**Systems Engineering Principles and Heuristics: A Two-Part Workshop**

**Introduction**

As part of its Future of SE (FuSE) program, INCOSE has initiated a number of activities to inform the way ahead. These include the development of agreed Principles and Heuristics which enshrine its mission and assist its members. This workshop, extending over two sessions, will review work to date and consider the future.

**Session 1:** Friday 29th Jan 19.00-21.00 CET

**SE Principles and Heuristics: Progress and Challenges**

This session will report on two key workstrands:

* *The Systems Engineering Action Team*, led by Dr Michael Watson, who have developed and published a set of 15 SE Principles. Mike will describe how they were derived and summarise the set as a whole.
* *The Fellows Heuristics Team*, established at IW20, under the leadership of Dorothy McKinney, and have compiled an initial set of Heuristics, now ready for initial release as an online resource for evaluation purposes. This will be demonstrated, and members given the opportunity to sign up as Beta Users.

The session will finish with time to question both teams and discuss their future plans, and a brief preview of Session 2.

**Session 2:** Sat 30th Jan 17.00-19.00 CET

**SE Principles and Heuristics – Building Bridges**

This session will start with a brief recap of the previous day for those joining us for the first time.

This will be followed by a report on the work of the *Bridge Team* – Peter Brook, David Rousseau, Michael Pennotti and Charles Wasson – established in the Fall of 2020 to explore the relationships between SE Principles and Heuristics. Their findings will be presented in a talk entitled *Towards a Framework for Understanding SE Principles and Heuristics,* which will shed light on underlying connections and speculate on a number of open issues requiring further attention.

This will be followed by an open, facilitated discussion on questions which arise, for example those associated with elegance, trust and how principles of all sorts can be organised to contribute to the wider SE knowledge base.

The aim will be to bring wider views to bear on some fundamental issues facing INCOSE as it continues its journey towards a mature profession, fit for the 21st Century.

*Michael Watson (SEPAT), Dorothy McKinney (Heuristics Team) & Peter Brook (for Bridge Team)*