

DIGI GEN

Professional career guidance for women in management positions in the field of digital competence

TRAINER MATERIAL

Structural handbook of the up-skilling programme



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1 GENERAL INFORMATION

The up-skilling programme of the Erasmus+ project DIGIGEN is implementable by any educational or other organisation that wishes to train career counsellors and/or HR practitioners (further referred to as guidance professionals) in counselling (soon-to-be) female leaders in terms of digital competencies. This manual, therefore, gives practical information on how to use the materials provided and adapt them to the particular context of the educating organisation.

In general, once implemented as a training course, the up-skilling programme directly addresses guidance professionals who counsel (soon-to-be) female leaders and, therefore, indirectly addresses (soon-to-be) female leaders who are in need of counselling in terms of digital competencies. Figure 1 shows this relationship between trainers, the direct target group (guidance professionals) and the indirect target group (female leaders).

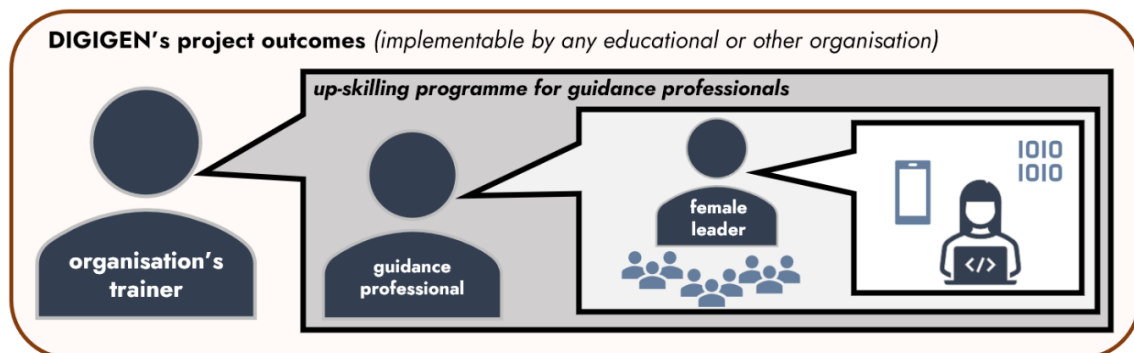


Figure 1: General conditions of the up-skilling programme and target groups.

Under the terms of the CC BY-NC-SA 4.0 Creative Commons licence¹, trainers are permitted to modify the material and adapt it to their needs. For example, it is possible to define a new target group (e.g. female managers) and train them with a selection of topics.

This handbook contains general descriptions of the topics as well as practical information on materials, literature and the time frame ('one-pager' of each topic). Information on the didactic concept and implementation can be found in the "Didactical Framework". Information on teaching the material can be found in the "Step-by-Step Instruction" and the "Readers".

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1.1 Learning Outcomes and Objectives

LEARNING OUTCOMES

- *Utilise* the newly gained knowledge (on digital tools, digital leadership, female leadership, and organisational change) to counsel (soon-to-be) female leaders.
- *Reflect critically* on the effects of digitalisation on an entrepreneurial context and its impact on (soon-to-be) female leaders.
- *Develop* a thriving counselling offer designed for the individual professional context to counsel (soon-to-be) female leaders.
- *Work with* scientific studies and current literature to keep informed about topics regarding the counselling of (soon-to-be) female leaders in a digital context.
- *Analyse and critically evaluate* policy developments and possible intervention approaches.

LEARNING OBJECTIVES

- *Knowing* the changes in leadership, leadership style and tools for a digital leader that result from digitalisation.
- *Knowing* the demands and challenges of a digital (female) leader.
- *Understanding* the links between the role of a guidance professional and the impact on organisational change.
- *Understanding* the need for and extension of digital leadership competencies in relation to female leadership.
- *Applying* knowledge of digital leadership and its context to a counselling setting with a female leader.
- *Applying* scientific and practical counselling approaches to counselling (female) leaders.
- *Contributing* to the awareness of digital leadership in counselling.
- *Contributing* to the empowerment of female digital leadership in an organisational environment.

1.2 Taxonomy and Knowledge Levels

The up-skilling programme consists of five topics which, building on each other, give a broad overview of various subjects in relation to counselling (soon-to-be) female leaders in digital transformation. A general introduction and a closing final reflection frame these topics.

Topics 1 to 4 focus on building a basic understanding of issues that come along with digital leadership and female empowerment. Therefore, these topics are primarily about imparting knowledge and should be taught in a classical lecture setting (frontal teaching with many opportunities for discussions and interactions). However, half of Topic 4 and most of Topic 5 turn away from classical teaching and focus on problem-based self-teaching with the support of a facilitating trainer. These Topics are more about the process of acquiring knowledge than presenting knowledge. As a reminder, Table 1 presents the fundamental structure of the up-skilling programme with taxonomy levels and knowledge levels for each topic.

UP-SKILLING PROGRAMME'S TOPICS	KL	TL
Introduction <i>Teasing the content of the up-skilling programme and creating awareness of the "issue's" importance</i>	Factual Knowledge	Knows How
1 Female leaders with digital competencies <i>Knowing about the chances of digitalisation, necessary competencies and leadership styles</i>	Factual Knowledge; Conceptual Knowledge	Knows; Knows How
2 Female leaders in a digital context <i>Knowing how to utilise digital tools and how to advise female leaders in this regard</i>	Conceptual Knowledge; Metacognitive Knowledge	Knows
3 Female career development and empowerment <i>Supporting women's self-concept and learning about techniques to foster female career development</i>	Conceptual Knowledge	Knows
4 Organisational development and support <i>The impact on organisations when supporting female leadership; strategies to help the organisation cope</i>	Procedural Knowledge; Metacognitive Knowledge	Knows; Shows How
5 Professional counselling <i>(Scientific approaches and practical approaches) Introduction to counselling as a science and problem-based learning; Practical application and integration of career counselling, coaching and mentoring</i>	Conceptual Knowledge; Procedural Knowledge; Metacognitive Knowledge	Knows How; Does
Final Reflection <i>Selected aspects of a counsellor's context and summing up and reflecting the content of the up-skilling programme.</i>	Factual Knowledge; Metacognitive Knowledge	Knows

Table 1: Structural overview of the topics and their taxonomy (TL) and knowledge levels (KL). For background information, please see the 'Didactical Framework'.

