17 Practices of Systems Thinking

1. Considering both short and long term consequences of one's actions

Looking ahead and anticipating not only the immediate results of actions, but also the effects down the road

2. Looking at multiple perspectives of an issue

Changing perspective to see other points of view within a system

3. Looking at the 'big picture'

Focusing on the overall 'forest' as opposed to the details of any one 'tree'

4. Looking for patterns in data

Reviewing information with an eye towards patterns or themes

5. Looking for trends over time

Viewing changes over time as part of the natural dynamics of the system

6. Being comfortable with ambiguity

Holding the tension of paradox and ambiguity; taking the time necessary to understand the dynamics of a system before taking action

7. Checking results and changing actions if needed.

Assessing for improvement using benchmarks; seeing errors as a means to learning and adjustment

8. Looking for interconnected issues

Perceiving connections between multiple issues/parts within a system

9. Looking for small actions that can make big differences

Using systems understanding to determine what small actions could produce high leverage results

10. Considering the impacts of accumulations over time

Paying attention to things that build up (or deplete) slowly over time—both concrete ('money in a bank account') or abstract ('trust within a relationship')

11. Being comfortable with questioning one's deep assumptions

Understanding that one's beliefs of how the world works (mental models) may limit one's thinking.

12. Being aware of boundaries

Understanding that boundaries are arbitrary; checking for consistency of understanding about where a particular boundary is drawn.

13. Thinking critically about causation, not just correlation

Looking beyond basic connectedness to understand the dynamic relationship between the connected parts

14. Being cautious of adopting a win/lose attitude

Being skeptical of a 'zero-sum game' approach to individual goals within a highly interdependent system

15. Considering unintended consequences

Anticipating ancillary effects of actions over time

16. Seeing self as part of system under study

Understanding that one's own behavior within the system, impacts the system

17. Recognizing that a system's structure drives its behavior

Focusing on system structure and avoiding blaming others when things go wrong