

## GRADING GUIDE – HUMAN GEOGRAPHY (bachelor SGO and master HGO)

**Course code and semester-year: HGO4601 autumn 2019**

**Type of examination:** *[underline the option that applies]*

Written school exam / take-home exam / term paper given topic / term paper self-chosen topic

**About exams at SGO/HGO:** A good examination paper contains solid knowledge, logical and coherent reasoning and a systematic structure. The answer to a discussion question/task must examine, analyze, and connect different parts of the curriculum.

1. The answer responds to the question/task given in a precise and exhaustive way.
2. The answer demonstrates knowledge.
3. The answer must be well-written: coherent and using good academic language.
4. Key concepts – those at the core of the answer – must be defined.
5. The answer demonstrates analytical capacity and reflection.

**Om eksamen ved SGO/HGO:** En god besvarelse inneholder solid kunnskap, logisk argumentasjon og ryddig disposisjon. Besvarelsen av en drøftingsoppgave skal være diskuterende, analytisk og koble ulike deler av pensum.

1. Besvarelsen svarer på oppgaveteksten på en presis og utfyllende måte.
2. Besvarelsen viser kunnskap.
3. Besvarelsen skal være velskrevet: sammenhengende med godt akademisk språk.
4. Viktige begreper - de som er i kjernen av besvarelsen – skal defineres.
5. Besvarelsen skal vise analytiske evne og refleksjon.

### **About this course:**

The course introduces new directions in theory such as evolutionary economic geography, and addresses institutions and the dynamics between the local and global. It delves into debates over sustainability transitions and a more environmentally aware economic geography, and provide empirical examples. Students should be able to discuss central concepts such as evolution and institutions as used in economic geography, and have basic knowledge of how work in the discipline deal with sustainability, transitions and green innovations. Given the complexity and inter-relatedness of sub-topics covered, the examination questions are formulated to allow critical thinking and reflection. This should be taken into account in the evaluation.

### **About specific questions/tasks:**

Six-hour school exam. The students are to answer two out of three questions. The two answers are to be weighted equally.

### **Question 1:**

*Define the two concepts i) agglomeration and ii) path dependency as used in evolutionary economic geography. Discuss forces at play in bringing about path dependency in territorial (regional or national) industrial development. Use empirical examples from the curriculum.*

#### Guidelines

A good marking demand that the candidate is able to provide general accounts of the two concepts: Agglomeration is the concentration of economic activities in certain places, and can take the form of *localisation* (concentration of similar activities) or *urbanisation* (concentration of dissimilar activities). Agglomeration allows firms to benefit from e.g. common supplier or transportation infrastructures, and provides the basis for cross-fertilization between firms and industries through value chains, innovation networks and the labour market. Frenken et al (2007) analyse implications of different types of agglomeration for development in Dutch regions and distinguishes between urbanisation as ‘related variety’ and ‘unrelated variety’ As used in evolutionary economic geography, the concept of path dependency refers to how resources (technology, organisational routines and worker skills) created by current industrial activities in the region contribute to channelling development in certain directions. It captures also how supportive institutions might be formed and co-evolve with the industrial structure. Ability to distinguish between different types of agglomeration and link this distinction to territorial path dependency draw in the direction of a high marking, as does the use of empirical examples of regional path-dependency as provided by e.g. Neffke et al (2011) or path dependency at the national level as provided e.g. by Wicken (2009). A high marking should be rewarded to candidates who are able to provide theoretical accounts of the concept in the context of economic geography that include how paths might be initiated and why they are reproduced (or not), e.g. by drawing on David (2007), Essletzbichler & Rigby (2010) and Boschma & Frenken (2006).

### **Question 2**

*Use theories and concepts from economic geography to compare wind power industries in Denmark and Norway with emphasis on how and why different actors and their resources, institutions and governmental policies have facilitated or constrained the creation of new industrial development paths in the two countries (i.e. ‘new path creation’).*

Garud & Karnøe (2003) and Steen & Hansen (2018) discuss the Danish and Norwegian cases, respectively. Candidates should provide a brief timeline and account of the present situation. The former contribution draws on the concept of ‘distributed agency’ to describe the different types of resource, skills and thus actors involved in preformation and subsequent establishment of an internationally competitive wind power industry in Denmark and emphasise that this involved the accumulation of inputs from multiple actors that in turn generated momentum effects from experience-learning and institutional change. Candidates who associate this with the ‘population approach’ and ‘branching’ perspective later introduced in evolutionary economic geography and discussed in Steen & Hansen (2018) should be rewarded. Discussions of similarities and differences with respect to involved agents and their interactions, institution building and different types of policies (the policy mix) at the national level also draw in the direction of a good grade. A high grade should be awarded to candidate who actively use evolutionary theories and concepts in their comparison of the two cases.

### Question 3

*In Schot and Steinmueller (2018), three frames for innovation policy are laid out. Each frame is associated with different rationales for policy intervention, and different policy practices. Describe what is meant by a framing, the three frames, their theoretical justification and policy practices. Discuss the third frame in light of the multilevel perspective on sociotechnical transformations.*

#### Guidelines

Frames/framings are described as interpretations of experience, ordering of present circumstances and imaginations of futures that provide the foundation for policy actions and shape expectations of potentials and opportunities. According to the authors, the first frame '*Innovation for growth*' that dominated in the Global North during the post-war years reflected a growing recognition that technological change was the single most important factor behind economic growth and that governments should play an active role in financing scientific research because discoveries would provide the basis for applied R&D and innovation in the private sector, and, therefore, for economic growth. The second frame labelled '*National systems of innovation*' emphasized differences between countries in how institutions and networks influenced the creation and flow of knowledge and technology in the economy, and, thus, the extent to which scientific progress was translated into international competitiveness and economic growth. This frame emphasized strongly the place-specific, cumulative and thus path-dependent nature of technological progress and industrial development. Retaining the emphasis of Frame 1 on economic growth as the ultimate objective of innovation policy, emphasis was directed towards the networks and institutions that facilitate interactive learning and knowledge diffusion in the economy. The third frame '*Transformative change*' extends beyond the narrow objective of economic growth and acknowledges that innovation objectives must be aligned with social and environmental challenges. A good grade demand that candidates are able to associate each of the three frames with their respective rationales for policy intervention, i.e. to correct market failures in research-based knowledge production (Frame 1) or correct system failures in knowledge production and diffusion more generally (Frame 2), versus challenges associated with the need to remould and align different sociotechnical systems with sustainability objectives (Frame 3). This involves tackling a broader range of 'failures' (directionality, demand articulation, coordination, and reflexivity) than those legitimizing intervention under the first and second frame. Critical reflections on the tendency of economic theory to demand that 'failures' are identified to legitimize policy intervention are welcome. Candidates who are able to discuss the objectives, actors and policy practices of Frame 3 in light of the multilevel perspective on sociotechnical transitions should be awarded with a high grade.