1.3 Problem-Based Learning

In many fields, a wide range of theoretical models are available. But as Guyatt stated in the early nineties, in a lot of cases, the daily practice in fields like health and social work is often not only founded on scientific (evidence-based) knowledge (Guyatt, 1991). It was the origin of the development of his model for **Evidence-Based Practice (EBP)**. The EBP concept aims to integrate scientific knowledge into practitioners' daily practice. However, in this approach, the application of scientifically based interventions alone is too one-sided. In a transformative EBP-approach to learning, there are at least two other sources. So, all together, there are three sources of expertise:

1. scientific knowledge coming from empirical research;
2. the experience and expertise of the practitioner;
3. the individual wishes, needs and circumstances of the client.

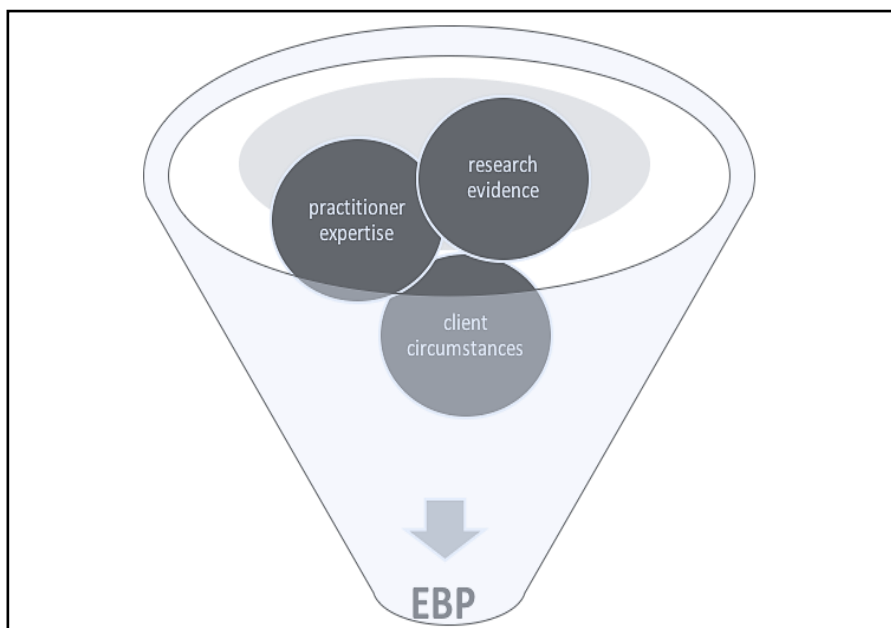


Figure 2: The EBP-model of Evidence-Based Practice (Guyatt, 1991).

EBP is a weighing process in which input from scientific research and the expertise of the professional are integrated and applied as a tailor-made solution to the needs, wishes and circumstances of the individual client (Van der Zwet et al., 2019).

In Topic 5 of the up-skilling programme, we shall therefore turn towards this EBP model in addressing the three types of expertise. We will zoom in on the scientific base of professional counselling. We will then use the didactical approach of Problem-Based Learning (PBL) to work on a range of individual cases to include the experience and expertise of the practitioners involved and also to cover the other two dimensions of the EBP model.

By doing this, we use the expertise and problem-solving capabilities of the participants of the upskilling program to make use of knowledge of the client's circumstances and use available research-based models and theories.

Problem-based approaches to learning have a long history of advocating experience-based learning. Psychological research and theory suggest that by having participants learn through the experience of solving problems, they can learn both content and thinking strategies. **Problem-based learning (PBL)** is an instructional approach in which participants learn through facilitated problem-solving. In PBL, learning centres on a complex problem that does not have a single correct answer. Learners work in collaborative groups to identify what they need to learn in order to solve a problem. They engage in self-directed learning (SDL) and then apply their new knowledge to the problem and reflect on what they learned and the effectiveness of the strategies employed.

The trainer acts to facilitate the learning process rather than to provide knowledge. In PBL, the trainer's role is often referred to as the role of a tutor. Research shows that PBL is an approach that offers the potential to help learners develop flexible understanding and lifelong learning skills. The goals of PBL include helping learners develop:

1. flexible knowledge;
2. effective problem-solving skills;
3. SDL skills;
4. effective collaboration skills;
5. intrinsic motivation.

The PBL learning cycle (shown in **Fehler! Verweisquelle konnte nicht gefunden werden.**) is enacted through the tutorial process that begins with presenting a problem and ends with participant reflection. The PBL session begins by presenting a group of learners with minimal information about a complex problem. From the outset, learners must question the facilitator to obtain additional problem information; they may also gather facts by doing experiments or other research. At several points during their problem-solving, learners typically pause to reflect on the data they have collected so far, generate questions about those data, and hypothesize about underlying causal mechanisms that might help explain the data. Learners also identify concepts they need to learn more about to solve the problem, labelling these concepts as “learning issues.” After considering the problem with their present knowledge, learners independently research their chosen learning issues. They then regroup to share what they have learned, reconsider their hypotheses, and/or generate new hypotheses in light of their new learning. When completing the learning task, learners deliberately reflect on the problem to abstract the lessons learned and their SDL and collaborative problem-solving processes.

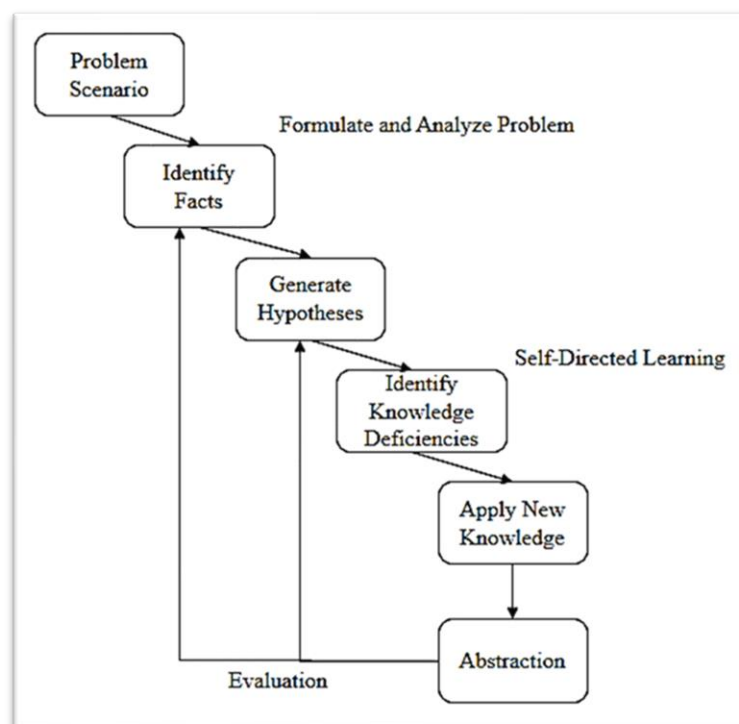


Figure 3: The PBL learning cycle (Hmelo-Silver, 2004).

