

European Respiratory Society International Congress, Madrid 28th September – 2nd October 2019

Thanks to a travel grant awarded to me by Action for Pulmonary Fibrosis, I was able to attend the ERS International Congress in Madrid, Spain. At the conference I presented my talk titled 'Role of the TGF β 1-mTOR axis in fibroblast-directed alveolar epithelial regeneration in IPF', within the session 'Damage and remodelling in pulmonary fibrosis'. My group recently published research showing how the signalling protein mTOR controls TGF β 1-induced collagen synthesis in fibroblasts, however the effect of the TGF β 1-mTOR axis on the ability of fibroblast to support alveolar regeneration is still unknown. The preliminary data I presented suggest that mTOR inhibition in TGF β 1-stimulated fibroblasts affects their ability to support alveolar organoid formation *in vitro*, highlighting the need for further investigation of the potential clinical impact of mTOR inhibition on alveolar regeneration. mTOR inhibitors may represent useful tools to investigate the mechanisms involved in fibroblast-driven epithelial regeneration and epithelial-mesenchymal cross-talk.



In addition to presenting my own research, I also moderated the thematic poster session 'New mechanistic insights into pulmonary fibrosis'. The session was extremely interesting and very well attended, with high quality science and buzzing with interactions.

Finally, I chaired a professional development workshop which I had contributed to organise, titled 'Ethical issues in clinical respiratory research: where to draw the line?'. The session included presentations from Prof O'Callaghan from the United Kingdom, describing the CRSPR-Cas9 technique and its clinical applications in respiratory medicine, Prof Weiss from the US, talking about the use of stem cell therapies for chronic lung disease, and Prof Sipp from Japan and Dr Wagner from Sweden addressing the ethical implications of employing these techniques in a clinical setting.



In addition to my direct involvement in the conference, I was also able to attend excellent presentations from experts in the respiratory field and early career researchers, and learn about the latest research in idiopathic pulmonary fibrosis, and to connect with colleagues from all over the World.

Being on maternity leave, it can be especially challenging to keep up to date with the latest research and find opportunities to meet colleagues and establish collaborations, as well as attending conferences with a small baby and presenting data. I am therefore very grateful to Action for Pulmonary Fibrosis and the people who donate to them, for giving me the opportunity to attend the ERS International Congress this year.