

Tools for Systems Thinking

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INFS 770 - Knowledge Management for e-Business

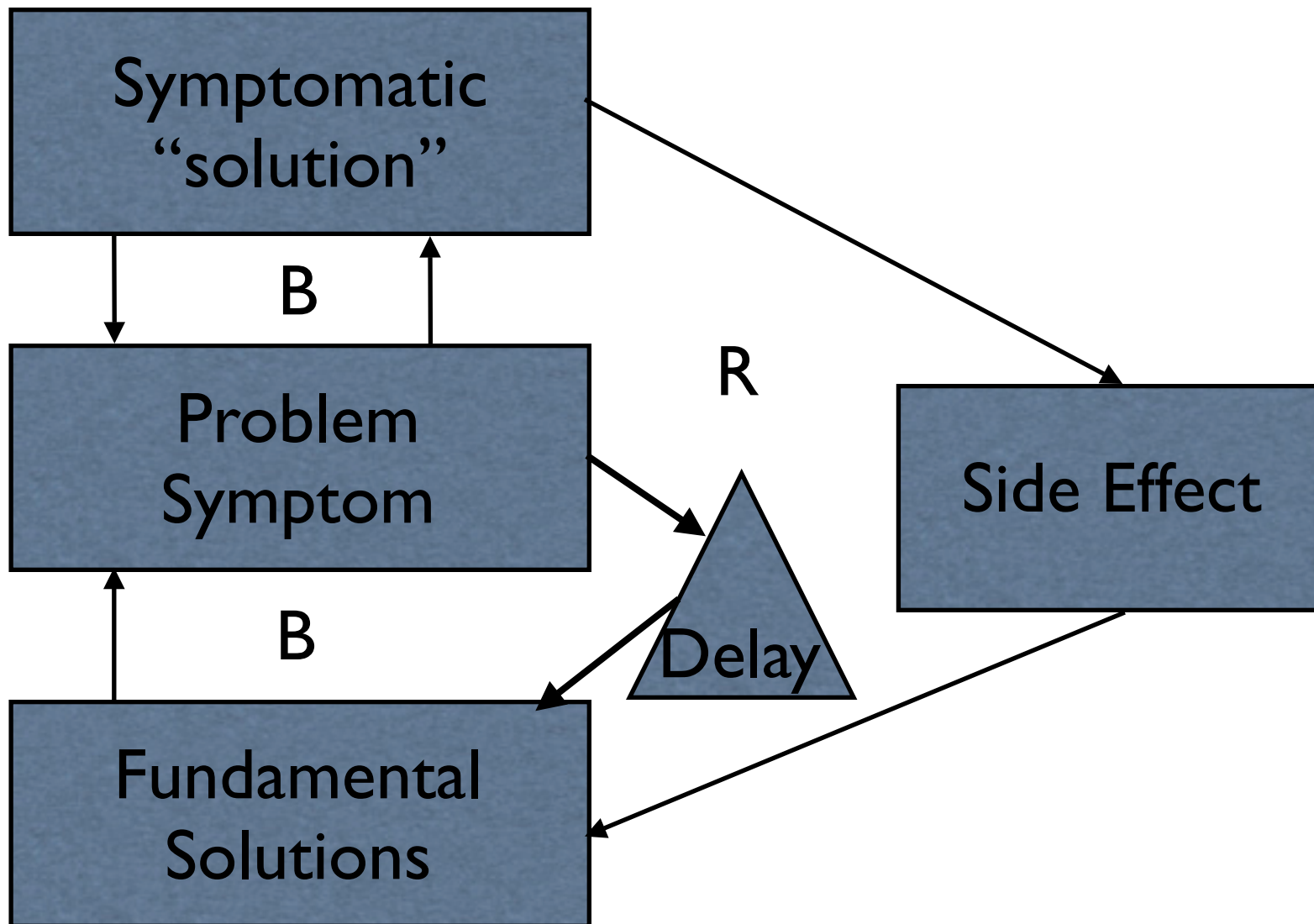
Systems Thinking

- Seeing Interrelationships, Not Things, and Processes, Not Snapshots
- Moving beyond Blame
- Distinguishing Detail Complexity from Dynamic Complexity
- Focusing on Areas of High Leverage
- Avoiding Symptomatic Solutions

New Tools

- Systems Archetypes - there are patterns of system behavior, growth, maturity, cycles;
- Balancing Process with Delay - decision makers fail to consider delays towards the goal;
- Limits to Growth - resource constraints, product life-cycles peak early due to poor quality
- Shifting the Burden - short-term solution without address the core problem.

Shifting the Burden



Charting Strategic Dilemmas

- Eliciting the dilemmas.
- Mapping opposing values as two ends of an axis.
- Processing - converting nouns to gerunds to denote ongoing processes that can evolve.
- Framing/Contextualization allows values to be framed in a context further softening the distinctions between opposing positions.
- Sequencing;
- Waving/Cycling;
- Synergizing comes from the Greek *syn-ergo* which means “work together”.

The Left-Hand Column: Surfacing Mental Models

- Mental models can dominate business decisions;
- Models are often tacit and perhaps contradictory;
- Left-hand column exercise developed by Chris Argyris and colleagues. (See page 43).
 - Helpful in showing how to leap from *data* to *generalizations*.
 - Approach is to address a specific situation that is “not working”
 - Write out the conversation exchange on the right hand side, and private thoughts on the left hand side.