To foster flexible thinking, problems must be complex, well-structured, and open-ended; to support intrinsic motivation, they must also be realistic and resonate with the learners' experiences. A good problem affords feedback that allows learners to evaluate the effectiveness of their knowledge, reasoning, and learning strategies. The problems should also promote conjecture and argumentation. Problem solutions should be complex enough to require many interrelated pieces and should motivate the learners' need to know and learn. As learners generate hypotheses and defend them to others in their group, they publicly articulate their current state of understanding, enhancing knowledge construction and setting the stage for future learning. Such problems should help learners become engaged in the learning process based on their initial understanding.

THE 7-STEP METHOD

The 7-step approach to PBL is a method in which the learner is at the centre, and the trainer is guiding along. In the meetings, learners discuss "problems" using a procedure called the seven-step approach. In PBL, the group is jointly responsible for the quality of the learning process and the meeting's success. Therefore, all learners must prepare well, participate actively in the tutorial meetings, and explain the studied materials in their own words. This introduction gives an overview of the procedure of the seven-step approach. It can be used as a starting point for practice with the seven-step approach and the different roles in the learning group. Both learners and tutors can use it to determine what concrete skills they need to master in order to promote their own performance and that of the group. In the first part, the seven-step approach is explained. Next, attention is given to the role and skills of the trainer as supervisor of the learning process and to the evaluation of the group process.

Step 1: clarifying unfamiliar terms	Unclear terms and concepts in the problem description are clarified so that every group member understands the given information.
Step 2: problem definition	The problem is defined in the form of one or more questions. The group has to agree upon the phenomena that need to be explained.
Step 3: brainstorm	The pre-existing knowledge of group members is activated and determined. This process entails the generation of as many explanations, ideas, and hypotheses as possible. The ideas of all group members are collected without critical analysis.
Step 4: analysing the problem	Explanations and hypotheses of the group members are discussed in depth and are systematically analysed. Ideas from the brainstorm are ordered and related to each other.
Step 5: formulating learning goals	Based on contradictions, obscurities, and ambiguities from the problem analysis, questions are formulated that form the foundation for the study activities of the group members. In short, it is determined what knowledge the group lacks, and learning goals are formulated on these topics.
Step 6: self-study	In the self-study phase, group members search for relevant literature to answer the learning goals. After studying this literature, group members prepare themselves to report their findings in the next tutorial meeting.
Step 7: reporting	After reporting what sources group members have used in their self-study activities, the learning goals are discussed based on the studied literature. Group members try to synthesise what they have found in different sources.

Table 2: Steps of the 7-step method.

THE ROLE OF THE TUTOR: THE FACILITATOR OF LEARNING

Having good problems is a necessary but not sufficient condition for effective PBL. The tutor role is critical to making PBL function well. The tutor scaffolds participants' learning through modelling and coaching, primarily through questioning strategies. Tutors progressively fade their scaffolding as learners become more experienced with PBL until, finally, the learners adopt many of the tutors' roles. The tutor is responsible both for moving the learners through the various stages of PBL and for monitoring the group process. The tutor:

- a. guides the development of higher-order thinking skills by encouraging learners to justify their thinking
- b. externalises self-reflection by directing appropriate questions to individuals.

An underlying assumption is that when tutors support the learning and collaboration processes, learners can better construct flexible knowledge. Being a tutor is a subtle skill. It involves knowing when an appropriate question is called for when the learners are going off-track, and when the PBL process is stalled. The tutor's role is to support and supervise the learning process of the tutorial group members. The tutor supports the process of independent learning with respect to both process and content. The tutor has an open attitude towards learners and shows interest in their (study) activities. They do not act as a traditional trainer but assert the supervisor role. The tutor observes and analyses the group process and intervenes, if necessary, by asking questions and giving examples, seldom by giving information directly. They can communicate with learners both formally and informally and are able to raise a matter understandably.

EXPERT & NON-EXPERT TUTOR

Since the introduction of PBL, there has been a discussion about the need for a tutor to be an expert on the content of the learning tasks. In some approaches to PBL, the idea is that the tutor does not need to have expert knowledge on the subject of the problem in the learning task. In this approach, the tutor is an expert on the didactics and the problem-solving process but not on the content of the subjects in the problem itself. In other approaches, the tutor is seen as an expert both on the problem-solving process and on the content of the learning task.

In our view, the last approach is applicable to the learning tasks in this module. The assumption is that the tutor is an expert in the field of career counselling and is familiar with the literature, theories, and models that are relevant to the learning tasks.

2 STRUCTURE OF THE UP-SKILLING PROGRAMME

2.1 Introduction

OVERVIEW		
Number (of the topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
Introduction (0)	2 h / 1 h	Know How
Content	Description	Method
Challenges leading to the need to up-skill	<ul style="list-style-type: none"> Overview of the challenging environment in the working life Problem statement and its relevance Content-related and didactical approach 	Frontal teaching & group poll & discussion

2.1.1 General description

The *introduction* serves to make the participants aware of the challenges in the modern working world. These can be summarised in the areas of digitalisation and digital transformation, new work and efforts to achieve equality in the professional context. This training offer is intended to enable HR practitioners and career counsellors better to address these challenges vis-à-vis women in management positions and, in particular, to clarify their intersection, thereby enabling women in management positions to better take advantage of opportunities in the labour market and to better meet the requirements of their job profile.

Participants can take a self-evaluation test on the DIGIGEN website if needed. This test helps identify the learner's needs before starting the training and adjust the content to the learner's needs eventually. It can also be retaken at the end of the up-skilling programme to compare knowledge gained !

