# Social Science Methods for Journalists (10 ECTS)

#### **Erasmus Mundus**

# Course teachers:

Emily Bech (coordinator) – ecbech@ps.au.dk Anthony Kevins – akevins@ps.au.dk Matt Loftis – mattwloftis@ps.au.dk

#### Objectives/aims

The course focuses on improving the students' methodological understanding and skills. During the course students will be taught to: (1) assess methodological aspects of social science studies and journalistic presentations; (2) frame questions and develop research designs; (3) assess, select and apply different methods for cross-sectional, case-comparison and case-based study designs and analyses; and (4) make presentations of study results and statistics.

Classes will be a mixture of lectures, group assignments, presentations and discussions.

# **Intended Learning Outcomes**

**Understanding:** 

- Understand the logic of empirical social science research strategies
- Understand the criteria for sound empirical social science research
- Understand the strengths and weaknesses of different empirical social science research strategies

#### Skills:

- Frame empirical research questions
- Plan research designs to test empirical questions
- Select and analyze collective study units (cases) such as countries, municipalities, media organizations, schools etc.
- Plan and complete gathering of interviews, existing documents, questionnaires and existing quantitative data
- Perform inductive coding, deductive coding and content analysis of text material
- Perform univariate, bivariate and multivariate analyses of quantitative data

• Interpret simple analyses based on probability theory

#### Competences:

- The ability to critically evaluate various empirical social science research strategies
- The ability to assess the validity of concrete examples of empirical social scientific research

#### Method of Assessment

In order to be able to hand in the final essay students must have been participating in the course. The final exam is an individual 3-day (72 hour) take-home written exam based on a set question; aids are allowed. The scope of the assignment is 6-7 pages (of 2400 characters incl. spaces per page) including appendices and notes but excluding table of contents and bibliography.

The exam will take place December 13-16, 2016.

(3-day take-home exam, to be turned in via online exam platform)

#### **Content and Organization:**

The course content is organized into 11 modules that cover the following topics: construction of research questions and choice of research design; case selection and comparative methods; quantitative data sources and data collection; univariate, bivariate and multivariate quantitative data analysis; introduction to statistical inference; qualitative data sources and data collection; inductive and deductive coding; content analysis; and qualitative data analysis using displays; and multi-methods research.

All students will attend the lectures together. For the discussion classes, students will be divided into four classes of about 20 students each. Within each class, students have been assigned to four study groups. The groups will be posted on the course page on Blackboard in the excel-sheet "Discussion classes and study groups" in the folder "Course information."

The first two lectures will take place on September 15 and 22. After that, lectures will take place on Mondays, and discussion classes on Thursdays. The course workload will be demanding, and students will find that they must follow all lecture and discussion class materials and assignments closely in order to sufficiently prepare for the exam. See the separate schedule document on Blackboard for times and class locations.

Please note, however, that last minute changes may occur, and that you should keep yourselves updated via the timetable website: <a href="http://autumnschedule.au.dk/en/">http://autumnschedule.au.dk/en/</a>. Search under the education 'Journalism and Media, kandidat,' and your courses will be displayed there.

## Student preparation for classes

This is a hands-on course. Its learning outcome is based on active student participation. In the discussion classes, students will present their assignment results for each other – online and in discussion classes. If students have not prepared for the discussion, neither they nor their fellow students will be able to benefit from the classes. It is necessary to attend to the lectures in order to be able to prepare the work for the discussion classes. Moreover, in order to benefit from the lectures, reading beforehand is mandatory. If students do not read, they cannot meet the requirements for active participation.

#### Readings

A detailed program for the course and a full list of readings will be uploaded on the course page on Blackboard before the course starts. We ask students to buy the textbook for the course now so that they will have it in time for the beginning of the classes. The textbook for the course is:

David, Matthew & Carole D. Sutton (2011) *Social Research. An Introduction* (2<sup>nd</sup> ed.). Thousand Oaks & New Delhi: Sage Publications.

Please buy the second edition (2011) as all readings will be assigned based on this edition. In addition to the textbook, we will upload further readings in the form of scholarly articles and book excerpts on Blackboard's course page. And further, students are expected to download texts available from the AU library database or from public web pages directly. In this course description and on Blackboard, readings are indicated to be accessible from several sources, as follows:

- B textbook by David and Sutton
- # -- book excerpts available as PDF files in Blackboard documents section
- @ -- research article available through AU library website(or other web resource, where noted)

Please note that, in order to access course texts available from the library, you will either need to access the AU library website through an on-campus web connection, or to log in with your AU profile.

