PEOPLE AND PLANET CONSULTING

Structured Decision Making 101

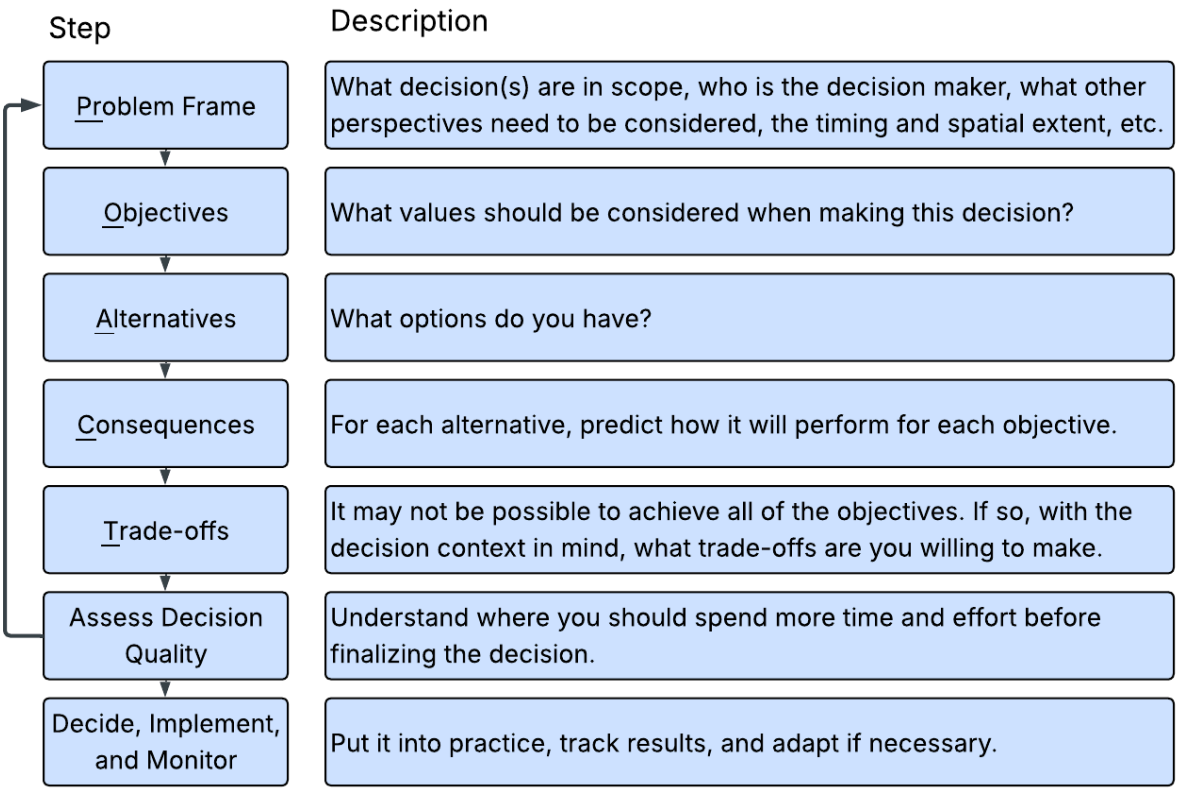
What is Structured Decision Making?

Structured Decision Making (SDM) is a systematic, transparent process for making choices under complexity and uncertainty.

What is Rapid Prototyping[1]?

Quickly iterate through the SDM steps to develop an initial 'prototype' of the decision, and then circle back to improve steps as needed before finalizing the decision.

The Core Steps (PrOACT Framework[2])



[1] Garrard, G. E., L. Rumpff, M. C. Runge, and S. J. Converse. 2017. Rapid Prototyping for Decision Structuring: An Efficient Approach to Conservation Decision Analysis. Pages 46-64 in N. Bunnefeld, E. Nicholson, and E. J. Milner-Gulland, editors. Decision-Making in Conservation and Natural Resource Management: Models for Interdisciplinary Approaches. Cambridge University Press, Cambridge.
[2] Hammond, J., R. Keeney, and H. Raiffa. 1999. Smart Choices: A Practical Guide to Making Better Decisions. Harvard Business School Press, Boston.

Questions or need support? Reach out to Laura at 403-903-3335 or laura@peopleandplanet.consulting.

Consequences Table[3]

A tool that is used at the ‘consequences’ step of the PrOACT framework. It summarizes the information that you have on how the alternatives perform across the objectives.

Objectives: What you want

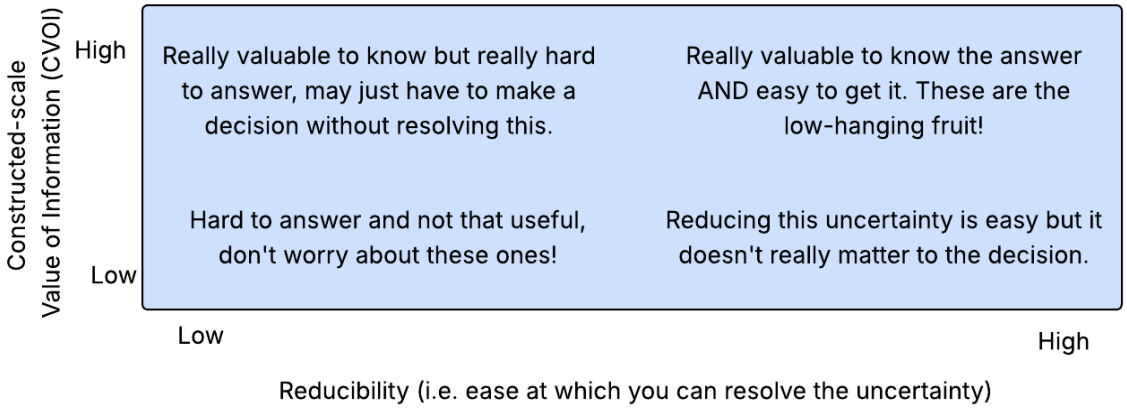
Alternatives: What you can do

Fundamental Objectives	Performance Measure and Preferred Direction	Alternative #1	Alternative #2	Etc.
Objective #1	Measure and Direction #1 (e.g. maximize number of X)			
Objective #2	Measure and Direction #2			
Etc.	Etc.			

Consequences: What you know

Constructed Value of Information[4]

In decision analysis, information has value if it would change a decision. Constructed-scale Value of Information (CVOI) is an emerging tool that was developed to provide quick insights into the value of information.



[3] Gregory, R., L. Failing, M. Harstone, G. Long, T. McDaniels, and D. Ohlson. 2012. Structured Decision Making: A Practical Guide to Environmental Management Choices. Wiley Blackwell, Chichester, West Sussex, United Kingdom.

[4] Runge, M. C., C. S. Rushing, J. E. Lyons, and M. A. Rubenstein. 2023. A Simplified Method for Value of Information Using Constructed Scales. Decision Analysis 20:220-230.