2.1.2 Content description

No.	Content title	Scope
0	Challenges leading to the need to up-skill	120 min
What is it about?		
<p>This part of the upskilling programme first presents the challenging environment of working live and decision-making processes under focussed consideration of digitalisation, digital transformation, New Work, and equality efforts. Furthermore, there is an introduction to the VUCA framework. Finally, we present the target groups, their needs and the core components of the curriculum. It also points out where the limitations of the program are, especially in relation to the multi-faceted nature of diversity. It also points out that the upskilling program is not intended as a tool to address gender inequalities.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Changes in working life and related challenges 2. The VUCA-World 3. Diversity as a world of complexity and interdependencies 4. Who are we? The target groups of the upskilling programme and their needs 5. The approach of the programme, as well as the curriculum modules 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (Reader) ▪ PowerPoint/Presentation (trainer's material); <i>additions by the trainer optional</i> ▪ Self-evaluation; on the DIGIGEN website 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ DIGIGEN-Website: digi-gen.eu (English, German, Hungarian, Dutch, Lithuanian) ▪ DIGIGEN materials (and literature listed within): <ul style="list-style-type: none"> ▪ Literature Review (English) ▪ Literature Review Summary (English, German, Hungarian, Dutch) ▪ Needs Analysis (English) ▪ Needs Analysis Summary (English, German, Hungarian, Dutch) 		

2.2 Topic 1 – Female leaders with digital competencies

OVERVIEW		
Number (of the topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
1	11 h / 9 h	Knows & Knows How
Content	Description	Method
(Digital) Leadership theory	<ul style="list-style-type: none"> Overview of theories of traditional leadership New forms of leadership and leadership theory Chances of digital leadership competencies for female leadership 	Frontal teaching & group work & discussion

2.2.1 General description

Not knowing what to look for in terms of digital competencies or new forms of leadership will lead to unspecific guidance for women who are dealing with these topics. Therefore, the topic of *female leaders with digital competencies (1)* closely examines the competencies needed for digital/future leadership. To put digital competencies into context, this topic starts with giving a brief overview of traditional leadership styles. Participants will then learn about new forms/styles of leadership by discussing those. Lastly, competencies to manage new or disruptive businesses alongside digital leadership competencies are zoomed in on.

Participants learn about new forms of leadership and digital leadership competencies by elaborating on those topics in group work and group discussions. This helps foster the participant's professional experience and engage them in actively assessing the empowerment changes of female leadership.

2.2.2 Content description

No.	Content title	Scope
1	(Digital) Leadership theory	660 min
What is it about?		
<p>This part of the upskilling programme presents selected leadership theories of traditional and emerged leadership styles and a concept of digital leadership competencies. Although former leadership styles seem to have lost relevance, they still impact today's perception of leaders. Therefore, participants get a brief overview to contextualise traditional and newly emerged leadership styles. Finally, participants learn about the competencies needed to lead a digital and disruptive business in the 21st century.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Learn about the classification of leadership styles 2. Learn about theories of traditional leadership 3. New forms of leadership and their chances for female leadership empowerment 4. Elaborate on digital leadership competencies and their chances for female leadership empowerment 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (Reader) ▪ PowerPoint/Presentation (trainer's material); <i>additions by the trainer optional</i> ▪ Texts on leadership competencies (links in the presentation); <i>only English available</i> 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Harrison, C. (2018). Leadership Theory and Research. A Critical Approach to New and Existing Paradigms. Cham: Palgrave Macmillan. (English) ▪ Institut für angewandte Arbeitswissenschaft e.V. (ifaa) (2023). Künstliche Intelligenz erfolgreich einführen. Orientierungshilfe für Führungskräfte. Broschüre des Projekts „humAI – work.lab“. Online: https://www.humain-worklab.de/. (German) ▪ Rybnikova, I.; Lang, R. (2021). Aktuelle Führungstheorien und -konzepte. 2. Aufl. Wiesbaden, Heidelberg: Springer Gabler. (German) ▪ Hasenbein, M. (2020). Der Mensch im Fokus der digitalen Arbeitswelt. Wirtschaftspsychologische Perspektiven und Anwendungsfelder. Berlin, Heidelberg: Springer. (German) ▪ Dobrák, M.; Antal, Zs. (2016). Vezetés és Szervezés. Szervezetek kialakítása és működtetése. Budapest: Akadémiai Kiadó. (Hungarian) ▪ Eppink, D. J., & Keuning, D. (2008). Management en Organisatie: Theorie en Toepassing. Wolters Noordhoff. (Dutch) ▪ Sluis, L. E.C. van der (2019). Talent is goed, Ambitie is beter. Gids voor strategisch management. Alphen a/d Rijn: Vakmedianet. (Dutch) ▪ Eysbroek, N. Steunenbergh, B. Sluis, E.C. van der, & Rietdijk, M. (2012). Haagse hakken, Vrouwen in de politiek. Amsterdam: Balans. (Dutch) 		

2.3 Topic 2 – Female leaders in a digital context

OVERVIEW		
Number (of the Topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
2	6 h / 9 h	Knows
Content	Description	Method
Digital Management Tools	<p><i>Introducing terminology, explaining practical importance, and describing processes for these fields:</i></p> <ul style="list-style-type: none"> ▪ Digitalisation & Digital Transformation ▪ Modern Technologies for SMEs ▪ Knowledge Management and Tools ▪ Workflow Management and Tools ▪ Enterprise Data Management and Tools ▪ Digital Leadership 	Frontal teaching & group work & discussion

2.3.1 General description

Upon completing the topic on *female leaders in a digital context (2)*, participants will gain a comprehensive understanding of crucial digitalisation concepts and modern technologies. This includes artificial and virtual reality tools, knowledge management, workflow management, enterprise data management, and digital leadership. They will also grasp how these technologies benefit enterprises and how to integrate them into business processes. Participants will become aware of the tools available in the market and receive a list of recommended resources for further learning, including online articles and tutorials. Also, participants will have improved their professional knowledge and skills, enabling them to navigate digital transformation trends and propose solutions. They can recommend digital solutions for businesses and have the resources to continue learning in the domain of digital tools and technologies.

