

Milano, 16/04/2020 prot. n. 23526

[Cod. riferimento: C3 1°L]

CALL FOR THE APPLICATION FOR THE AWARD OF 1 RESEARCH GRANT FOR THE SECTOR 13/A5 ECONOMETRICS AT THE CENTER BAFFI CAREFIN OF UNIVERSITA' COMMERCIALE "LUIGI BOCCONI" OF MILAN PROJECT PRIN "HIDI NET. ECONOMETRIC ANALYSIS OF HIGH DIMENSIONAL MODELS WITH NETWORK STRUCTURES IN MACROECONOMICS AND FINANCE – PROT. 2017TA7TYC; CUP J44120000240001"

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 10th June 2011, of 1 research grant with the following characteristics:

Duration: ONE YEAR (renewable) Sector: 13/A5 ECONOMETRICS

(Scientific Sector SECS-P/05 Econometrics)

In the Center BAFFI CAREFIN

Professor of referral: prof. Massimiliano MARCELLINO

<u>Project</u>: PRIN "Hi-Di NET. Econometric Analysis of High Dimensional Models with Network Structures in Macroeconomics and Finance – prot. Prot. 2017TA7TYC; CUP J44I20000240001"

Short description of the project: The project will develop foundational research that can be classified into three main areas:

- 1. Networks in Dynamic Models: develop new models to integrate network structures in high dimensional models and time series models.
- 2. Networks and Latent (unobserved) Structures: deal with the identification of the network structure when it is not observed and its estimation.
- 3. Networks and Big Data: develop methods aimed at modelling large set of data and thus dealing with computational challenges deriving from carrying out inference.

Within these projects, empirical research is also relevant, in particular in these areas:

- 1. Systemic Risk: the aim is to provide tools to identify exogenous risks stemming from the macroeconomic side, such as the instability of financial markets and institutions. The project develops methodology and instruments aimed at monitoring the financial system and its regular functioning.
- 2. Uncertainty Impact: analyse the relevance of market connectedness and the uncertainty exogeneity/endogeneity issue to understand to what extent uncertainty acts as a channel in shaping interconnections.
- 3. Fintech and Big Data: the availability of high frequency financial data, with observations on many assets collected at an extremely fine scale, coupled with technological revolutions has opened new and exciting research frontiers both in statistics and econometrics on which the project aims to contribute.

To achieve the aims of the project, various research related activities and skills are required, including:

- 1. Data collection and management, including scraping
- 2. Use of standard econometric methods and machine learning techniques (with coding in Python, R, Matlab, Stata).
- 3. Use of Bayesian econometric methods to study networks and large models (with coding in R, Matlab).



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 31st May 2020, 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 Ealuation 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 1 year and indicatively run from 1st September 2020

The awared 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 € 39.600,00 gross per annum.



The amount is excluded from "Irpef tax" (income tax), according to article 4 of the Law dated 13th August 1984, n°476 and subsequent modifications and additions and subject to social security according to article 2, comma 26 and the Law dated 8th 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 12th July 2007, published in the "Gazzetta Ufficiale" n. 247 of 23rd October 2007. For illness the article 1, comma 788 of the Law 27th 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 12th 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)

Marco Volta



ATTACHMENT A Application Form

Al Magnifico Rettore dell'Università Commerciale "Luigi Bocconi" Via Sarfatti 25 20136 MILANO

I, the undersigned (Surname)		(Na	ame)	t	orn
in	, ,				in de.)
Roa					
tel			mobile	ph	one
e-mail					
	A	SK			
to be admitted for selection, by n referral:C3 1°L] for the assignment of 13/A5 ECONOETRICS for the Ca	of 1 research grant f	for one year, for res	earch activity and	teaching in the Se	ctor
To this end, I declare:					
a) to be a citizen of	, I commit to cor	nmunicate promptly	any changes to m	y address , conferred	on
d) to have a PhD in	from University			conferred	on
e) to be in the possession of other tf) to have previously received		grant from		university f	rom
g) Fiscal Code	grants or fellowships	;			(if
I, the undersigned, attach to my appli	ication:		_		
 a scientific, professional curricu publications in pdf; any other titles in my possession 		ıl to demonstrate my	qualifications:		
Date	Signature	;			
N.B.: documents and titles must be documents produced are exact copies					any
Date	Signature	·			



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: https://www.unibocconi.it/privacy

Noting that my data will be processed in fu form, that I have read and understood the p		ith the	e law, I declare, by submitting the present				
☐ Yes ☐ No							
By sending this form, I authorize to handle	e my personal inf	forma	ation for the purpose of:				
Promotion/advertising*	Accept		Do not accept				
Sensitive Data **	Accept		Do not accept				
International Data transfer***	Accept		Do not accept				
To complete the submission of the form, the expression of your preference is required .							
* Consent necessary for receiving commuservices and programs, also in support of tand research initiatives, including possible ** Consent necessary to allow the Universall related services (i.e. health information, will be processed only for purposes that University exclusively). *** Consent necessary to perform Institution In the absence of such consent, it would not by the University. If you need any information or have any quirite to dpo@unibocconi.it	the University and profiling activities to process despolitical opinion are permitted by the possible to be possible to be	nd also ies. ata re n, men by la teach	o regarding the promotion of educational clated to special situations and to provide mbership in political students groups, etc. w and for the Institutional aims of the ing and research in international contexts. tof the international opportunities offered				
Date	Signature						

