# New Opportunities for the Development of Education at the Technical University of Liberec

Specific objective A2: Development in the field of distance learning, online learning and blended learning

NPO TUL MSMT-16598/2022



# Methodology for Virtual Mobility – part 2

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#### TECHNICKÁ UNIVERZITA V <u>LIBERCI</u>











"Developing international experience for students through virtual mobility"



# SELECTED TOPICS OF BUSINESS PLANNING AND CONTROLLING IN INTERNATIONAL CONTEXT

Course: BUSINESS PLANNING AND CONTROLLING Author: Ing. Zdeněk Brabec, Ph.D.

Department of Finance and Accounting, Faculty of Economics, Technical University of Liberec Methodology Steps for Implementation of Virtual Mobility









## 1 SELECTED TOPICS OF BUSINESS PLANNING AND CONTROLLING IN INTERNATIONAL CONTEXT

#### A. Before the Virtual Mobility

This part of the Methodology Guide specifies steps that have to be taken before the entire Virtual Mobility (VM).

#### STEP 1: SPECIFICATION OF THE VIRTUAL MOBILITY TOPIC

### SELECTED TOPICS OF BUSINESS PLANNING AND CONTROLLING IN INTERNATIONAL CONTEXT

As a first step, it is necessary to specify the topic or general focus of virtual mobility.

#### Annotation of the virtual mobility:

Controlling represents a crucial tool in monitoring a company's performance and enabling the achievement of company goals. This virtual mobility enables students to test their knowledge in the field of controlling in the international context. The mobility is performed in two separate groups. One group is working with students from the Karelia University of Applied Sciences in Finland, and the other group will cooperate with students from the University of Applied Sciences Dresden. The students are divided into teams of about 6 to 8 people in each group. Each team consists of students from both countries to encourage the international perspective of virtual mobility. Both groups will solve some practical examples and then work together on particular case studies they will present online. To support the successful fulfilment of the given tasks, students will use online platforms provided by one or another partner university. In addition to that, cooperation on the given tasks should also help students strengthen their communication skills in an international context.









#### STEP 2: SPECIFICATION OF THE COURSES INVOLVED IN VM

Next, it is necessary to specify the courses involved in virtual mobility at home and partner universities.

#### Specification of the course/-s at FE TUL:

Name of the course: BUSINESS PLANNING AND CONTROLLING

Abbreviation: PPC, PPC-E, PPCIM Language of instruction: English

Expected number of students: about 30 - 40

Short annotation of the course:

The main objective of the course is to present the planning and controlling as management subsystems which in mutual interconnection support achieving business goals and long-term prosperity of the company. The course extends the theoretical and practical knowledge of students and explains the principles of planning processes at all hierarchical levels of the business entity, including the adherence to linkages between individual plans. Students are further familiarized with controlling as a comprehensive approach to cost management of the company.

#### **Summary of the Course:**

- 1. The Importance of Controlling in Company's Management
- 2. Cost Classifications
- 3. Methods used in Cost Management
- 4. Costing systems. Cost Assignments
- 5. Activity-based Costing
- 6. Methods of Strategically Oriented Cost Management
- 7. Methods and Principles of the Planning process
- 8. Financial planning (long-term, short-term)
- Prerequisites for Effective Departmental Management The Organizational and Economic Structure of a Company
- 10. Value Criteria used in Internal Responsibility Accounting
- 11. The Importance of the Planning Process for Company's management (Feedforward and Feedback)
- 12. Information Support of Controlling (Reporting as a Basic Tool)









#### Specification of the course/-s at partner university/-ies:1

Partner university 1: Karelia University of Applied Sciences

Name of the course: Cost and Profitability Calculation

Language of instruction: English

Contact person: Pertti Laitinen, MSc.

