

## Course Descriptions None 2020-2021

Course Title Auctions and Electronic Markets  
 Course Code EBC2091  
 ECTS Credits 6,5  
 Assessment Whole/Half Grades

| Period | Start    | End       | Mon | Tue | Wed | Thu | Fri |
|--------|----------|-----------|-----|-----|-----|-----|-----|
| 4      | 1-2-2021 | 26-3-2021 |     | X   |     | X   |     |

Level Intermediate  
 Coordinator Dries Vermeulen For more information:d.vermeulen@maastrichtuniversity.nl  
 Language of instruction English

Goals (1) Being familiar with the game theoretic analysis of classical single-item auctions; (2) get insight in recent and classical auction literature and learn to interpret the main results; (3) be aware of the most important issues of auction design and how they can be addressed in various contexts; (4) learn how to set up an auction design for a particular application.

Description PLEASE NOTE THAT THE INFORMATION ABOUT THE TEACHING AND ASSESSMENT METHOD(S) USED IN THIS COURSE IS WITH RESERVATION. THE INFORMATION PROVIDED HERE IS BASED ON THE COURSE SETUP PRIOR TO THE CORONAVIRUS CRISIS. AS A CONSEQUENCE OF THE CRISIS, COURSE COORDINATORS MAY BE FORCED TO CHANGE THE TEACHING AND ASSESSMENT METHODS USED. THE MOST UP-TO-DATE INFORMATION ABOUT THE TEACHING/ASSESSMENT METHOD(S) WILL BE AVAILABLE IN THE COURSE SYLLABUS. In order to satisfy the Econometrics & OR curriculum, you have to choose two of the courses EBC2091, EBC2120, EBC2121, EBC2122 in period 4.

The course is divided into three parts. Part (I) deals with fundamental results on single-item auctions under strong assumptions about the bidders and their preferences. It should not be a surprise that this classical theory is by far not sufficient when designing auctions for real applications. For example, in frequency auctions, like the UMTS auctions in Europe, or in reverse auctions used in procurement, many items are sold at the same time. Furthermore, we may face problems like the winner's curse when there is uncertainty about the valuation of the items sold in an auction. Part (II) gives a detailed insight in such issues and how they can be dealt with. In Part (III), theoretical insights from part (I) and (II) are applied to particular markets for which auctions have been proposed, or are already used. We broaden our knowledge thereby by investigating the interaction between auction design and specific properties of the market. Examples of markets are electric power, highway franchising, emission rights, and listings in online search engines. Each student writes a final paper about one of these markets, in which they make proposals for an auction design in these markets.

Literature Course book.

Prerequisites Exchange students need to major in economics.  
 An advanced level of English.

Teaching methods PBL / Presentation / Lecture / Papers

Assessment methods Final Paper / Participation

Evaluation in previous academic year For the complete evaluation of this course please click <http://iwio-sbe.maastrichtuniversity.nl/rapporten.asp?referrer=codeUM>

This course belongs to the following programme / specialisation

|   |   |
|---|---|
| Bachelor Economics and Business Economics - Economics                               | Year 3 Quantitative Economics Elective(s)   |
| Bachelor Economics and Business Economics - Emerging Markets                        | Year 3 Elective Course(s)                   |
| Bachelor Economics and Business Economics - Economics and Management of Information | Year 2+3 Quantitative Economics Elective(s) |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Accounting          |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Finance             |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Inf Mgmt            |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Marketing           |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Org                 |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj SCM                 |
| Bachelor Economics and Business Economics - International Business Economics        | Year 3 QE Elec(s) - Maj Strategy            |
| Bachelor Econometrics and Operations Research                                       | Year 3 Core Course(s)                       |
| Bachelor Econometrics and Operations Research                                       | Year 3 Elective Course(s)                   |
| Bachelor International Business - Emerging Markets                                  | Year 3 Elective Course(s)                   |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Accounting          |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Finance             |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Inf Mgmt            |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Marketing           |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Org                 |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj SCM                 |
| Bachelor International Business   | Year 3 QE Elec(s) - Maj Strategy            |
| SBE Exchange Bachelor   | Bachelor Exchange Courses                   |
| SBE Exchange Master   | Bachelor Exchange Courses                   |
| SBE Non Degree Courses  | Bachelor Courses                            |