2.3.2 Content description

No.	Content title	Scope
2	Female leaders in a digital context	360 min
What is it about?		
<p>This part introduces terminology, explains practical importance and describes processes of digital aspects for companies. Every thematic topic is structured in the way that it starts with the definition of crucial concepts, goes on with the importance of these concepts, explains the processes for persons involved and finally presents some specific digital tools.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Digitalisation & Digital Transformation 2. Modern Technologies for SMEs 3. Knowledge Management and Tools 4. Workflow Management and Tools 5. Enterprise Data Management and Tools 6. Practical Perspective on Digital Leadership 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (participant's material) ▪ PowerPoint/Presentation (trainer's material); <i>additions by the trainer optional</i> ▪ Internet access and mobile devices to access various websites (links in the presentation and participant's material); <i>those websites are mostly available in English</i> 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Waddill, D. (2018). Digital HR. A Guide to Technology-Enabled Human Resources (1. Ed.). Alexandria: Society for Human Resource Management. (English) ▪ Tirrel, H.; Winnen, L.; Lanwehr, R. (Ed.) (2021). Digitales Human Ressource Management. Aktuelle Forschungserkenntnisse, Trends und Anwendungsbeispiele. Berlin/Heidelberg: Springer Gabler. (German) ▪ von Hattburg, A. T.; de Grancy, C.-D. (2023). Agenda HR – Digitalisierung, Arbeit 4.0, New Leadership. Was Personalverantwortliche und Management jetzt nicht verpassen sollten (2. Ed.). Berlin/Heidelberg: Springer Gabler. (German) ▪ Mracsó, A.; Gere, T. (2022). Digitális vállalkozás – Nagyobb produktivitás, kisebb káosz. Budapest: GPS Expert Kft. (Hungarian) ▪ Noszkay, E. (Ed.) (2023). Tudásmenedzsment a következő két évtized határán. Budapest: Akadémiai Kiadó. (Hungarian) ▪ Stoker, J., & Garretsen, H. (2022). Goede leiders in onzekere tijden: Lessen voor organisaties en de politiek. Business Contact. (Dutch) ▪ Ruel, H., & Bondarouk, T. (2019). HRM en technologie. In HRM Heden & Morgen: Evidence Based Practice and Practice-Based Evidence (pp. 424-466). Vakmedianet. (Dutch) 		

2.4 Topic 3 – Female career development and empowerment

OVERVIEW		
Number (of the topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
3	5 h / 10 h	Knows
Content	Description	Method
Think Manager – Think Male	<ul style="list-style-type: none"> Unconscious bias and stereotypes Implicit leadership theories and their impact on leadership perception Role Congruity Theory and the impact on the female application process 	Frontal teaching & discussion
Effects on female careers	<ul style="list-style-type: none"> Female-specific challenges Role models and mentoring 	Frontal teaching & discussion

2.4.1 General description

The topic of *female career development and empowerment (3)* takes a closer look at models and theories on empowerment, specifically the empowerment of women and their position in the management of organisations. Before engaging in empowerment methods, a scientific excursion presents insight into the effects of stereotypical male leadership understanding and its effect on female leadership. Understanding the impact of stereotypes in leadership helps put the empowerment methods into context.

The empowerment is addressed by analysing female-specific career challenges first. In discussion with the participants, empowerment methods are to be developed. No overall strategy will be given because empowerment strategies must be individualised to each female leader's needs. We prefer to focus on learning through the exchange of experiences. Finally, role models and mentoring are presented as a way to strengthen female leadership careers.

2.4.2 Content description

No.	Content title	Scope
3.1	Think Manager – Think Male	150 min
What is it about?		
<p>This part of the upskilling programme presents the scientific research on implicit leadership theories and the effects of the so-called role congruity theory. It helps participants understand the position (some) female leaders are in and what prejudices they might be (self-)assigned to. Understanding will help to find measures to guide female leaders by putting prejudices into perspective.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Understanding stereotypes and unconscious bias 2. Understand the importance of implicit leadership theories 3. Learn about research methods to investigate implicit leadership theories 4. Learn about the findings on the perception of leadership 5. Learn about the role congruity theory 6. Understand the touchpoint of the role congruity theory with guidance counselling 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (Reader) ▪ PowerPoint/Presentation (trainer’s material); <i>additions by the trainer optional</i> ▪ Electronic device for the participants to participate in the interactive part (QR-Code) 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Koenig, Anne M.; Eagly, Alice H.; Mitchell, Abigail A.; Ristikari, Tiina (2011): Are leader stereotypes masculine? A meta-analysis of three research paradigms. In: Psychological Bulletin 137 (4), S. 616–642. DOI: 10.1037/a0023557. (English) ▪ Burel, S.; Saur, F.; Tsehaye, W. (2020): Quick Guide Female Leadership. Frauen in Führungspositionen in der Arbeitswelt 4.0. Berlin, Heidelberg: Springer Gabler. (German) ▪ Czibor, A.; Kázmér-Mayer Szilvia; (2019): Nemi különbségek hatása a vezetési stílusra. In: Replika (https://real.mtak.hu/106093/1/replika_111-09_kazmer-mayer_-_czibor.pdf). (Hungarian) ▪ Brenters, M. (2022). De FemDeal: hoe organisaties moeten veranderen om vrouwen aan de top te krijgen. Ambo Anthos. (Dutch) ▪ Merens, A., Henderikse, W., Pouwels, B., & Zaak, K. P. (2015). Door het glazen plafond. <i>Beleid en Maatschappij</i>, 42(1), 6-31. (Dutch) 		

No.	Content title	Scope
3.2	Effects on female careers	150 min

What is it about?

This part of the up-skilling programme presents an overview of common challenges women face in their careers. It is supposed to foster active discussion on those challenges among the participants. Some challenges addressed are imposter syndrome, queen bee syndrome, crab basket syndrome, and personal challenges.

Timeline

1. Learn about common syndromes which affect female careers
2. Learn about professional and private challenges that might occur in counselling
3. Understand the need for role models and mentorship

Preparations and Materials

- Fact sheets on the presented theories (Reader)
- PowerPoint/Presentation (trainer's material); *additions by the trainer optional*
- Eventually, a technical device to play a YouTube video

Resources and Literature

- Eagly, A. H.; Carli, L. (2007): Women and the labyrinth of leadership. Harvard business review 85, pp. 62-71, 146. DOI: 10.1037/e664062007-001. **(English)**
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2.5 Topic 4 – Organisational development and support

OVERVIEW		
Number (of the topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
4	11 h / 14 h	Know & Shows How
Content	Description	Method
Change Management Theory	<ul style="list-style-type: none"> Phases of change from an individual and entrepreneurial perspective Reactions to change and strategies for coping Five colours of change theory 	Frontal teaching & discussion
Impact Change (with Design Thinking)	<ul style="list-style-type: none"> Concept and phases of Design Thinking Go through the phases of Design Thinking to design a change-facilitating strategy 	Frontal Teaching & Group work

2.5.1 General description

Empowering female leadership as a career counsellor or an HR professional will lead to (partly) renewed organisational perspectives and routines. Knowing how to foster change processes positively is essential know-how for guidance professionals. The topic of *organisational development and support (4)* gives insight into the impact of those change processes on organisations and the people within. For this, change management theories, such as the model of Kotter or the five colours of change, describe possible organisational reactions and prejudices to change toward female empowerment. After introducing theories and models, participants also learn about the concept of Design Thinking. Not only do they learn about the Design Thinking theory, but they also use the Design Thinking concept to design a personal facilitating strategy for dealing with change conditions in their specific organisational context.