#### **Short annotation of the course:**

This course covers the fundamentals of financial statements, budgets and cost estimation. You will learn how to do production budget, material budget, direct labour budget, factory overhead, cost-of-goods sold, budget variances, estimation of factory overhead, operation estimating, product estimating, job order costing, process costing, and activity-based costing. As well as financial analysis as to check the financial health of a business & project in terms of balance sheet, the income statement, changes in owner equity, statement of cash flows, etc

Partner university 2: Hochschule Zittau/Görlitz/HTW Dresden

Name of the course: Corporate Planning & Management Control

Language of instruction: English

Contact person: Prof. Dr. Ingo Cassack

#### **Short annotation of the course:**

Management Control, Future business environments, Analysis of a concrete corporate entity, Tools of Management Control, Management Control of business models, innovation (e.g. design thinking processes) and value, Corporate planning in theory, Corporate planning of real-life entity, Elements of mindfulness in corporate decision-making

The students acquire professional competence in the tasks of management control with an emphasis on planning of corporate entities. Students apply those concepts in practical examples (methodological competence).

<sup>&</sup>lt;sup>1</sup> If there are more partner universities, please copy the box for each partner.









#### STEP 3: SPECIFICATION OF THE TARGET GROUPS

The target group of VM might be students of different educational levels, researchers, and academic/administrative staff. For this project, only students will be considered the target group; it is required to specify the study levels and programmes of involved students at both institutions.

#### Specification of the target group of students at FE TUL:

- International degree students study programme Business Administration,
   specialization Management of Business Processes 15 students
- Erasmus + students (mobility for one semester or one year) –10 students
- Double degree students study programme International Management, specialization
   International Management -11 students

#### Specification of the target group of students at partner university 1:

Industrial Management 15 students

#### Specification of the target group of students at partner university 2:

Master in International Business –30 students

#### STEP 4: SPECIFICATION OF THE TIME FRAMES

As a next step, it is crucial to agree with the partner on the time frame of realisation of the VM activities, suitable for both partners. When planning the VM, it is necessary to determine at the very beginning whether both potential courses are taught in the same semester and whether a suitable date can be found for the realisation of the VM at both institutions.









• FE TUL: Winter Semester of academic year 2023/24: from 18. 9. 2023 to 22. 12. 2023

Lectures: Tuesdays CZ time 8:50 – 10:20 – every week

Seminars: Tuesdays CZ time 10:40 - 12:10 - every second week

 Karelia University of Applied Sciences: Autumn Semester of academic year 2023/24: from 18. 8. 2023 to 16. 12. 2023

Lectures: every week (1,5 hours) – different days and times

Seminars: every second week (1,5 hours) - different days and times

 Hochschule Zittau/Görlitz/HTW Dresden: Winter Semester of academic year 2023/24: from 01.10.2023 to 26. 1. 2024

Lectures/Seminars: Fridays CZ time 17.00 –20.00 and upon special request and invitation

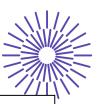
#### **Expected period of VM activities (Karelia University of Applied Sciences):**

- Online activity (Google meet):
  - Introduction of the virtual mobility an online meeting of all students beginning of October
  - o Students' introduction using the Padlet platform from
- Online and offline activity:
  - o Dividing students into groups
  - Calculating 4 examples (contribution margin, break-even point, traditional x
     ABC costing, profit planning)
  - Preparing a 10 minutes presentation about investing 100,000 EUR into shares of selected companies – students should provide information about dividends earned, changes of share prices etc. to justify their decisions
  - To fulfil these tasks students are expected to use whatever type of communication they prefer (e-mails, Google Meet, WhatsApp, etc.)
- Online activity (Google meet): Presentation of the second task "investing" an
  online meeting of all students dates dependable on the preparation for he
  students one or two meetings end of November or beginning of December









