

## Extended Reach Intervention by Polymer as Friction and Viscosity Reducer: An experimental study

Zahra Nickmand<sup>1</sup> and Nicolas von Solms<sup>2</sup>

<sup>1</sup>CERE, Department of Chemical and Biochemical Engineering, DTU, [zahni@kt.dtu.dk](mailto:zahni@kt.dtu.dk)

<sup>2</sup>CERE, Department of Chemical and Biochemical Engineering, DTU, [nvs@kt.dtu.dk](mailto:nvs@kt.dtu.dk)

### *Presenting author*

Zahra Nickmand

*Is the presenting author a research assistant/MSc/PhD student/Postdoc? Yes Postdoc*

### *Programme/stand name your research belongs to:*

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### **Abstract**

Buckling phenomena and lockup condition are the main challenges related to coiled tubing operation. Buckling of tubing can occur when mechanical compressive force apply to end of tubing or when pressure inside tubing is greater than its outside. Accordingly, we are going to design and fabricate one experimental set up to simulate the behavior of coiled tubing when it is being deployed in the wellbore. In this experimental study, we will try to reduce mechanical friction and increase the buckling resistance of coiled tubing by utilizing one environmentally friendly polymer. In addition, influence of some important factors on the coiled tubing buckling will be tested.