

Milano, 07/01/2021 prot. n. 135 [Cod. riferimento: C3 1°L]

CALL FOR THE APPLICATION FOR THE AWARD OF 1 RESEARCH GRANT FOR THE SECTOR 13/A1 ECONOMICS AT THE CENTER IGIER OF UNIVERSITA' COMMERCIALE "LUIGI BOCCONI" OF MILAN PROJECT ERC (RIF.ERC-2020-COG) CODIM – TITOLO: "COMPETITION IN DIGITAL MARKETS.

## Article. 1 Call for Competition

To promote the education and improvement of junior scholars, the Università Commerciale "Luigi Bocconi" of Milan, announces a competition by exams and academic titles for the award, by means of an appropriate contract, according to art. 22 of Law 240/2010 and using the relative University Regulations emanated with the Rectoral Decree n° 129 of 10<sup>th</sup> June 2011, of 1 research grant with the following characteristics:

Duration: TWO YEARS (renewable)

Sector: 13/A1 ECONOMICS

(Scientific Sector SECS-P/01 Economics)

In the Center IGIER

Project ERC (Rif.ERC-2020-COG) CODIM - Titolo: "Competition in Digital Markets"

Professor of referral: prof. Francesco DECAROLIS

Research Project: The proper design of digital platforms as well as of the mechanisms through which platforms compete between them is crucial to avoid waste and enhance social welfare. This research proposal describes three projects that will advance the frontier of our understanding of the working of digital markets. It is motivated by the consideration that the lack of a comprehensive empirical assessment of the crucial phenomena in this area driven by the lack of data availability has been the major impediment to the research in this area. All projects in this proposal touch on the issues of competition digital ad data and privacy and can be orgnazied into three subtopics as follows: Component 1: The Role of Intermediaries in Digital Advertising. This part studies how advertisers and intermediaries select each other by estimating a model of many-to-many matching with transfers. Component 2: Competition Defaults and Antitrust Remedies in Search. This part studies how the antitrust remedies imposed to Google and involving changes in the default settings for search engines on Android devices impacted the penetration of different search engines. Component 3: The Price of Privacy in Digital Markets. This part poses and estimates a structural model of demand and supply for mobile apps to quantify the money for privacy trade-off in consumers' preferences and the corresponding strategic choices by app sellers.

To achieve the project's goals, a series of activities will be required, the most important of which are:

- · Data collection and organization. Various kinds of data will need to be assembled from different sources, including from web scaping via Python.
- · Implementation of both standard econometric techniques and of machine learning methods (both supervised and unsupervised) will be employed to analyze the data (through Python, Stata e R).
- · Programming of bidding/pricing algorithms using Q-learners as well as cutting-edge artificial intelligence and machine-learning techniques such as particle filtering and Monte Carlo tree search, one of the building blocks of successful AI systems Deepmind's AlphaGo.



# Article. 2 Admission Requirements

In order to participate in the competition, the candidate must have, as a preferred qualification, the possession of a PhD or equivalent, carried out in Italy or abroad, or in the course of being conferred.

Relations (up to the fourth degree of kinship) to any professor in the University Board, the University Rector or the Managing Director are not allowed.

The award of the research grant is incompatible with any participation in degree courses, specialist or master's degree, University master's degree, research doctorate with scholarship in Italy or abroad and if the candidate is a public employee, they must take unpaid leave.

If the candidate has benefitted from any previous grants or scholarships with any university according to article 22 of the Law 240/2010 and contracts according to article 24 of the Law 240/2010, they cannot exceed a total of twelve years, even if not continuous. Time off for maternity or health reasons is not counted as part of the twelve years.

These statutory pre-requisites must be in place at the deadline for the presentation of applications determined by the present announcement.

Candidates may obtain a conditional acceptance. At any time, the administration can arrange, with reason, exclusion from the selection procedure due to the lack of necessary pre-requisites.