#### Expected period of VM activities (Hochschule Zittau/Görlitz/HTW Dresden):

- Online activity (Big Blue Button): Introduction of the virtual mobility an online meeting of all students – beginning of October – Friday 6th or 13th
- Online and offline activity: Students work on two tasks:
  - o Dividing students into groups
  - Calculating 4 examples (contribution margin, break-even point, traditional x
     ABC costing, profit planning) only the TUL subgroups
  - Preparing a presentation selected topic each student from the group should provide about a 5-minute presentation considering a selected subtopic
- Online activity (Big Blue Button):
  - Discussing the future topics or details of student's presentations, solving communication problems in teams – every Friday 17:00 – 18:30
  - Presentation of the second task an online meeting of all students: Corporate
    Planning and Management Control Topic presentation: dates dependable on
    the preparation for the students one or more meetings, each student should
    provide a presentation for about 5 minutes, Friday at end of Dezember or
    beginning of January

#### STEP 5: SPECIFICATION OF THE COURSE REQUIREMENTS

Both institutions have agreed that the VM implemented as part of this project will not be assessed as a separate course. Therefore, no extra ECTS credits will be awarded.

Nevertheless, each partner university has specific requirements for the courses selected for VM. After implementing the VM into the courses, the course requirements should be adjusted accordingly. Each partner university can decide on its own VM recognition within the course. The modified course requirements sometimes need to be approved by the guarantor or the institution, which must be kept in mind. New requirements need to be published for students in the university system in advance.









#### **Course requirements at FE TUL:**

#### **Original requirements:**

- Credit exam: Calculating 4 examples (contribution margin, break-even point, traditional x ABC costing, profit planning -each student itself
- Final exam: written test covering the areas of Business Planning and Controlling

#### **Modified requirements:**

- · Credit exam:
  - Calculating 4 examples (contribution margin, break-even point, traditional x
     ABC costing, profit planning in teams
  - Presentation of a project of a topic (differs in both partner universities) in
     Teams
  - Students' introduction using the Padlet platform (only students collaborating with Karelia university
- Final exam: written test covering the areas of Business Planning and Controlling

Name of the course guarantor: Ing. Zdeněk Brabec, Ph.D.

Approval by the guarantor: Y/N

#### **Course requirements at partner institution 1:**

#### **Original requirements:**

- Product costing and analysis
- Basics of accounting
- Basics of bookkeeping
- Taxation
- Investments
- Pricing
- Financial statement analysis

#### **Modified requirements:**

none

Name of the course guarantor: Ulla Asikainen

Approval by the guarantor: Y/₩









#### **Course requirements at partner institution 1:**

#### **Original requirements:**

- Compulsory paper + presentation (non-graded)
   1st element: non-graded, as an OBLIGATORY pre-examination performance/
   "Prüfungsvorleistung" (prerequisite for 2nd element): paper of 10 pages (plus presentation) ("Beleg") about analysis of a REAL WORLD COMPANY AB (e.g. John Deere)
- 2. Graded project
   2nd element: a graded project which consists of a aligned Corporate Planning and Management Control Topic or of a FINANCIAL PLAN/BUSINESS CASE of a COMPANY

#### **Modified requirements:**

none

Name of the course guarantor: Prof. Dr. Ingo Cassack

Approval by the guarantor: Y/₩

#### STEP 6: SPECIFICATION OF INTENDED ACTIVITIES BEFORE AND DURING VM

All participating institutions agreed that the VM implemented as part of this project would be short-term, online, and informal. However, some preparation for VM might be necessary before implementation. In this section, it is required to specify individual and group activities before and during VM.

#### **Activities before VM:**

#### Joint class activities before VM (at each institution):

- Online meeting with Mr. Laitinen discussing the content of the virtual Mobility
- Online meeting with Mr. Cassack discussing the content of the virtual Mobility

#### Students' individual activities before VM:

• thinking about selecting the colleagues into the teams









#### **Course activities during VM:**

#### Joint class activities during VM (online):

- Introduction of the virtual mobility an online meeting of all students beginning of October
- Calculating 4 examples (contribution margin, break-even point, traditional x ABC costing, profit planning in Teams (either only students in Liberec or international Teams depends on the partner university requirements)
- Presentation of a project of a topic (differs in both partner universities –
  investments (Karelia) and presentation of the selected topic (Hochschule
  Zittau/Görlitz) in teams
- Students' introduction using the Padlet platform (only students collaborating with Karelia university)

#### Offline activities during VM:

• Dividing students into groups (partly online – google disc)

#### STEP 7: SPECIFICATION OF PLATFORMS FOR EDUCATIONAL MATERIALS

This section specifies platforms for storing educational materials at both partner institutions.

