Course Analysis

MF2086 Research Methodology in Management and Organization, 6 cr

Spring 2019

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1   Course information

The course in research methodology is a practical course in learning to use the most prevalent approaches techniques and methods that are applied in qualitative and quantitative research. Students will become skilled in utilizing these methods appropriately in practical research situations of different nature. Learning will be based on their own research activities where students will formulate their own research questions and proposition, search and evaluate past research, design interview questions, find interviewees, conduct interviews, transcribe, code and analyze text, document results and make conclusions for quantitative research. In continuation, students will make hypotheses, design survey items to test hypotheses, distribute surveys to respondents, post-process response data, form variables, visually analyse survey data, statistically analyse and interpret survey data, make conclusions based on analyses for further research, and to compare the utility of different research methods for different research situations and objectives.

In the course, seminars are also carried out, where the research activities and outcomes are discussed and critically reviewed. Comparisons and evaluation reports are also written for the enhancement of research activities.

Course responsible teacher:
Jens Hemphälä

Other teachers in the course:
Susanne Nilsson and Rafael Laurenti

Examiner:
Gunilla Ölundh Sandström

Learning activities:
The course is carried out in smaller groups and individually where all the students work on a general research topic and where each group focus on a separate sub-topic.

The students lead and execute the research project while learning about and practicing the use of the applied research methods and discussing their respective strengths and weaknesses.

Additional Comments

2 Students' view of the course

Summary of students´ view of the course based on for example LEQ survey and/or interviews or other activities.

Response rate of LEQ or equivalent course evaluation survey: 10/60 students

Brief summary of students' responses from the LEQ survey and/or other types of course evaluation:

The course feedback reveals some of the main challenges in the course. Statistics is a challenging topic for a number of students. This pertains to the subject of statistics, that about half the students have very little or no experience of, as well as the software tool used for the statistics which is based on coding – a topic that is also not in focus for those lacking statistics. The methods used in the course build on each other in a way that is challenging to understand, i.e. how they relate to each other, especially the coding is problematic to understand. There is an overlap between course elements and previous courses. The workload is also distributed towards the end of the course – something that is the case for all three mandatory spring courses for the students in the Innovation Management and Product Development Track.

3 Teacher analysis of the course

The analysis should present the development of the quality of the course as well as measures that have been taken after previous course analysis. The course's strengths and weaknesses based on the course evaluation and the teacher's reflection.

Course context

In comparison to a number of other research-oriented courses at KTH, the present course has a higher degree of skill-based learning objectives. At the same time, the number of students is the largest or one of the largest in the master's programme Integrated Product Development. Size alone is factor that should be considered for the particular set-up of practical activity-based learning that the course is designed for. While size is less of an issue for more traditional courses, the more activity-based learning the course contains the more size becomes an issue.

Adding to the challenge of size, the students in the course are also the most heterogenous of the courses in the master's programme Integrated Product Development. Students come from two different programmes at KTH – the CDEPR programme and the CMAST programme and they attend the second term of two different master's programme tracks – the Industrial Design Engineering Track and the Innovation Management and Product Development Track. This heterogeneity makes the students have very different prior skills. For instance, one programme totally lacks knowledge of statistics and has a lesser focus on coding in their Bachelors.

Changes of the course before this course offering

The statistical part of the course is challenging, especially for the students that have no prior knowledge in this. Efforts have been made to strengthen the pedagogy on this topic.

The most recent changes in the course has been focused on making the different parts of the course part of a general research journey. The first versions of the course treated different research areas in the qualitative and quantitative parts pending on the research maturity in each respective area. While making the research contributions more valuable within each research field, it made the research parts less connected to each other and more difficult for novice students to connect. Hence, the qualitative and quantitative activities was later made to build on each other within the same topic.

Several courses that the students attend (different ones for different students) contain the application of data collection methods. The students confuse these with proper research methods. Continuous work is made to delineate different methods and uses of methods from each other.

The course's strengths (based on the students' experiences and the teacher analysis):

The course is valued by several students as it goes deeper into research and equip them with the tools to do it themselves and to be able to interpret the research of others in a more qualified manner. The continuous work that has been done and continues to be done has improved the course and made the challenging areas lesser obstacles for student learning.

Areas for improvement of the course (based on student experiences and teacher analysis)**:**
- The statistics and the used software

- Delineate different methods and uses of methods in other course from research methods

- Integrate the various course activities into a research journey

Proposed changes to the next course round:

For the next round of the course we will improve the course setup and the learning activities corresponding to the areas above.

Additional Comments