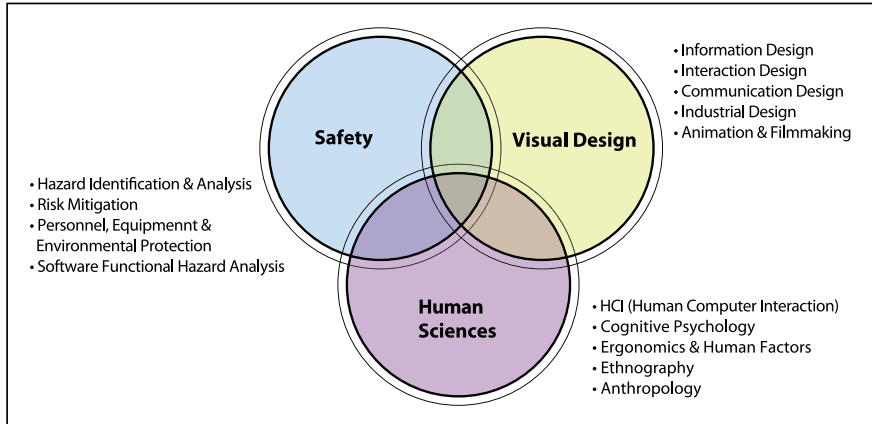




INNOVATION NETWORK

How the EDGE® Employs User Experience



❖ User Experience (UX) is applied using three basic principles:

- Interdisciplinary Collaboration (across all stakeholders)
- Frequent Prototyping (to quickly identify the good, the bad and the ugly)
- User Engagement (to validate assumptions and confirm operational relevance)

One notable result of good UX is an appropriate allocation of function between users and technology. People do the things they excel at, while the technology products and systems do the tasks to increase efficiency.

The growing problem with technology is that people have a hard time using it. The systems we use are getting more complex every day. As complexity grows, it begins to overpower our ability to deal with these systems. The User Experience (UX) approach provides a framework in which we can “tame complexity” to create a more intuitive experience for the users.

It is difficult to express the user’s intent sufficiently in a written specification. Often the team designing a product has no exposure to the user or his operating environment, and does not understand the “unstated” constraints on the system. The UX process pulls in the user as a design partner from day one and allows industry to design a system that not only meets requirements, but is intuitive and easy to use.

An EDGE member can benefit from UX by having the customer/user as part of the team, and by employing ergonomic methods in the design of their product. A Human-centered approach ensures a more relevant product concept, as the system that emerges will have been developed with the goals of end users at the center of all activities - from discovery to fielding. The EDGE uses the UX methodology to vet, balance and frame technical designs in the context of operational vision and tactical reality.

The UX process can validate requirements and test assumptions early to identify points of failure in the lab, which means reduced risk. The UX approach is optimized to capture misconceptions, bad assumptions, misunderstandings, and other inconsistencies early - when they are most straightforward and inexpensive to resolve - saving time and money historically spent executing downstream rework.

How Does It All Work?

- ❖ UX practices help build a better product by focusing first on operational context. We start by building an understanding of who the users are, from operators to maintainers and administrators, and how the system should operate to meet the needs of those users. This operational understanding drives the development of design concepts and product/system mock-ups, which are evaluated with users, in order to drive towards the safest, simplest, and most user-friendly solution. Keeping the users in the design process ensures that their needs are being properly interpreted and that the user community feels “ownership” of the design.