#### The platform for storing educational materials at FE TUL:

• FE TUL – www.elearning.tul.cz

#### The platform for storing educational materials at partner universities:

- Karelia University of Applied Sciences Moodle
- Hochschule Zittau/Görlitz/HTW Dresden -ws2324 W338: Corporate Planning & Management Control - OPAL (sachsen.de)







# STEP 8: SPECIFICATION OF EXPECTED ONLINE (OFFLINE) TOOLS USED FOR VM

In this section, it is required to specify online tools used before and during VM.

#### Online tools and applications used before VM:

- FE TUL www.elearning.tul.cz, Google meet
- Karelia University of Applied Sciences Moodle, Google meet
- Hochschule Zittau/Görlitz/HTW Dresden -ws2324 W338: Corporate Planning &

#### Online tools and applications used during VM:

- FE TUL www.elearning.tul.cz, Google meet, google disc, Padlet
- Karelia University of Applied Sciences Moodle, Google meet
- Hochschule Zittau/Görlitz/HTW Dresden ws2324 W338: Corporate Planning & Management Control - OPAL (sachsen.de), Big Blue Button

#### Offline tools and applications used for VM (if any):

- FE TUL PowerPoint, Excel
- Karelia University of Applied Sciences PowerPoint, Excel
- Hochschule Zittau/Görlitz/HTW Dresden, Computer, Software

#### **STEP 9: TECHNICAL SUPPORT PROVISION**

For the success of VM implementation, suitable premises at both institutions and technical support should be provided to secure the virtual part. It is necessary to arrange both in advance.

#### Place of implementation of VM:

#### Place of implementation of VM at FE TUL:

Faculty of Economics

#### Place of implementation of VM at partner institution:

- Karelia University of Applied Sciences
- Hochschule Zittau/Görlitz/HTW Dresden

#### **Technical support during VM:**









• FE TUL - Ing. David Kubát, Ph.D., ING.PAED.IGIP, Ing. Igor Kopetschke

#### **Technical support of VM at partner institution:**

- Karelia University of Applied Sciences Karelia UAS Helpdesk
- Hochschule Zittau/Görlitz/HTW Dresden None

#### B. During the Virtual Mobility

#### STEP 10: REALISATION OF VIRTUAL MOBILITY

This section should only be completed after the implementation of the VM. The progress of the VM will be reported: whether everything went according to plan and whether any changes had to be made. Eventual modifications should be specified.<sup>2</sup>

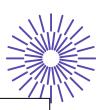
<sup>&</sup>lt;sup>2</sup> The box to be filled in can be expanded as needed.







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#### Realized VM activities (Karelia University of Applied Sciences):

- Online activity (Google meet):
  - Introduction of the virtual mobility an online meeting of all students:
     Friday 13th October CZ time 12:00 13:00 (FI time 13:00 14:00)
  - Students' introduction using the Padlet platform from https://padlet.com/zdenekbrabec/virtual-mobility-we53k6vemrjqmzsr
- Online and offline activity: Students work on two tasks:
  - o Dividing students into groups (TUL using google spreadsheet)
  - Calculating 4 examples (contribution margin, break-even point, traditional x
     ABC costing, profit planning)
  - Preparing a 10 minutes presentation about investing 100,000 EUR into shares of selected 5 to 10 companies on the basis of the analysis of their financial statements and calculating selected financial ratios – students should provide information about dividends earned, changes of share prices etc. to justify their decisions
  - To fulfil these tasks students are expected to use whatever type of communication they prefer (e-mails, Google Meet, WhatsApp, etc.)
- Online activity (Google meet): Presentation of the second task "investing" an online meeting of all students: Thursday 7th Dezember CZ time 11:30–13:00 (FI time 12:30 14:00)