#### Course page on Blackboard

The chief means of communication for the course is the course site on Blackboard. The name of our main course page is "E16 - Social Science Methods for Journalists - Forelæsning." You should already be enrolled as a course user in Blackboard. If you cannot see it in your available courses, please email Emily Bech (<a href="mailto:ecbech@ps.au.dk">ecbech@ps.au.dk</a>).

## Case material for the Study Groups and the Discussion Classes:

The project assignments and practical exercises for each discussion class of each module will be uploaded on Blackboard in the folder "Group exercises." PLEASE NOTE: read the description of the exercises carefully. In addition to the readings listed above, there may be supplementary appendices which are necessary to read in order to be able to solve the exercises.

# **Block 1: Research Designs and Comparative Methods**

# Module 1: Research Questions and Research Designs

Lecturer: Emily Bech

NO DISCUSSION CLASS, GROUP EXERCISE TO BE TURNED IN ON BLACKBOARD.

Upload deadline: 9:00 p.m., Sunday, September 18.

## **Objectives:**

After this module, students should have knowledge of the basic principles of scientific research and they should know why and how we apply empirical methods. The students should know key elements in developing a research question and be able to formulate a research question that can be tested empirically. The students should be able to choose a research design (experiment, cross-sectional study, longitudinal study, comparative study, or single case study) and a research strategy (quantitative and/or qualitative). Finally, the students should also have knowledge of the distinction between inductive and deductive research strategies.

# **Topics:**

- What are social science methods?
- Empirical research questions
- Research designs choosing a research design
- Inductive and deductive research strategies

- B David, Matthew & Carole D. Sutton (2011). Chapter 1: Getting started: Theory, Research Question and Research Design, pp. 3-19 in *Social Research*. An Introduction. Thousand Oaks & New Delhi: Sage Publications (17 pages).
- # Halperin, Sandra & Oliver Heath (2012). Chapter 6: Answering Research Questions: Requirements, Components, and Construction, pp. 144-148, in *Political Research. Methods and Skills*, Oxford: Oxford University Press (5 pages).
- *B* David, Matthew & Carole D. Sutton (2011). Chapter 4: Theory and Research: Quality and Quantity, pp. 81-98 (18 pages).
- *B* David & Sutton (2011). Chapter 13: Hypotheses, operationalization and variables, pp. 216-221 (6 pages).
- # Halperin, Sandra & Oliver Heath (2012). Chapter 7: Research Design, pp. 164-178, in *Political Research. Methods and Skills*, Oxford: Oxford University Press (14 pages).

# Module 2: Research Criteria: Case Selection and Data Sampling

Lecturer: Anthony Kevins

NO DISCUSSION CLASS, GROUP EXERCISE TO BE TURNED IN ON BLACKBOARD

Upload deadline: 9:00 p.m., Sunday, September 25.

# **Objectives:**

After module 2, students should be able to (1) choose a single case to study, or a number of cases to compare, in order to investigate a given empirical research question adequately; (2) to plan the analysis of the case(s) chosen; and (3) to judge the validity, the reliability and the replicability their own study as well as others' studies, and to identify the ethical problems often facing social research.

#### **Topics:**

- Criteria of good social research
- Units of study, Population vs. cases/observations
- Logic and forms of case selection
- Logic and types of sampling
- Validity, reliability

# **Readings:**

- *B* David, Matthew & Carole D. Sutton (2011) *Social Research. An Introduction*. Thousand Oaks & New Delhi: Sage Publications. Pp. 43-53 (Research Ethics); 165 178 (Case Study Research).
- # George, Alexander L. & Andrew Bennett (2005). Case Studies and Theory Development in the Social Sciences. Cambridge: MIT Press. Pp. 67-86.
- # Gerring, John (2007). *Case Study Research. Principles and Practices*. Cambridge: Cambridge University Press. Pp. 131 145.

