeholders were Region Jönköping, Höglandet’s Coordinating Association and Eksjö Municipality. The cost of the IT-track was approximately SEK 2 million per year (approximately USD 0.23 million).

THE STUDY

The study was inspired by ethnographic methodology, where researchers reside within the environments and situations they want to learn about. We resided in the specific culture of the IT-track in order to gain knowledge about the students' lived experiences. By taking part in the practice, observing what happens, listening to what is said, and by asking questions, we developed an understanding of the participants' experiences and the learning that took place in this context. The observations in this study were used to enable an understanding of the context, and they also helped us to get to know the prospective interviewees and to develop a trust-based relationship with them that subsequently enabled the interviews. The context of the present study was limited to the delivery of the IT-track in the autumn of 2014 and a follow up study in the autumn of 2016.

Data were collected in four ways: (a) participant observation and natural conversations in the autumn of 2014, (b) 14 research interviews with students, (c) one focus group interview with the staff, and (d) a follow up interview two years later with the occupational therapist/coordinator. Participant observation and natural conversations were conducted by the two researchers together. During the observation period, the experiences of the respondents were shared with the researchers during actual learning situations. Fourteen of the 15 students who were enrolled in the project during the autumn of 2014 took part in interviews that lasted between 20 and 60 minutes.

A focus group interview was conducted with the staff of the IT-track and lasted 80 minutes. A follow up interview was conducted in autumn 2016 with the occupational therapist/coordinator and lasted 60 minutes. Both researchers were present on these two occasions.

RESULTS

1. Results for students and why it worked

Hedegaard and Hugo found that the design of the IT-track gave the students the opportunity to experience participation and alignment. According to 13 of the students, the IT-track was fully adapted to their needs and circumstances, and they experienced being part of a meaningful and participatory social context for the first time in their lives. Of the twelve students who completed their education, five had made transitions to employment and three held internship places. The study identified several adjustments that were made in the work environment as well as in the outline of the education, that proved successful. Important adjustments included the provision of individual work places, the clear structure of the work that was to be performed, and the creation of an environment where the students were seen, acknowledged, and understood. Because of this training and the adaptations that were made within the educational program, the well-being of the students improved, and their need for home support and medication decreased.

Aside from the students themselves, the positive effects of the IT-track also impacted their families. It is quite common for a person with high-functioning autism, that have difficulties in coping with the traditional educational system and/or getting a job, to continue to live at home with the parents long after entering adulthood. The IT-track offers a practical avenue for the students to move out of their family homes.

2. Saving the program

When the funding from the European Social Fund expired in 2015, the program was, initially, meant to be shut down. However, the experiences documented in this study were so positive that Eksjö municipality, aided by financing from Region Jönköping, Höglandet's Coordinating

Association, Finnvedens Coordinating Association and Södra Vätterbygdens Coordinating Association decided to make the IT-track permanent. These organizations funded the IT-track in 2016 and 2017. This has rendered an opportunity for a new groups of 15 individuals with high-functioning autism to get education and training that enhances their chance of getting their first job, and that also significantly empowers them and boosts their well-being. Our initial research report was instrumental in making an extension of the program possible.

3. Continued demand from society for knowledge

As an effect of the work with the IT-track, Hedegaard and Hugo now continue their research and have for example completed a study regarding participants with high-functioning autism at the Swedish folk high school/liberal adult education. They have gained interesting and highly promising results from the first study and are now sought-after lecturers on the subject of adjusting education and work environment to enhance the chance of success for this group. They have been invited to several Swedish universities, and to supplementary training programs for teachers and principals, to talk about their results and what efforts are crucial to make this group thrive. They have also been invited to speak at The National Agency for Special Needs Education and Schools and at the large annual Swedish political conference and market-place of ideas, Almedalsveckan in Visby.

4. Saving human suffering and societal costs

The exclusion and discrimination of people associated with disabilities incurs considerable individual and societal costs. Breaking down the alienation of people associated with disabilities so that they can find work in the regular labor market is a major challenge. Besides preventing individual stigmatization, breaking down this alienation is estimated to allow for social savings of between SEK 11-14 million (approximately USD 1.2-1.6 million) for each young individual that is subsequently included in society. The IT-track has thus already saved very large sums, and any new program or measure taken to ease the integration into the labor market for these people will be highly profitable. We thus foresee tangible results in saving societal costs as well as human suffering as the results of the study become implemented in education and at places of employment.

Voices from the stakeholders

Eva Klangbeck, development leader and former coordinator for the IT-track

About the impact of the research within the organization:

With the research, we wanted to see what the differences between the IT track and the student's lives were. We noticed that they changed and learned things but how was their experience of it? We had not believed that social learning would be as important as the theoretical aspect, but it turned out to be significant.

Who has benefited from research within or outside your organization?

Those who have benefited the most from research are those who have studied, study or want to study on the IT track. This is since we had the help of research, we were able to demonstrate the importance of education. This demonstration, was in turn possible to use when we had to motivate the education's existence, meaning that even more students could benefit from the IT-track. Today it is a permanent activity.

How significant is the benefit of research within your organization?

We understood that the education gave more to the students than we thought and what we probably would have seen without the research. It also included the social pieces as part of the education.

How has research contributed or led to effects within your organization?

The education is now a permanent activity instead of a project activity as before. It would have been difficult to permanent the IT-track without the research to demonstrate the effect.

Are there any plans to further utilize or apply research within your organization?

We would find it incredibly fun and beneficial to do a similar study again to compare the results. Are the answers we received just the group interviewed or do current students have the same experiences? We would also like to follow up all who completed their studies. What does their everyday life look like today? Are they working today? What difference did the IT track make in their lives?

References:

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- Hedegaard, Joel & Hugo, Martin (2015). IT-spåret: *En följeforskningsstudie om studenters och personals upplevelser av verksamheten*. Jönköping: Högskolan för lärande och kommunikation.

Some of the media coverage:

- <https://www.smt.se/article/it-sparet-ger-ny-chans/>
- <https://sverigesradio.se/sida/artikel.aspx?programid=91&artikel=6799639>
- <https://www.nyteknik.se/ingenjorskarriar/karriar/har-ar-aspergers-ett-krav-6580122>
- <https://center.hj.se/encell/kunskapsbank/reportage/arkiv/2017-02-16-encellforskare-lyfter-fram-det-sociala-larandet-i-ny-artikel.html>
- <https://www.smt.se/article/it-sparet-en-unik-utbildning-med-potential-som-behover-finansieringslosning-nu/>
- <https://www.smalandsdagblad.se/article/unika-utbildningen-blir-kvar/>

Other assignments that is a direct result of the research:

Joel Hedegaard is, since 2018, a member of the Editorial Board of The Journal of Rehabilitation Research.