

Key Advice

Wicked problems characteristics framework from CMU Transition Design

The ten characteristics that help identify and understand complex, systemic problems that are difficult to solve are:

1. No definitive formulation

Wicked problems are difficult to define and have multiple, often conflicting, definitions.

2. No stopping rule

Wicked problems have no clear endpoint and there is no way to know when a solution has been reached.

3. Solutions are not true or false

There is no right or wrong solution to wicked problems, only better or worse solutions.

4. Every solution is a "one-shot operation"

Implementing solutions to wicked problems is irreversible and there is no opportunity to test solutions before implementing them.

5. No immediate and no ultimate test of a solution

The effectiveness of solutions to wicked problems cannot be determined immediately and their long-term impact is uncertain.

6. Not a problem with a single cause

Wicked problems are complex and systemic, with many interdependent causes and effects.

7. Stakeholders have different values and priorities

Different stakeholders have different values, priorities and perspectives, which can make it difficult to agree on a solution.

8. Not solvable by experts alone

Wicked problems require collaboration and input from a wide range of stakeholders, including non-experts.

9. No permanent solution

Solutions to wicked problems are temporary and will require ongoing attention and adjustment.

10. Every wicked problem is essentially unique

Each wicked problem is unique, and there is no way to generalise solutions from one problem to another.