BDavid & Sutton (2011). Chapter 14: Sampling, pp. 225-238 (14 pages)

- @ Lohmann, Susanne (1994). "The Dynamics of Informational Cascades: The Monday Demonstrations in Leipzig, East Germany, 1989–91." World Politics 47. Pp. 42-44 (3 pages).
- @ Uvin, Peter (1999). "Ethnicity and Power in Burundi and Rwanda: Different Paths to Mass Violence." Comparative Politics 31(3). Pp. 253-254 (2 pages stop at section titled "The Precolonial and Colonial Period").
- @ Posner, Daniel N. (2004). "The Political Salience of Cultural Difference: Why Chewas and Tumbukas Are Allies in Zambia and Adversaries in Malawi." *American Political Science Review* 98. Pp. 529-533 (5 pages – stop at section titled "The Differing Salience of an Identical Cultural Cleavage").
- # Skocpol, Theda (1979). *States and Social Revolutions: A Comparative Analysis of France, Russia and China*. Cambridge: Cambridge University Press. Pp. 40-42 (3 pages).

# Module 3: Designing and conducting interviews and surveys

Lecturer: Emily Bech

Discussion sections 1, 2: Emily Bech

Discussion sections 3, 4: Anthony Kevins

#### **Objectives:**

After this module, students should be able to formulate conceptually coherent and reliable survey items, and should be able to analyse the suitability and reliability of survey items used in existing studies. Additionally, they should be able to identify strengths and weaknesses of different types of survey sampling methods and data collection modes.

## **Topics:**

- From concept to operationalization
- Types of measurement and variables
- Validity and reliability of survey questions
- Survey collection methods & challenges
- Constructing an interview guides
- Framing interview questions
- Conducting interviews
- Identifying and addressing ethical challenges in surveys & interviewing

## **Readings:**

BDavid & Sutton (2011). Chapter 6: Qualitative Interviewing, pp. 118-145 (28 pages).

- @ Leech, Beth L. (2002): 'Asking Questions: Techniques for Semistructured Interviews,' *PS: Political Science and Politics* 35(4): 665-668 (4 pages).
- @ Goldstein, Kenneth (2002): 'Getting in the Door: Sampling and Completing Elite Interviews,' *PS: Political Science and Politics* 35(4): 669-672 (4 pages).

BDavid & Sutton (2011). Chapter 15: Survey design, pp. 239-270 (32 pages)

- BDavid & Sutton (2011). Chapter 16: Collecting and coding quantitative data, pp. 271-281 (11 pages).
- # Neuman, W. Lawrence (2003). Excerpt from *Social Research Methods*, 5<sup>th</sup> edition. Pp. 118-134, 'Ethics in Social Research') (17 pages).

For discussion classes:

*B* David & Sutton (2011), Chapter 16, Collecting and coding quantitative data, pp. 281-290 (10 pages, cursory reading).

# **Block 3: Analysing Quantitative Data**

# **Module 4: Univariate Analysis**

Lecturer: Anthony Kevins

Discussion sections 1, 2: Matt Loftis

Discussion sections 3, 4: Anthony Kevins

# **Objectives:**

After this module, students should be able to interpret and construct tables and graphs for single variables. Furthermore, the students should have knowledge of statistical measures of central tendencies and measures of variation.

## **Topics:**

- Introduction to quantitative data analysis
- Statistical measures of central tendencies and measures of variation
- Univariate tables and graphs

- *B* David & Sutton (2011), Chapter 24: Quantitative data analysis: Describing single variables, pp 468-475+478-484+489-496 (from the section 'Graphical presentation of single variables') 499-501+506 (27 pages).
- # Franklin, Mark (2008), Chapter 13: Quantitative Analysis, in: Della Porta, Donatella and Michael Keating (eds.) *Approaches and Methodologies in the Social Sciences*, Cambridge: Cambridge University Press, pp. 240-253 (14 pages).

# **Module 5: Bivariate Analysis**

Lecturer: Anthony Kevins

Discussion sections 1, 2: Matt Loftis

Discussion sections 3, 4: Anthony Kevins

# **Objectives:**

After this module, the students should be able to analyze relationships between two variables by means of tables and graphs. Furthermore, the students should have knowledge of a measure of association between two interval scaled variables (Pearson's r).

# **Topics:**

- Bivariate relationships
- Bivariate tables and graphs
- Pearson's r

- *B* David & Sutton (2011). Chapter 25: Describing and exploring relationships between two variables, pp. 507-516 (skip the section 'Creating contingency tables in IBM SPSS Statistics 19' p. 512-3) + 519-522 (skip the section 'Creating scatterplots in IBM SPSS Statistics 19') + 522-523 (begin at the section 'Measuring associations: correlation coefficient or Pearson's r' and stop at the section 'Calculating Pearson's r in IBM SPSS Statistics 19') (16 pages).
- # Babbie, Earl (2010). *The practice of Social Research*. Twelfth edition, Belmont: Wadsworth Publishing Company, pp 436-441 (6 pages).
- # De Vaus, David (2002). *Surveys in Social Research*. 5th edition, London and New York: Routledge, pp. 279-280 (2 pages).

