



Dr. Ranga Dinesh Kahanda Koralage is a Lecturer in Energy Technologies at University of Southampton, UK. The University of Southampton is a founding member of the Russell Group of research-intensive universities in the U.K., and ranked in the top 100 universities in the world. His broad research interests are in development and application of fundamental theoretical and computational techniques to better understand and improve new cleaner energy technologies and emission concerns with particular emphasis on clean fuel variability such as hydrogen, clean combustion, emission control and energy conservation. The ultimate goal of his research is to improve clean combustion technologies that maximise energy conversion while minimising undesirable emissions, including utilising sustainable low carbon fuel options for next generation stationary and motive combustion engines. Prior to joining Southampton, he held a number of post-doctoral positions; a Senior Research Associate in the Engineering Department, Lancaster University working on hydrogen-rich syngas fuel burning and a Research Fellow at the School of Engineering, Cranfield University working on turbulent intermittent flows. Ranga Dinesh obtained his first degree with First Class Honours (Faculty Gold Medal) from University of Ruhuna, Sri Lanka reading Mathematics (2002), later completing his PhD at Loughborough University, UK where he focused on Large Eddy Simulations (LES) of turbulent swirling flames (2007). Ranga Dinesh has developed and applied distinct computational experiments which involved Direct and Large Eddy Simulations and Reynolds-averaged Navier-Stokes of hydrogen combustion, hydrogen enriched syngas combustion, swirl stabilised syngas and hydrogen-natural gas combustion and scalar mixing. He has successfully carried out industrial projects for AIRBUS (UK) and OMEGA (Aviation and the Environment) and submitted technical reports for three dimensional thermal mapping of Jet fuel and the coaxial jet efflux mixing of a scaled version of the RB211 aero engine. He has published widely in the area of hydrogen combustion applicable to clean burners and internal combustion engines in the International Journal of Hydrogen Energy (11 publications) with a total number of 35 energy-related journal publications ($h=17$, over 700 citations). He is currently a member of the UK Consortium on Turbulent Reacting Flows (UKCTRF) and The Combustion Institute (British section). He is currently working with national and international research groups at University College London (UCL), Eindhoven University of Technology, University of Magdeburg Otto-von-Guericke, The University of Sydney and Tsinghua University. He is acting as a regular reviewer for several leading energy journals such as International Journal of

Hydrogen Energy, Applied Energy, Journal of Fuel, Combustion and Flame and International Journal of Energy Research.