Natural Systems

CO-CHAIRS
Curt (curtmcn@gmail.com)
Randy Anway (randy@new-tapestry.com)

MEMBERS
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INCOSE CONNECT ADDRESS
https://www.incose.org/incose-member-resources/working-groups/analytic/natural-systems

INCOSE WEB PAGE
https://sites.google.com/site/incosenswg/
Charter Summary

WG PURPOSE/MISSION
Evaluate changes to Systems Eng. processes & communications to take advantage of Natural Systems, including broader relationships between SE---Science--Tech.

WG GOAL(S)
2. Cultivate a NS Community of Practice.
4. Investigate enhancements to SE practices.
5. Grow in numbers and scope.

WG SCOPE
The Natural Systems Working Group includes members from industry, academia, and government. Our work focuses on tools for bio-inspired design and their application to the SE process.
Planned Work for IW

Intro to Natural Systems
Sat 26 : 10:30-12:00
What do we mean by natural systems? How can knowledge of this help an SE?

NSWG Communities of Practice Working Session
Sat 26 : 13:00-15:00
Overview of natural systems and design communities of practice, creation/ curation of bio-inspired community map

Complexity and Natural Systems
Sat 26 : 15:30-17:00
Joint meeting with Complex Systems Working Group

NASA Challenge for natural systems
Sun 27 : 10:30-12:00
Review NASA challenge for nature inspired solutions, and proposed solutions.

NSWG/Systemology Joint Session: NS Tools in the SE Process
Sun 27 : 13:00-15:00
The NASA Vine Systemology Cluster has produced a list of 25 tools for bio-inspired design. Join us to discuss how these could be mapped to the SE process.

NSWG Future Planning
Tue 29 : 10:00-12:00
Discuss ongoing and future working group projects

Science Basis for Systems Mimicry
Tue 29 : 13:00-15:00
Discussion with Len Troncale on Isomorphic Patterns for SE Systems Mimicry/Systems Pathology from Studies of Natural Systems