#### Module 6: Introduction to Statistical Inference

Lecturer: Matt Loftis

Discussion sections 1, 2: Matt Loftis

Discussion sections 3, 4: Anthony Kevins

## **Objectives:**

After this module, students should be able to use appropriate test statistics to make inferences about populations from samples of data. In particular, students should be able to interpret t-statistics,  $\chi^2$  statistics, standard errors, and confidence intervals, and be able to explain the logic of the central limit theorem.

# **Topics:**

- Introduction to statistical inference
- Significance tests
- Interpreting statistical significance

## **Readings:**

#Babbie, Earl (2010). *The practice of Social Research*. Twelfth edition, Belmont: Wadsworth Publishing Company, pp. 467, 476-488 (14 pages).

BDavid, Matthew & Carole D. Sutton (2011) *Social Research. An Introduction* (Second edition). Thousand Oaks & New Delhi: Sage Publications, pp. 529-548 (skip the section 'Calculating an independent samples t-test in IBM SPSS Statistics 19' page 539, the section 'Calculating a dependent samples t-test in IBM SPSS Statistics 19' page 542-543, and page 546-547 'Using IBM SPSS Statistics 19 to calculate chi-square') (17 pages).

# **Module 7: Multivariate Analysis**

Lecturer: Matt Loftis

Discussion sections 1, 2: Matt Loftis

Discussion sections 3, 4: Anthony Kevins

# **Objectives:**

After this module, students should be able to analyze the relationship between three or more variables by means of graphs and tables. In particular, the students should be able to understand and apply the principle of controlling for third variables when interpreting and constructing multivariate analyses.

#### **Topics:**

- Introduction to multivariate analysis
- Controlling for other variables
- Types of relationships between three variables
- Elaboration analysis using tables

- # Agresti & B. Finlay (2009), *Statistical Methods for the Social Sciences*, fourth edition, Upper Saddle River, NJ: Prentice Hall, pp. 301- 315 (Skip section 10.4 p. 313-314 'Inferential issues in statistical control') (14 pages).
- # De Vaus, David (2002). *Surveys in Social Research*. 5<sup>th</sup> edition, London and New York: Routledge, pp. 297-314 (18 pages).
- # Rosenberg, Morris (1968). *The Logic of Survey Analysis*, New York: Basic Books, pp. 54-67 (14 pages).

# **Block 4: Analysing Qualitative Data**

# **Module 8: Deductive and Inductive Coding**

Lecturer: Emily Bech

Discussion sections 1, 2: Emily Bech

Discussion sections 3, 4: Anthony Kevins

# **Objectives:**

The aim of module 9 is to enable students to (1) conduct and evaluate procedures to organize and prepare qualitative data for coding and analysis; (2) distinguish between open/inductive coding strategies and closed/deductive coding strategies; (3) to conduct inductive coding using line-by-line coding and axial coding; and (4) to prepare a codebook and to use it to conduct deductive coding.

# **Topics:**

- Organization and preparation of qualitative data for coding & analysis
- Inductive and deductive analysis of interviews and pre-existing data sources
- Pros and cons of open and closed coding strategies
- Grounded theory
- Line-by-line coding and axial coding
- Developing codebooks
- Deductive coding

- @ McLellan, Eleanor, Kathleen M. MacQueen and Judith L. Neidig (2003): 'Beyond the Qualitative Interview: Data Preparation and Transcription,' Field Methods 15: 63-84 (22 pages).
- BDavid & Sutton (2011), pp. 338-348 (Coding Qualitative Data #1) (11 pages).
- @ Burnard, Philip (1991), 'A method of analysing interview transcripts in qualitative research,' *Nurse Education Today* 11: 461-466 (6 pages).
- # Charmaz, Kathy (2006) Constructing Grounded Theory: a Practical Guide through Qualitative Analysis. Pp. 42-60 (19 pages).
- # Lofland, John, David Snow, Leon Anderson, Lyn H. Lofland (2006). *Analyzing Social Settings*. Fourth Edition. Belmond: Wadsworth/Thomson. Pp. 195-211 (17 pages).

