

Leading in Uncertain Times

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An example of the Implications Wheel

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How lessons from the 19th century can propel your organization to higher levels of innovation, achievement and prosperity.

The ability to take decisive action, particularly during times of great uncertainty, is the hallmark of successful leadership. History proves that those who know how to scout the future will possess a critical strategic advantage over their competitors.

In the late 19th century, wagon trains loaded with equipment and supplies moved across the vast uncharted territory of the American western frontier. At the head of the wagon train rode the wagon master, whose job it was to lead the pioneers to their destination safely and within a given period of time. There were risks associated with every move, the future was unpredictable, and the stakes—literally, life or death—were very high.

Before rolling the wagons, a good wagon master would send out scouts to see what was over the horizon. The scouts brought back information that allowed the wagon master to make decisions quickly and with a high degree of confidence so that the wagons could move forward at a faster pace.

The scouting process proved to have value because it incorporated the following critical attributes:

- **Speed.** Scouts were instructed to ride out, make observations, and return quickly. If they took too long, their information would be of little use.
- **Qualitative information gathering.** Scouts weren't asked to measure, analyze and record a lot of details. Instead, they returned with observations, impressions and images that were qualified by their past experience.
- **Multiple directions.** Usually multiple scouts were used so that a broad area could be covered. This broad spectrum ensured that alternative pathways forward weren't overlooked.
- **Mapping.** Scouts mapped the terrain with sufficient—but not confusing—detail to give the wagon master the “lay of the land.”
- **Decision-enhancing information.** The ultimate decision on which way to proceed was made by the wagon master, not by the scouts. With the scouts' input, the wagon master was able to make

decisions with confidence regarding matters that had consequences far into the future.

Scouting the 21st Century Frontier

“For want of a nail, the shoe was lost; for want of a shoe, the horse was lost; and for want of a horse, the rider was lost.”

— 14th century proverb

These attributes are equally relevant for today’s decision makers, who are called upon to navigate the uncharted territory of the future. Decisions that might determine an organization’s life or death now need to be made in hours, not days. Understanding these consequences and—more important—being able to identify them ahead of time, provides decision-makers with a powerful competitive advantage. Yet (as any leader will tell you) the most important implications of any action are rarely those that spring immediately from the initiating event; instead, they are usually found after several other events have occurred.

Unfortunately, most of the scenario building and risk analysis tools in use today are not designed to provide accurate information about what lays over the time horizon. The Implications Wheel—a powerful scouting resource—addresses this deficiency and provides decision-makers with critical information from a variety of perspectives within an exceptionally short period of time.

For the past 35 years, the Implications Wheel has been used to help IBM, the City of New Orleans, NASA, the U.S. Army, Hewlett-Packard and the Mayo Clinic (among many others) identify hidden risks and previously unforeseen opportunities associated with decisions to:

- Enter or exit a market
- Develop or discontinue a product or service
- Initiate or eliminate a core policy
- Buy or sell a business or business unit

In recent months, the Implications Wheel has been used to help clients in the utility and energy sectors pinpoint critical issues associated with new endeavors. For instance, representatives from the Department of Energy’s carbon capture and sequestration (CCS) initiative identified several new areas that would require further consideration in the siting of possible CCS sites. Members of the Edison Electric Institute applied the Implications Wheel to explore the ramifications of developing a more open stakeholder engagement process for siting large infrastructure projects, such as transmission lines.

Cascade Thinking

The Implications Wheel captures the numerous intended and unintended consequences that result from any proposed change. Each of the identified implications is then scored based on desirability and likelihood of occurrence.

Significantly, the Implications Wheel incorporates “cascade thinking:” that is, how one event or implication leads to multiple possibilities, each of which in turn leads to additional possibilities. As the Wheel expands outward, congruency is maintained between the rings, or “Orders,” around the Wheel because every new implication must be the direct result of the immediately preceding one, with no significant intervening event between the implication to be added and the immediately preceding implication. Organized in this manner, the Implications Wheel provides the flexibility for thinking in terms of future possibilities while also ensuring that no critical steps are omitted along the way.

The illustration above shows a completed Implications Wheel, which can be produced within a few hours, rather than over days or weeks. Moreover, because this resource is available via a secure server over the internet, participants need not travel to the same place at the same time to provide input. So within a very short period of time, decision-makers can quickly identify, well out into the future, the multiple desirable (blue), undesirable (red), neutral (white) and likely (these have a “ring” around them) implications of any proposed decision or new initiative. Highly unlikely “victories” or “catastrophes” are called “Black Swans” and are indicated with a large blue (victory) or red (catastrophe) star. In the online version, users may rotate the Wheel visually to look more closely at each implication.

Equally important, all of the information used to develop the Wheel is captured in a secure database. This allows organizations to analyze the information for deeper understanding. The entire Wheel may be scored from a variety of different perspectives, giving decision-makers the opportunity to compare and contrast stakeholder viewpoints concerning each implication. Further, the completed Wheel creates a visual map of issues and their relationships, identifying trends as well as implications that arise through multiple pathways.

Avoiding Catastrophe: A Case Study

One dramatic use of the Implications Wheel involved a global retail manufacturing company that was on its way to introducing a new product. The company had a good idea of all the components needed to build it and the benefits the product would offer consumers. With that information, they assembled a Wheel team that included chemists, sales personnel, engineers, designers and corporate staff. The question they explored was: “What are the implications of bringing product X to market?”

Based on one of the key product details (that the product would be small and light), a sales person offered the following initial (1st Order) implication: “One possibility is that it will be thrown into the rear window of a car.”

When the team came around for the 2nd Order implications, a chemist responded to the “rear window” implication by saying, “One possibility is that it as it sits under the rear window of the car, it will be heated to above 175 degrees Fahrenheit as the sun shines on it.” While the rest of the team agreed that was a possibility, no one saw anything significant in it.

During the discussion of the 3rd Order (where many “aha” discoveries occur), the team began to list the possible 3rd Order implications that might arise as a direct result of the “175 degree Fahrenheit” 2nd Order implication. The chemist chimed in again by offering the following implication: “One possibility is that while it is 175 degrees or hotter, someone will remove it from the rear window shelf and attempt to use it.”

The chemist asked to take his 3rd Order implication out one more order (which is permissible in the process). He wrote the following implication: “One possibility is that when someone attempts to use the product, it will explode and blow his face off.” And this did not have a low likelihood of happening. Given the chemistry of the battery this company had designed into the product, it was a better than 95 percent likelihood.

As a result of doing this Wheel, the company saw the down-the-road risk and redesigned the product by getting their battery supplier to develop a battery that could not explode under those conditions or any other realistic situation. They introduced the product successfully to the market and never had an explosion.

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