By elaborating on a method to impact change positively, participants acquire change management skills and skills to facilitate as guidance professionals.

2.5.2 Content description

No.	Content title	Scope
4.1	Change Management Theory	180 min
What is it about?		
<p>This part of the upskilling programme presents selected theories and models to explain the impact of changes on organisations. Although those originate from a business context, the effects can be transferred to the changes induced by empowering digital female leadership through counselling. The trainer first presents the theoretical foundations and meanwhile translates these in a joint discussion into the specific context of the DIGIGEN project.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Understand the importance of addressing change impacts on organisations 2. Learn about the perspectives on phases of change 3. Understand the subliminal nature of most reactions to change 4. Learn about the types and phases of reactions to change and how to handle them as a guidance professional 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (Reader “Change Management”) ▪ PowerPoint/Presentation (trainer’s material); <i>additions by the trainer optional</i> 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Kotter, J. P. (2012). <i>Leading Change</i>. Boston: Harvard Business Review Press. (English) ▪ Kotter Inc. https://www.kotterinc.com/methodology/8-steps/ (English) ▪ Lauer, T. (2023). <i>Change Management. Fundamentals and Success Factors</i>. Wiesbaden. Springer Gabler. (English) ▪ Vahs, D. & Weiland, A. (2020). <i>Workbook Change Management. Methoden und Technik</i>. Stuttgart: Schäffer-Poeschel. (German) ▪ Farkas, F. (2013). <i>A változásmenedzsment elmélete és gyakorlata</i>. Budapest: Akadémiai Kiadó Zrt. (Hungarian) ▪ De Caluwe, L. & Vermaak, H. (2019). <i>Leren veranderen, een handboek voor de veranderkundige</i>. Deventer: Vakmedianet (Dutch) ▪ Poell, R., & Kessels, J. (2021). <i>Handboek human Resource development: Organiseren van het leren</i>. Lannoo Meulenhoff-Belgium. (Dutch) 		

No.	Content title	Scope
4.2	Impact Change (with Design Thinking)	480 min
What is it about?		
<p>This part of the upskilling programme presents and practises the method of Design Thinking. After learning about the basis of Design Thinking, participants take part in an actual design thinking process. For each Design Thinking phase, they first learn about the meaning of this phase and then work in groups on this particular phase. After undergoing all phases, participants pitch their final product/outcome.</p> <p>In this up-skilling programme, Design Thinking faces the problem of designing a facilitating strategy for guidance professionals to influence change processes while empowering female leadership.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Learn about the method of Design Thinking 2. Learn about each phase of the Design Thinking process 3. Go through all phases and practice the relevant methods while learning about the process (this is supposed to be an actual design thinking workshop) 4. Pitch the solution found during the practical exercise 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheet for the Design Thinking methods (Reader “Design Thinking”) ▪ Design Thinking material: post-its; pencils/eddings; scissors; flipcharts; enough space/big room; music; ... ▪ PowerPoint/Presentation (trainer’s material); <i>additions by the trainer optional</i> 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Design Thinking Tools https://designthinking-methods.de/ (German & English) ▪ Lewrick, M; Link, P.; Leifer; L. (2018). Das Design Thinking Toolbuch. Die besten Werkzeuge & Methoden. München: Vahlen. (German) OR (2020). The Design Thinking Toolbox. A guide to mastering the most popular and valuable innovation methods. Hoboken: Wiley. (English) ▪ Degraff, Jeff; Degraff, Stanley.; (2020). A kreatív gondolkodás eszköztára – Az innovációt elősegítő hat készség elsajátítása. Budapest, Pallas Athéné Könyvkiadó Kft. (Hungarian) ▪ Design Thinking https://designthinkingmethode.nl/design-thinking-methode/ (Dutch) ▪ Dekkers, T den (2019) Design Thinking, Noordhoff, Groningen/ Utrecht. (Dutch) 		

2.6 Topic 5 – Professional counselling

OVERVIEW		
Number (of the topic)	Workload (face-2-face/self-learning)	Taxonomy-level (Miller's taxonomy)
5	13 h / 30 h	Knows How & Does
Content	Description	Method
Introduction	<ul style="list-style-type: none"> A short introduction to counselling as a science An introduction to problem-based learning and explaining the task/case studies 	Frontal teaching
Case Studies	<ul style="list-style-type: none"> Problem-Based Learning with Case Studies 	Group work
Discussion	<ul style="list-style-type: none"> Discussing the societal impact of female leadership 	Discussion

2.6.1 General description

This Topic, *professional counselling (5)*, is the most important part of the up-skilling programme. In this topic, participants learn how to implement all the previous content of the foregone topics (Topic 1 to Topic 4) and integrate these with scientific and practical counselling approaches. Hence, Topic 5 deals with two subtopics: the *scientific approaches* and the *practical approaches*. To create the most valuable learning experience, participants work with four different case studies through problem-based learning. To provide a better understanding of problem-based learning, this topic's description is supplemented with theoretical background (see chapter 1.3).

As for now, participants acquaint *themselves* with the fundamental idea of each theory and then go into depth with the theories needed for their counselling problem/situation (a case study). To get acquainted, there are overview presentations, "PBL-Scientific approaches" and "PBL_Practical approaches"; to get into depth, there are the PBL-libraries, "Library_Scientif approaches" and "Library_Practical approaches", which contain articles and scripts on several counselling theories.

