

CALL FOR APPLICATIONS

Job:

Job reference:	AE2017-0040 (CORAL-SENSORS-1 - CRAS) INESC TEC - Instituto de Engenharia de Sistemas e Computadores, Tecnologia e Ciência
Position:	Research Grants (BI)
City:	Porto
Research field:	Main: ENGINEERING Sub:

Job summary:

INESC TEC is accepting applications to award 1 Research Grant for MSC.

Project:	CORAL Sustainable Ocean Exploitation: Tools and Sensors (NORTE-01-0145-FEDER-000036)
Scientific Advisor:	Eduardo Silva
Duration Grant:	from 2017-03-22 to 2017-09-21 (6) . The grant may be renewed for additional periods up to the maximum duration of the project or the duration of the grant for which the candidate was selected. It can also be renewed due to another project provided that it is entirely or partly related to the work area in the call and that it contributes to the ongoing training.
Location:	INESC TEC, Porto, Portugal

Job description:

Work Area: Robotics

Project overview: Study and development of methods of visual odometry and SFM, "feature" and / or "dense" based for application in robots used for inspection of underwater infrastructures. It aims to develop and implement hardware and software in a prototype and its validation in simulation and field environment.

Objectives: Identification and analysis of recent visual odometry and SFM techniques. Experimental analysis of the most appropriate techniques to sub-aquatic environments, in simulation and real environment. Hardware / software implementation of an experimental prototype. Validation of the prototype in a field environment. Study and development of parallelization techniques using GPUs to implement the prototype in real time.

Academic Qualifications:	Master's degree in Computers Electrical Engineering or related scientific area.
Minimum Profile required:	Knowledge of computer vision and sensory fusion. Programming in C / C ++ and ROS. Matlab and OpenCV languages.
Preference factors:	Experience in computing environments for high performance including hardware-based acceleration using GPUs. Experience with CUDA, OpenCL and OpenMP.
Monthly Grant:	€980,00 (MSC) according to the Stipends values of the grants awarded directly by the FCT, paid by bank transfer. The grant holder may also benefit from additional incomes in the sequence of a quarterly evaluation process (Clauses 12 and 13 of INESC TEC Grants Regulation and Annex II), up to a maximum of 50% of the monthly grant.

Project duration:	2016-01-01 a 2018-12-31
Funding Entity:	CCDRN, financiado pelo Fundo Europeu de Desenvolvimento Regional (FEDER) através do Programa Operacional Regional do Norte (NORTE 2020)
The grant contract shall be submitted to the legislation concerning the Research Grant Holder Statute , approved by Law n 40/2004, dated 18 August, amended and republished by Decree-Law No. 202/2012 of 27 August and amended by Decree-Law No. 233/2012 of 29 October and by Law No. 12/2013, of January 29, and Decree-Law No. 89/2013 of July 9 as well as by INESC TEC Grant Regulation , approved by FCT - Fundação para a Ciência e a Tecnologia (Science and Technology Foundation) in 12 January 2011 and FCT current Grant Regulation. Additional information about INESC TEC Grants Regulation and relating annexes may be found at www.inesctec.pt/grants	

Selection Criteria:	Curriculum evaluation based on the criteria referred to in Clause 7º INESC TEC Grants Regulation and will include individual interviews in the final stage of the selection process, with its valuation: 85% curriculum evaluation (35% CV, 30% scientific domains and 20% Expertise) and 15% interview.
Selection Jury:	President of the Jury: Prof. Eduardo Silva; Permanent Member: Prof. José Miguel Almeida; Substitute Member: Prof. Alfredo Martins;
Notification of results:	The results of the selection process will be disseminated to interested parties by mail, as referred to in Clause 8 of INESC TEC Grants Regulation .
Application period:	From 2017-03-06 to 2017-03-20
Application submission:	Fill in the electronic form in the section Work with Us at www.inesctec.pt