





Date of the CVA

26/12/2020

Section A. PERSONAL DATA

Name and Surname	Alejandro García Tuero			
DNI/NIE/Passport		Age		
Researcher's identification number	Researcher ID	AAF-3068-2020		
	Scopus Author ID	57000364700		
	ORCID	0000-0002-8467-4867		

* Obligatorio

A.1. Current professional situation

Institution	University of	Oviedo					
Dpt. / Centre	Construction and Manufacturing Engineering / Polytechnical School of Engineering, Gijón						
Address							
Phone		Email					
Professional category	Researcher	•		Start date	2020		
Keywords							

A.2. Academic education (Degrees, institutions, dates)

Bachelor/Master/PhD	University	Year
Industrial Technologies Official PhD	Universidad Nacional de Educación	2018
Program	a Distancia	
MSc in Research in Electrical, Electronical	Universidad Nacional de Educación	2016
and Industrial Control Engineering	a Distancia	
Technical Industrial Engineer - Mechanical	Universidad de Oviedo	2004
BEng HONS Aeronautical & Mechanical	University of Wales	2003
Engineer		

A.3. General quality indicators of scientific production

- Índice h*: 4
- Coautor de 8 artículos de investigación en revistas del Journal Citation Reports del SCI.
- Número total de citas*: 28.

- Promedio de citas/año durante los últimos 5 años*: 5.

* Fuente: Scopus Database (06/12/2020). Author ID: 57000364700

Section B. SUMMARY OF THE CURRICULUM

BEng (Hons) in Aeronautical & Mechanical Engineering by the University of Wales (Glyndwr University, 2003) and Industrial Technical Engineer by the University of Oviedo (2004) with equivalent to a degree (2016). He worked in the next few years in various areas of private business. In 2005 as HSE Manager on site, in SODES SA. In October 2005 he joined the RENAULT ESPAÑA staff as Acoustic Performance Technician, until December 2007. From January 2008 to November 2009 he worked as a sales engineer at GARCÍA DE LA VIÑA SL in the area of spare parts and capital goods, obtaining the level 2 certification as Ultrasound Analysis Technician (Gateshead, England 2009) in that period. Later he would be a Maintenance Manager at Litoral - NESTLÉ ESPAÑA SA (Sept. 2010 - Mar. 2013). In 2014 he began his research carrer at the University of Oviedo, with which he is still linked today, having combined his work as a contracted researcher with obtaining a Master's degree (2016) and a PhD in Industrial Technologies (2018) by the UNED.

As a researcher, since 2014 he has participated in 10 research projects / contracts of different scope: one European, two of the Spanish National Research Plan, two in national calls of the DGT, one of the Science and Technology Plan of the Principality of Asturias, three of the





University Institute of Industrial Technology of Asturias (IUTA) and another one financed by the company ADN MOBILE SOLUTION SL.

Co-author of eight articles in journals indexed in the JCR, three of them in the first quartile (Q1), three in the second quartile (Q2) and two in the third quartile (Q3) of the Transportation Science and Technology area of knowledge.

Co-author of six papers presented at international scientific conferences.

He has contributed to the review of several articles for the journal IEEE Transactions on Intelligent Transportation Systems (Q1).

Collaborates in the evaluation of projects of the annual call of the University Institute of Industrial Technology of Asturias (I.U.T.A.) since 2017.

His main line of work has been the design of efficient driving patterns for professional drivers, as well as the design of an adaptive learning method based on these patterns, which is in use in many urban transport fleets in Spain and Morocco. In recent times, he has been deriving his activity towards Tribology, in which field he has already participated in the development of two publications (pending approval in Tribology International journal) and another one is in process.

Section C. MOST RELEVANT MERITS (ordered by typology)

C.1. Publications

AC: Autor de correspondencia; (nº x / nº y): posición firma solicitante / total autores