## Article. 3 Applications

Applications, completed according to the attached form, and addressed to the Rector of Bocconi University, must be sent to the "Faculty and Staff Administration" office via e-mail before 12 noon of 28 February 2021 to recruiting-adr@unibocconi.it

Each candidate's application must clearly indicate:

- surname and name
- date and place of birth
- fiscal code (codice fiscale) (if available)
- citizenship
- residence
- contact address
- educational qualifications (degree and PhD)

The application must include the following documents, which must be attached to the application and sent exclusively via e-mail:

- degree certificate (Bachelor and Masters degree), in pdf format;
- PhD certificate or equivalent obtained in Italy or abroad, in pdf format (if available);
- Professional C.V., in pdf format;

- A list of titles and publications in pdf format;
- any certificate or document proving the scientific preparation in the chosen field, which the candidate intends to submit for evaluation, in pdf format:

The award of the research grant is compatible with any form of occasional work but incompatible with any simultaneous use of PhD grants, specialist schools or post-doctorate grants.

If the candidate covers any other position, the candidate must attach a declaration specifying the type of activity undertaken, duration and the university in which they are carrying out their research and the commitment to give up the employment if conferred the grant due to incompatibility.

Finally, if the candidate has benefitted from any previous grants or scholarships with any University, they must attach a declaration explaining the time period, length and University where they benefitted from the grant.

### Article. 4 Evaluation Committee

The Evaluation Committee of the current competition, named by the Rector, is made up of three core faculty professors who will remain for two years in their role.

The competition will be carried out by an evaluation of titles and examination, by means of an interview.

The Committee can allocate a maximum of 100 points for each candidate:

- 30 points for the evaluation of CV and academic titles;
- 30 points for the evaluation of scientific publications presented;
- 40 points for the evaluation by interview

In order to be admitted for the interview, candidates must first achieve a minimum of 40/100 points in the evaluation of titles, publications.

Candidates will be informed of the interview date by e-mail, with adequate advance notice. The interview can also be carried out via *conference call*. There is also the possibility that an interview can be carried out in a room at the University with advance notice of at least 7 days. The interview will be open to the public.

At the end of the assessment, the Committee formulates a final judgement for each candidate and creates a ranking in descending order on the basis of the score obtained, thereby awarding the research grants to winning candidates.

The Committee may appoint suitable candidates who can take over in the event of withdrawal/renunciation of the winner.

Each winning candidate will receive a written communication, with the grant that should be duly signed, before the deadline of 15 days after receiving the letter.

The grant cannot be divided. If for any reason the candidate stops receiving the grant, they

cannot be substituted by other candidates who have not won a grant.

### Article.5 Rights and Duties of the Grant Winner

The grant will last for 2 years and indicatively run from 1st September 2021.

The award of the grant implies a commitment to undertake research, study and preparation of research for at least four days a week.

The normal obligations of the research include:

- Research activity as part of the Research Project presented, as well as additional programs elaborated by the Center, supervised by the *Professor of referral*, who will check the activity carried out;

All other work, for the University or externally, undertaken outside of the four days in the University, should not conflict with that of the researcher at Bocconi University. A judgment of these circumstances will be decided by the Center Director, having consulted the professor of referral.

Such circumstances will lead to the ending of the assignment of the grant.

The award of the research grant does not constitute an employment contract and does not confer any rights to teaching roles within the University.

### Article.6 Economic Compensation

The amount of the research grant is € 40.000,00 gross per annum.

The amount is excluded from "Irpef tax" (income tax), according to article 4 of the Law dated 13<sup>th</sup> August 1984, n°476 and subsequent modifications and additions and subject to social security according to article 2, comma 26 and the Law dated 8<sup>th</sup> August 1995, n°335 and subsequent modifications and additions.

The University will provide insurance for risks of injury and civil responsibility.

The payment will be made monthly post-dated, following presentation before the tenth day of each month, of a payment note, signed by the *Professor of Referral* with the scope of checking the activity undertaken.

# Article.7 Causes of deferral or suspension of the grant

If a candidate is on maternity leave, minimal payments will be made by INPS (national insurance) as according to the Ministerial Decree dated 12<sup>th</sup> July 2007, published in the "Gazzetta Ufficiale" n. 247 of 23<sup>rd</sup> October 2007. For illness the article 1, comma 788 of the Law 27<sup>th</sup> December 2006, n. 296 and subsequent modifications and additions will apply.