2.6.2 Content description

No.	Content title	Scope
5.1	Introduction	60 min
What is it about?		
<p>The introduction to topic 5 emphasises the importance of counselling as a field of science. Also, it introduces the importance of a holistic view of the counselee/client. Besides these introducing ideas, the main focus is to explain the concept of problem-based learning and introduce the participants to the task of this topic. Instructions on time, group constellations, respected outcomes, etc. must be given.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Recognise counselling as a science field and holistic approach 2. Explain the learning method of problem-based learning 3. Explain the interactive task of working on case studies 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ PowerPoint/Presentation (trainer's material); <i>additions by the trainer optional</i> 		
Resources and Literature		
<p>The primary resource for this part of the up-skilling programme is the Problem-Based Learning Library.</p>		

No.	Content title	Scope
5.2	Case Studies	660 min
What is it about?		
<p>This part of Topic 5 is the core element. Participants work with four case studies that deal with different aspects of counselling female digital leaders. The focus lies in letting participants work and think for themselves and provide guidance and input only if needed. Therefore, chapters 2.6.3 and 1.3 give very detailed instructions on how to implement this part of the up-skilling programme in the sense of problem-based learning.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Hand out/digitally provide the case studies and materials to the participants. 2. Participants get acquainted with the cases. 3. Participants figure out their individual counselling solutions for each case. 4. Participants present their solutions to each other and discuss the results. 		

Preparations and Materials

- (Printed) Scientific and practical application approaches (2 Overview Presentations)
- (Printed) Case Studies and Instructions (Reader)
- (Printed) Articles and Documentations (Problem-Based Learning Library)

Resources and Literature

The primary resource for this part of the up-skilling programme is the Problem-Based Learning Library.

For scientific approaches, these are:

1. Personality typology approach
2. Developmental career theories
3. A constructivist view on professional development
4. Professional decision-making as a social learning process
5. Social Cognitive Career Theory
6. Theory of Work Adaptation
7. Concept of Protean Career
8. Career decisions as a cognitive information process
9. Basics of Operative Counselling
10. Egan's problem management counselling model
11. Solution-oriented counselling
12. Information Structural Methodology as operative

For practical approaches, these are:

1. Introduction: resistance
2. Neuropsychology. How the brain works
3. Circle of influence & Social cultural theory of cognitive development
4. Mindset
5. From Drama Triangle to Winners Triangle
6. Influence of the Undercurrent
7. Core Qualities of Ofman
8. Stage of behavioural change
9. Theory U
10. Appreciative Inquiry / Positive Psychology
11. Motivational interviewing
12. Change language / Reframing thoughts

No.	Content title	Scope
5.3	Discussion task	60 min
What is it about?		
<p>Topic 5 closes with a summarising discussion task on an article by <i>Columnist Anne-Marije Buckens</i>, discussing whether society is ready for female leadership. Participants read the statement and discuss their opinions on this matter.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Participants read the article. 2. Participants discuss the article and collect their points of view. 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ PowerPoint/Presentation (trainer’s material); <i>additions by the trainer optional</i> ▪ Article by Anne-Marije Buckens (Reader) 		
Resources and Literature		
<p>The primary resource for this part of the up-skilling programme is the Problem-Based Learning Library and the article (see Reader).</p>		

2.6.3 Case Studies

The case studies help participants to apply and integrate the scientific and practical approaches for career counselling, coaching and mentoring and the content of all previous modules to real-life cases that illustrate the special needs of women in management positions under consideration of digitalisation and the consequences this has for the counselling approach of the career professional. Starting with four different stories that each illustrate a dimension of a balanced scorecard featuring the dimensions *strategic – operational* and *personal – organisational*. Participants learn by working with case studies presenting various counselling situations. These case studies are based on and, therefore, deal with the following counselling problems:



Figure 4: Balanced Scorecard presenting the four cases.

By elaborating on the case studies, students explore and learn about the following aspects of professional counselling:

- *Scientific Approaches*: object theories and operative theories in career decision making; practical implications on empowering the coachee
- *Practical Approaches*: practical components of effective counselling

All case studies are documented in the participant's reader.

COMMENTS ON CASES FROM A COUNSELLING PERSPECTIVE

This section briefly overviews matching approaches for each case. ! Please note: operative theories apply to every case because they describe the counselling process and type of interaction!

Case Anna

CEO for Information and Communication Technology company; 40+

1. the growing importance of AI is an ever-greater challenge for the industry
2. Anna's company must keep pace with this development; otherwise, it will not be able to maintain its market position
3. in this situation, Anna has doubts about her ability to make the right strategic decisions
4. she may lack the necessary knowledge
5. her male colleagues seem more confident
6. against this background, she asks herself whether she is the right person to align the company with this new development
7. how can she overcome this uncertainty about the right strategy for her company?

CONTEXTUAL HINTS:	EMOTIONAL HINTS:	PROCESSUAL HINTS:
1, 2, 4, 5	3, 6, 7	4/5, 6, 7,
Scientific Approaches:	Developmental career theories (2), Life-Design (3), Social Cognitive Career Theory (5), Theory of Work Adjustment (6), Protein Career (7), Information Structural Methodology (8)	
Practical Approaches:	Mindest (4), Drama Triangle (5), Influence of the Undercurrent (6)	
Other:	Change Management (Topic 4)	

Case Fatima

Professional specialised in HR services in SME; 40

1. she is an operational manager in a medium-sized production company with about 500 employees.
2. her ambition is to digitalise the production processes and
3. to motivate the employees to support the associated changes actively.
4. but so far, she feels strong resistance from the employees. She sees reasons for this in their limited digital skills, fears of change, and job loss.
5. How can she overcome these challenges and successfully advance the digital transformation?
6. And how can she give new impetus to her career and succeed as a manager?

CONTEXTUAL HINTS:	EMOTIONAL HINTS:	PROCESSUAL HINTS:
1, 3, 4	2, 3, 5, 6	2, 4, 6
Scientific Approaches:	Personality typology approach (1), Developmental career theories (2), Life-Design (3), Theory of Work Adjustment (6), Protein Career (7), Information Structural Methodology (8)	
Practical Approaches:	Social cultural theory of cognitive development (3), Stages of behavioural change (8), Theory U (9), Appreciate inquiry (10), Motivational Interviewing (11)	
Other:	Change Management (Topic 4)	

Case Imara

HR advisor at a large retail company; 50+

1. in the Finance & Administration Department, she worked her way up to become a manager.
2. she has 30 years of professional experience.
3. now, digitalisation is the top priority for the managers.
4. that means all activities within her department are to be digitalised.