- 1 <u>Scientific paper</u>. Laura Pozueco Álvarez; Nishu Gupta; Xabiel García Pañeda; Robertoq García; Alejandro García Tuero; David Melendi; Abel Rionda; Víctor Corcoba. 2020. Analysis of Driving Patterns and On-board Feedback based Training for Pro-active Road Safety Monitoring IEEE Transactions on Human-Machine Systems. IEEE. 50-6, pp.529-537.
- 2 <u>Scientific paper</u>. Laura Pozueco; Alejandro G. Tuero; Xabiel G. Pañeda; David Melendi; Roberto García; Gabriel Díaz; Abel Rionda. 2019. Analytic System to Evaluate Efficient Driving Programs in Professional Fleets Transactions on Intelligent Transportation Systems. IEEE. pp.1-13.
- 3 <u>Scientific paper</u>. Víctor Corcoba; Xabiel G. Pañeda; Alejandro G. Tuero; Laura Pozueco; Roberto García; David Melendi; Abel Rionda. 2018. A method for making a fair evaluation of driving styles in different scenarios with recommendations for their improvement Intelligent Transportation Systems Magazine. IEEE.
- 4 <u>Scientific paper</u>. Laura Pozueco; Xabiel G. Pañeda; Alejandro G. Tuero; Gabriel Díaz; Roberto García; David Melendi; Alejandro G. Pañeda; Jose Antonio Sánchez. 2017. A methodology to evaluate driving efficiency for professional drivers based on a maturity model Transportation Research Part C: Emerging Technologies. Elsevier. 85, pp.148-167.
- 5 <u>Scientific paper</u>. Alejandro G. Tuero; Laura Pozueco; Roberto García; Gabriel Díaz; Xabiel G. Pañeda; David Melendi; Abel Rionda; David Martínez. 2017. Economic Impact of the Use of Inertia in an Urban Bus Company MDPI Energies. MDPI. 10-7, pp.1029. ISSN 1996-1073.
- 6 <u>Scientific paper</u>. Roberto García; Gabriel Díaz; Xabiel G. Pañeda; et al; Alejandro G. Pañeda. 2017. Impact of Efficient Driving in Professional Bus Fleets Energies. MDPI. 10-12, pp.2060.
- 7 Scientific paper. Laura Pozueco; Abel Rionda; Alejandro G. Pañeda; Jose A. Sanchez; Xabiel G. Pañeda; Roberto García; David Melendi; Alejandro G. Tuero. 2017. Impact of on-board tutoring systems to improve driving efficiency of non-professional drivers IET Intelligent Transport Systems. The IET (Institution of Engineering & Technology). Online-Online, pp.1-17. ISBN Print ISSN 1751-956X, Online ISSN 1751-9578.
- 8 <u>Scientific paper</u>. 2016. An Architecture for a Learning Analytics System Applied to Efficient Driving Revista Iberoanericana de Tecnologías del Aprendizaje. IEEE. 11-3, pp.137-145. ISSN 1932-8540.
- **9** <u>Scientific paper</u>. 2016. Formal characterization of an efficient driving evaluation process for companies of the transport sector Transportation Research Part A: Policy and Practice. Elsevier. 94, pp.431-445. ISSN 0965-8564.





10 <u>Scientific paper</u>. 2015. Una arquitectura para un sistema de evaluación del aprendizaje aplicado a la conducción eficiente Versión Abierta en Español y Portugués - Revista Iberoamericana de Tecnologías del Aprendizaje. IEEE. 3-4, pp.187-196. ISSN 2255-5706.

C.2. Participation in R&D and Innovation projects

- 1 Evolutionary system to support safe and efficient driving based on the context analysis of the vehicle and the driver - R + D + i projects / Challenges of society Ministerio de Economía y Competitividad. (Universidad de Oviedo). 15/11/2018-31/08/2020.
- **2** Multimedia Distribution Systems Group (DMMS) Consejería de Economía y Empleo. (Universidad de Oviedo). 07/10/2015-31/12/2017.
- **3** Feasibility study of the Bluetooth 5 standard in vehicular environments (Instituto Universitario de Tecnología Industrial de Asturias (IUTA)). From 2018.
- **4** MINECO-13-TIN2013-41749-R, Design and evaluation of learning evolution metrics for efficient driving of combustion vehicles Ministerio de Economía y Competitividad. Xabiel García Pañeda. (Universidad de Oviedo). From 03/01/2017.
- **5** System to improve vehicle safety using monitoring devices for the driver's biometry and for the environment (Instituto Universitario de Tecnología Industrial de Asturias (IUTA)). From 2017.
- **6** Development of a collaborative work system of autonomous cleaning robots (Instituto Universitario de Tecnología Industrial de Asturias (IUTA)). From 2016.
- **7** SPIP2015-01686, Influence of the context on the efficiency of road transport fleets Dirección General de Tráfico. Xabiel García Pañeda. (Universidad de Oviedo). From 15/12/2015.
- 8 DGT SPIP20141277, Developement of an automatic system for detecting efficiency and safety patterns based on vehicle monitoring Dirección General de Tráfico. Xicu Xaviel García Pañeda. From 01/01/2015.

C.3. Participation in R&D and Innovation contracts

- **1** Scientific direction and research activities of the SMEInst- GlobalBLED project 01/11/2017-01/08/2018.
- **2** Training on efficient driving patterns analysis 01/11/2014-01/01/2015.

C.4. Patents

08/2017/182. VAT-ED: Visual Analytic Tool for Evaluation of Drivers Spain. 08/2017. Universidad de Oviedo.