

Using Evaluation to Develop a Wayfinding System

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Studies on wayfinding design show that evaluation has been used to improve elements of existing signage or to compare different combinations of wayfinding aids. Much less frequently have such studies reported on how formative evaluation was used to revise a wayfinding system completely.

At the Adler Planetarium & Astronomy Museum in Chicago, visitor data from extensive formative evaluation was used to guide decisionmaking on design revisions for a wayfinding system. Our design consultant fabricated inexpensive, laser-printed wall maps and directional sign prototypes that we placed throughout the building. These prototypes allowed us to make changes quickly and cheaply, so that we could test different versions of the signage systematically with visitors.

For this project our goal was to make a signage system that could help visitors navigate through our building quickly and easily. We held the assumption that if visitors could not figure out how to get somewhere, the signage design was at fault, rather than the visitor. Another important assumption we held was that no matter how talented and experienced the museum's team members were, it would be impossible for us to create an effective wayfinding system without feedback from visitors in the environment where the signage would be used.

The series of evaluations we devised were an attempt to break down wayfinding behavior into its component activities. In *Wayfinding: People, Signs and Architecture*, Paul Arthur and Romedi Passini (1992) refer to wayfinding as a "continuous problem solving process." The success of each wayfinding step depends on the success of the one before it, and these steps must be solved in a particular order. Therefore, we decided to conduct a series of evaluation studies based on the mental and physical steps that people go through to solve a wayfinding problem. We identified and tested component activities of the wayfinding process one by one, and built up the system incrementally.

Five in-house reports from these formative studies, plus a summative study assessing the final signage after installation, document this iterative process of development. In addition, a summary report discusses the overall process of evaluation in the development of Adler's wayfinding system: describing the intention of the studies, major findings, and implications of evaluation on signage development. All of these studies are available upon request.

Reference

Arthur, Paul and Romedi Passini. 1992. *Wayfinding: people, signs, and architecture*. Whitby, Ontario: McGraw-Hill Ryerson Ltd. 27-33.

How "Down to Earth" Is the Universe?

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A New Building for Adler's Visitors

In 1997, the Adler Planetarium and Astronomy Museum will break ground for a new building addition that will add significantly to the museum's physical presence on Chicago's lakefront. Together, the new and renovated buildings will contain approximately 40,000 square feet of exhibit space. The new wing, made almost entirely of glass, will provide visitors with an unequalled view of the day and night skies, as well as of Lake Michigan. In conjunction with this new construction the existing historic landmark 1930s building will be renovated, and a new Star Rider theater installed, featuring the latest digital sky-show technologies.

The Adler's addition is slated to open to the public in the summer of 1998, and with it will open three new galleries currently under development. The third gallery will open in spring 1999. These three galleries are the first of nine new exhibits that together will present astronomy content phenomenologically and in its historical and human context. In the broadest sense the goal of these three initial exhibits is to introduce visitors to our universe: defining its "realms" (Earth, solar system, Milky Way Galaxy, universe) and explicating the relationships and scales among the realms.

Working titles and main communication goals for these three galleries are:

Cosmic Sky: The universe can be pictured as objects in motion within four realms that you can see from Earth and interpreted using a few basic concepts.

Solar System: We live in the solar system, an active collection of many different worlds, all moving around the Sun and held together by gravity.

Stars & Our Milky Way Galaxy: From Earth we can observe our vast galaxy—the Milky Way—and begin to find what's out there, how it forms, and how it works.

The *Cosmic Sky* gallery will be the introductory experience for visitors to the museum, and the first exhibit they encounter after purchasing tickets. It will begin as a space immersion that, by way of special effects, dramatically suspends the visitor between Earth and the stars. This affective experience will encourage visitors to think about the ways that the universe has inspired both professional and amateur astronomers. A short theater experience (making use of the planetarium's Zeiss star projector) will introduce visitors to what they are able to see of the universe from here on Earth, and a series of models will help visitors develop a mental map of the universe's scale and structure. "How do we know all this?" is the question addressed in the last