#### Realized VM activities (Hochschule Zittau/Görlitz/HTW Dresden):

- Online activity (Big Blue Button): Introduction of the virtual mobility an online meeting of all students: Friday 6th October 17:00 – 18:00
- Online and offline activity: Students work on two tasks:
  - o Dividing students into groups (TUL using google spreadsheet)
  - Calculating 4 examples (contribution margin, break-even point, traditional x
     ABC costing, profit planning) only the TUL subgroups
  - Preparing a presentation selected topic each student from the group should provide about a 5-minute presentation considering a selected subtopic
- Online activity (Big Blue Button):
  - Discussing the future topics or details of student's presentations, solving communication problems in teams – every Friday 17:00 – 18:30
  - Online activity (Big Blue Button): Presentation of the second task an online meeting of all students, each student should provide a presentation for about 5 minutes: FRIDAY - Corporate Planning and Management Control Topic presentation:
    - 15th Dezember 17:00 18:00
    - 22nd Dezember 17:00 18:00
    - 12th January 17:00 18:00

#### Topics:

- Budgeting,
- Business Planning and Controlling in Company LUSH,
- Kahneman Planning Fallacy,
- Strategic Planning,
- KPI,
- New Trends in Corporate Planning and Management Control

#### STEP 11: ADMINISTRATIVE PROVISION OF VIRTUAL MOBILITY

VM within this project must also be registered administratively within the institution. This section should include how the VM was administered and who was the responsible person.









#### Administrative support and provision of VM:

#### Administration of VM at FE TUL:

• Ing. Lenka Bořková, Ing. Lenka Benešová, Ph.D.

#### Administration of VM at partner institution:

- Karelia University of Applied Sciences Head of Industrial Management Ulla Asikainen
- Hochschule Zittau/Görlitz/HTW Dresden None

#### C. After the Virtual Mobility

#### STEP 12: EVALUATION OF VIRTUAL MOBILITY

This section is devoted to VM evaluation. The evaluation of VM should be provided by teachers from all participating institutions. Students' assessment of VM will take place in the form of a poll.<sup>3</sup>

#### **Evaluation report of VM from the point of view of FE TUL:**

(short report provided by the FE TUL teacher)

After solving several problems concerning creating teams and establishing communication between the teams in Liberec and the partner universities, the VM can be considered successful. The students learned to cooperate in international teams to successfully complete the given tasks, which should provide them with the skills necessary in today's global economy. They also learned to deal with colleagues who have different cultural backgrounds. Students also improved their interpretation skills when presenting either their selected topic or their investment decisions. As a teacher, the VM was also helpful in improving my coordination skills and learning the differences in teaching methods and students' attitudes to learning in different countries.

<sup>&</sup>lt;sup>3</sup> The boxes to be filled in can be expanded as needed.







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#### Evaluation report of VM from the point of view of the partner university's teacher:

(short report provided by the partner university's teacher)

- Karelia University of Applied Sciences
  The virtual mobility was successful. There was excellent cooperation between the
  teachers in the participating Universities. The tasks given to the students to do in
  the Virtual Cooperation were quite demanding. The cooperation between the
  students in the participating Universities was fluent and they were committed to
  achieve results. The reports the students made were analytical and the online
  presentations professional and informative. The virtual cooperation brought an
  additional level of learning to the course of Cost and Profitability Calculation.
- Hochschule Zittau/Görlitz/HTW Dresden
   Work with CZ Colleagues especially Zdenek Brabec from TUL was excellent. I would not hesitate to do it again.

#### If available, provide an evaluation of VM from the student's point of view (poll results):

N/A		