5. but both she and her team feel both overwhelmed and incompetent by this.
6. they have little confidence in these digital solutions.
7. How can she lead a team that does not support her decisions, especially since she has her own doubts?
8. "Am I the right person for this role?"
9. "Can my team and I learn to accept the digital transformation or
10. is there a need for me to look for something else?"
11. In the latter case: "What restrictions in the job search should I expect given my age (50+)?"

CONTEXTUAL HINTS: EMOTIONAL HINTS: PROCESSUAL HINTS:

1, 2, 3, 6, 11

4, 7, 8/9/10, 11

5, 6, 11

Scientific Approaches: Personality typology approach (1), Developmental career theories (2), Life-Design (3), Social Cognitive Career Theory (5), Protein Career (7)

Practical Approaches: Core qualities (7), Circle of influence (3), Influence of the Undercurrent (6), Change level language & thoughts (12)

Case Sophia

Project manager at Innovatech Solutions; 28

1. she is a project manager for Innovatech Solutions and
2. participates in a management development trajectory.
3. She is said to be a successful and talented Project Manager.
4. but now she is faced with an important decision regarding her future career because
5. she has numerous options, including (1) a senior role in her current company or (2) a specialisation in digital strategy & consultancy outside her current company.
6. the choice situation is causing her considerable stress.
7. on top of that, the envy of her colleagues is getting to her.
8. "How should I continue my career and give it new momentum?"
9. "and how can I prevent the envy and negative rumours of others from influencing my decision?"

CONTEXTUAL HINTS: EMOTIONAL HINTS: PROCESSUAL HINTS:

1, 2, 3

4, 5, 6, 8/9

6/7, 8/9

Scientific Approaches: Personality typology approach (1), Developmental career theories (2), Life-Design (3), Theory of Work Adjustment (6), Protein Career (7)

Practical Approaches: Stages of behavioural change (8), Theory U (9), Appreciate inquiry (10), Motivational Interviewing (11), Change level language & thoughts (12)

2.7 Final reflection

OVERVIEW		
Number <i>(of the topic)</i>	Workload <i>(face-2-face/self-learning)</i>	Taxonomy-level <i>(Miller's taxonomy)</i>
Final reflection (9)	2 h / 2 h	Knows
Content	Description	Method
Context of a digital guidance professional	<ul style="list-style-type: none"> ▪ Digital HR and counselling ▪ Counselling ethics ▪ (Self-)Controlling in counselling ▪ Networking and marketing 	Frontal teaching and discussion
Final Reflection	<ul style="list-style-type: none"> ▪ Reflecting on the whole up-skilling programme 	Frontal teaching

2.7.1 General description

The final section of the programme, the *final reflection*, is characterised by an overview of a guidance professional's context and a summary of the main contents and their interrelationships in the context of the challenges described in the introduction. Here, particular reference is also made to a possible solution approach of the VUCA framework and how our Counselling approach would fit into such an approach. As a conclusion, an evaluation of the program will be carried out, which should first lead to an open discussion and an invitation to evaluate the program anonymously.

! If needed, there is an option to (again) take a self-evaluation test for participants on the DIGIGEN website. This test helps identify the learner's achievements after finishing the up-skilling programme. Especially if taken at the beginning of the up-skilling programme beforehand, the self-evaluation might help to compare the knowledge gained !

2.7.2 Content description

No.	Content title	Scope
9.1	Context of a digital guidance professional	90 min
What is it about?		
<p>This part of the final reflection briefly overviews contextual topics for guidance professionals. It will help participants to understand and utilise their professional situation in its setting. The mentioned aspects are a starting point for ongoing individual thoughts about creating and designing a suitable working situation to foster female leadership.</p>		
Timeline		
<ol style="list-style-type: none"> 1. Digital HR and digital counselling 2. Ethical guidelines for counsellors 3. Controlling in a counselling profession 4. Networking for guidance professionals 		
Preparations and Materials		
<ul style="list-style-type: none"> ▪ Fact sheets on the presented theories (Reader) ▪ PowerPoint/Presentation (trainer's material); <i>additions by the trainer optional</i> 		
Resources and Literature		
<ul style="list-style-type: none"> ▪ Reeves, A.; Bond, T. (2021). Standards and Ethics for Counselling in Action (5. Ed.). London: Sage. (English) ▪ Ertelt, B.-J.; Scharpf, M. (2021). Beratung und Controlling. Wiesbaden: Springer Gabler. (German) ▪ Petry, T.; Jäger, W. (2021). Digital HR. Smarte und agile Systeme, Prozesse und Strukturen im Personalmanagement (2. Ed.). Freiburg/Stuttgart/München: Haufe. (German) ▪ Poór József.; (2017) Menedzsment-tanácsadási kézikönyv. Budapest: Akadémiai Kiadó. (Hungarian) ▪ Reekers, M. Spijkerman, R. (2023) Professionele gespreksvoering, 3-e herziene editie Pearson Benelux BV. (Dutch) ▪ Donders, W. Ruijs, L. (2022) Coachende gespreksvoering, Boom. (Dutch) ▪ Dols, R. (2020) Professionele loopbaancoaching, 3-e herziene editie. (Dutch) 		

No.	Content title	Scope
9.2	Final reflection	30 min

What is it about?

This serves as a way for participants to summarise individual learning as well as understand a larger context. Here, the challenges raised in the introduction are directly referred to again and a solution approach for the VUCA framework is presented. This solution approach is then specifically related to the individual components of the Upskilling program. Finally, the program is evaluated in a final round, which is designed as an open feedback round. In addition, an anonymous evaluation of the program will be requested.

Timeline

1. In a nutshell: the key aspects of the programme in a challenging work-life environment.
2. How vision, understanding, clarity and agility can be an answer to the VUCA-Framework and related challenges.
3. Open feedback; *eventually with self-evaluation on the DIGIGEN website*
4. Anonymous evaluation of the programme; *e.g., on the DIGIGEN website*

Preparations and Materials

- Fact sheets on the presented theories (Reader)
- PowerPoint/Presentation (trainer's material); *additions by the trainer optional*
- Evaluation sheets; on the DIGIGEN website

Resources and Literature

- DIGIGEN-Website: digi-gen.eu **(English, German, Hungarian, Dutch, Lithuanian)**
- DIGIGEN materials (and literature listed within):
 - Literature Review **(English)**
 - Literature Review Summary **(English, German, Hungarian, Dutch)**
 - Needs Analysis **(English)**
 - Needs Analysis Summary **(English, German, Hungarian, Dutch)**

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