During the period of obligatory maternity leave a top-up payment will be made by Bocconi University up to the monthly amount of the grant as according to article 5 of the Decree dated 12<sup>th</sup> July 2007.

#### Article. 8 Stays Abroad

Stays abroad, for study reasons, should be approved by the Rector beforehand, by means of a formal assessment by the Center Director, having conferred with the *Professor of referral*.

### Article. 9 Certificate of the activity carried out

At the end of the grant, the beneficiary has the right to ask for a certificate from the *Professor of Referral*, stating the scientific activity carried out during their time in Bocconi as a researcher.

#### Article. 10 Treatment of Personal Data

According to a General Data Protection Regulation n. 679/2016 all personal data supplied by candidates to the Faculty and Staff Administration, both in electronic and paper format, is exclusively for evaluation purposes and to publicize the acts related to the current evaluation procedure and the conferral of a Research Grant position as detailed in this announcement.

#### Article. 11 Advertising

The announcement of the competition for assigning the research grants is advertised on the Bocconi University website, as well as the Italian Ministry and European Union websites. Università Bocconi can also publish this announcement on the main international job opening websites for this scientific sector. Copy of this advert is available from the Faculty and Staff Administration.

This announcement is published in English. In case of divergences between Italian and English text, the Italian version will be considered definitive

FACULTY AND STAFF ADMINISTRATION (dott. Marcello Valtolina)

Marcol Volta

### **ATTACHMENT A Application Form**

Al Magnifico Rettore dell'Università Commerciale "Luigi Bocconi" Via Sarfatti 25 MILANO

20136

  tel.	he undersigned (Surname)
-	ASK
[Co	be admitted for selection, by means of titles and exam, competition number 135 date 07/01/2021 d. referral:C3 1°L] for the assignment of 1 research grant for two years, for research activity and ching in the Sector of 13/A1 ECONOMICS for the Center IGIER, Project ERC CODIM.
To	this end, I declare:
b) Tel c) (da d)	to be a citizen of
e) f)	te)(if present); to be in the possession of other titles, if applicable; to have previously received / not received a grant fromuniversity from
g) h) i)	to; Fiscal Code(if available)
1) 2) 3)	a scientific, professional curriculum vitae; publications in pdf; any other titles in my possession, which may be useful to demonstrate my qualifications:
Dat	eSignature
dec	.: documents and titles must be presented in pdf format. Completing this form, the candidate lares that any documents produced are exact copies of the original. Any false declarations will be aished by Law.
Dat	eSignature

#### **PRIVACY**

### **European General Data Protection Regulation**

Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016 on the protection of natural persons with regard to the processing of personal data and on the free movement of such data, and repealing Directive 95/46/EC.

Please read the Privacy Policy at: <a href="https://www.unibocconi.it\privacy">https://www.unibocconi.it\privacy</a>

Noting that my data will be processed in full compliance with the law, I declare, by submitting the present form, that I have read and understood the privacy policy:
☐ Yes ☐ No
By sending this form, I authorize to handle my personal information for the purpose of:
Promotion/advertising*
Sensitive Data **
International Data transfer***
To complete the submission of the form, the expression of your preference is required .
* Consent necessary for receiving communications, notices and invitations regarding events, initiatives, services and programs, also in support of the University and also regarding the promotion of educational and research initiatives, including possible profiling activities.  ** Consent necessary to allow the University to process data related to special situations and to provide all related services (i.e. health information, political opinion, membership in political students groups, etc. will be processed only for purposes that are permitted by law and for the Institutional aims of the University exclusively).  *** Consent necessary to perform Institutional activities of teaching and research in international contexts. In the absence of such consent, it would not be possible to benefit of the international opportunities offered by the University.  If you need any information or have any queries, feel free to contact our DPO - Data Protection Officer, write to dpo@unibocconi.it
Date Signature