

RESEARCH LINE 10B	
COMPANY	Fundación Tatiana Pérez de Guzmán el Bueno
PhD THESIS SUPERVISOR (UPM)	Prof. Dr. Andrés Monzón <i>Civil Engineering School</i> <i>Transport Engineering, Urban and Regional Planning Department</i> <i>TRANSyT-Transport Research Center (www.transyt.upm.es)</i>
PhD THESIS CO-SUPERVISOR (COMPANY)	Co-Supervisor: Dr. Álvaro Matud Juristo <i>Director of Institutional and Academic Relations</i> <i>Fundación Tatiana Pérez de Guzmán el Bueno</i> Tutor: Mr. Jesús Zamora Rodríguez <i>Director of Projects and Investments</i> <i>Fundación Tatiana Pérez de Guzmán el Bueno</i>
DESCRIPTION OF THE PhD THESIS PROJECT	<p><u>Title-Sustainable mobility in university campus through social and technological innovation</u></p> <p><u>Background and Motivation</u></p> <p>The 14 campuses of the 6 public universities of Madrid Region account for 215,000 people: students, academics, and administrative staff. There is no mobility strategy which produce a non-integrated, non-smart and non-sustainable mobility patterns. A mobility survey shows a high car-dependency (48,5% of trips) and low use of sustainable modes (walk 9,5%+ bike 2%+ public transport 40%).</p> <p>The COVID-19 pandemic has brought negative changes in the mobility patterns of the university community, leading to even more unsustainable mobility behaviours: more private car and less public transport. But also positive changes: walking and cycling become an opportunity for change mobility.</p> <p><u>General Objective of the thesis</u></p> <p>To develop a methodology for smart management of mobility in university campuses, supporting <i>Sustainable University Mobility Plans</i>. Linked to <i>SDG</i>: 7, 8, 9, 11, 12, 13 & 17</p> <p><u>Specific Objectives</u></p> <ol style="list-style-type: none"> Campus to become living labs for achieving sustainable and resilient SDG through social and technological innovations. Students to become pioneers of smart and sustainable mobility patterns for changing societal habits <p><u>Expected Impacts</u></p> <p>The investigation aims to transform the mobility model in university campuses with the ultimate goal of encouraging a more sustainable and smart future. In particular, its findings will help to:</p> <ul style="list-style-type: none"> - reduce environmental negative externalities - improve livability and people quality of life - promote an efficient and resilient economic system - foster the development of technological innovations
TRAINING ACTIVITIES	<ul style="list-style-type: none"> - PhD courses both specific of the PhD Programme and transversal of the EID (International Doctoral School of the UPM) - The supervisor is coordinating EELISA-on-the-MOVE community with the goal of: <i>Planning urban transitiONs for THE MOst inclusiVE and sustainable mobility</i>. Challenges of mobility in campus are included. - TRANSyT is one of the core members of MoviTUR (www.movitur.upm.es) UPM-Innovation Hub, which organize formation activities and participate in several international research networks providing training activities: ECTRI, ERTRAC, UITP, ALICE, POLIS, NECTAR and FIT. - Conferences, Publications JCR and writing a <i>Handbook Good Practices on Mobility in University Campus</i>.
SECONDMENT(S)	Tentative secondments (with a minimum of 3 months): 1- Europe – Technische Universität München (TUM) Dr. Benjamin Brütner , Head of Research Group “Accessibility Planning” Chair of Urban Structure and Transport Planning Co-Editor-in-Chief of Journal of Urban Mobility(Elsevier) Head of the Doctoral Training Network

	<p>European Institute of Innovation and Technology (EIT) Urban Mobility.</p> <p>2.- America – UC Berkeley – USA</p> <p>Prof. Susan Shaheen – Civil and Environmental Engineering Dept. She co-directs the <i>Transportation Sustainability Research Center</i> (TSRC) of the Institute of Transportation Studies - Berkeley. Policy and Behavioral Research Program Leader at California.</p>
REQUIREMENTS FOR CANDIDATES	<p>MSc in Engineering, Urban Planning, Architecture, or another related field. Skills: interest and experience in sustainable urban planning. Internationally oriented candidate, interested in multidisciplinary work and team collaboration.</p>