# Module 9: Computational Text Analysis

Lecturer: Matt Loftis

Discussion sections 1, 2: Matt Loftis Discussion sections 3, 4: Emily Bech

## **Objectives:**

The aim of module 9 is to enable students to (1) conduct and evaluate procedures to organize and prepare qualitative data for coding and analysis; (2) distinguish between open/inductive coding strategies and closed/deductive coding strategies; (3) to conduct inductive coding using line-by-line coding and axial coding; and (4) to prepare a codebook and to use it to conduct deductive coding.

# **Topics:**

- Designing & structuring content analysis
- Automated text analysis techniques

- @ O'Connor, B., Bamman, D., & Smith, N. A. (2011). "Computational text analysis for social science: Model assumptions and complexity." Proceedings of the NIPS Workshop on Computational Social Science and the Wisdom of Crowds. Available online at: <a href="https://people.cs.umass.edu/~wallach/workshops/nips2011css/papers/OConnor.pdf">https://people.cs.umass.edu/~wallach/workshops/nips2011css/papers/OConnor.pdf</a>
- © Sculley, D., & Pasanek, Bradley. M. (2008). "Meaning and mining: the impact of implicit assumptions in data mining for the humanities." Literary and Linguistic Computing, 23(4), 409-424. (AU Library)
- @ Robinson, David. (2016) "Text analysis of Trump's tweets confirms he writes only the (angrier) Android half." <a href="http://varianceexplained.org/r/trump-tweets/">http://varianceexplained.org/r/trump-tweets/</a>
- @ Nelson, Robert K. (2011) "Of Monsters, Men And Topic Modeling." <a href="http://opinionator.blogs.nytimes.com/2011/05/29/of-monsters-men-and-topic-modeling/">http://opinionator.blogs.nytimes.com/2011/05/29/of-monsters-men-and-topic-modeling/</a>

# Module 10: Qualitative analysis and displays

Lecturer: Emily Bech

Discussion sections 1, 2: Matt Loftis Discussion sections 3, 4: Emily Bech

# **Objectives:**

The aim of module 10 is to enable students to be able to (1) describe different analysis strategies and their uses; (2) construct displays condensing qualitative data; and (3) to judge such condensations made by themselves or by others using the basic guidelines for constructing displays.

#### **Topics:**

- Constructing qualitative displays
- Analyzing qualitative data using displays
- Evaluating qualitative displays

- @ Bazeley, Pat (2009) 'Analysing Qualitative Data: More than 'Identifying Themes,' Malaysian Journal of Qualitative Research 2(2): 6-22 (17 pages).
  <a href="http://www.researchsupport.com.au/bazeley\_mjgr\_2009.pdf">http://www.researchsupport.com.au/bazeley\_mjgr\_2009.pdf</a>
- @ Williamson, Tracey & Andrew F. Long (2005) 'Qualitative data analysis using data displays,' Nurse Researcher 12 (3): 7-19 (13 pages).
- # Miles, Matthew B. & A. Michael Huberman (1994). *Qualitative Data Analysis*. London: Sage Publications. Pp. 91 102 (12 pages).

# **Block 6: Bridging Quantitative and Qualitative Research**

# Module 11: Multi-Methods Research

Lecturer: Emily Bech

NO DISCUSSION SECTION FOR THIS MODULE.

#### **Objectives:**

After module 12, students should (1) know the advantages and disadvantages of combining qualitative and quantitative techniques; (2) be able to identify relevant qualitative data sources based on quantitative observations; (3) be able to identify relevant quantitative data based on qualitative observations.

#### **Topics:**

- Bridging the quantitative-qualitative gap
- Understanding mixed methods approaches
- Data selection in multi-methods research

# **Readings:**

- BDavid & Sutton (2011), Chapter 17: Methodological Innovations: Mixing Methods and e-Research, pp. 293-308) (16 pages).
- @ Johnson, Burke R., Onwuegbuzie, Anthony J. and Lisa A. Turner (2007), 'Toward a Definition of Mixed Methods Research' *Journal of Mixed Methods Research* 1 (2): 112-133 (22 pages).
- # Tarrow, Sidney (2010), Chapter 6: Bridging the Quantitative-Qualitative Divide, in: Brady, Henry E. and David Collier (eds.) *Rethinking Social Inquiry*. Second Edition, Lanham: Rowman & Littlefield, pp. 101-110 (10 pages).
- @ Weaver-Hightower, Marcus B. (2014), 'A Mixed Methods Approach for Identifying Influence on Public Policy', *Journal of Mixed Methods Research* 8 (2): 116-138 (23 pages).

Time will also be allotted at the final lecture for course evaluation.