

SMU Sustainability Dashboard Development Scope and Process

Current Scope and Features

1. While the Siemens' energy management data feeds are the primary elements and impetus for creating the sustainability Dashboard they only represent one piece of a larger story and set of initiatives that will be included in the Dashboard. The first phase needs to not only deliver the interface and integration of the Siemens feeds but create a platform/framework for growth and expansion.
2. Create an animated introduction that features the campus infrastructure and the relevant changes, their individual impacts and their cumulative effect on the school and the community.
3. Design and code development of a Dashboard and navigation system using the final 'frame' of the animated introduction and allow users to 'explore' the campus and the individual sustainability initiatives.

Dashboard Features

- Primary Dashboard view with icons and action buttons to provide navigation controls.
- Display view of each sustainability feature including:
 - Primary details of the feature with comparative impact
 - Energy saved
 - The impact of the change and energy savings
 - Other details
 - Energy Consumption Views (where available)
 - Gauges (Energy, Gas, Water)
 - Consumption history bar graph format
 - 12 month to date data in various measures
 - Greenhouse gas representation
 - Average Household (or other) Comparative

4. Navigation Approach

The Dashboard will require a hybrid navigation system that combines a non traditional 'explore' style navigation with elements of a traditional navigation system. The navigation will include:

- Customized navigation and guidance icons integrated into the campus 'map'
- On-demand features and in-line content reveals



- Anchor/Footer toolbar and reveal actions for special tools, and content including
 - Social Media, Sharing and Feeds
 - Twitter Feed Integration
 - Related Website/Resource Sites
 - Media libraries (videos, images etc...)
 - Do Research: Access Raw Data
 - How Can I help?
 - Newsletter
 - Green Tip
 - Academic Programs
 - Regeneration Pledge
 - Sustainability Timeline (linear picture of the projects on campus and their impact, the initiative start ups, the policy implementations, the society developments, etc)
 - Videos integration page
 - Calendar of Events

Sample Feature/Tool bars and Reveals:

- <http://msn.foxsports.com/nfl> (see footer of site)
- <http://www.slidedeck.com/>
- <http://www.homeauvi.com/best-buys-new-rocketfish-wireless-hd-adapter/> (see footer site)

Recommended Process

Step 1 Defining our primary messages and outcomes

- Define a shared focus and direction for organizing and structuring the content, the graphic design approach and features of the Dashboard.
- Create a shared decision making tool to ensure focus throughout the development process.

Step 2 Content and internal requirements planning

- A well documented content outline and hierarchy that acts as the 'road map' for the design and code development stages.
- Each Sustainability Feature will be evaluated independently to understand the content and interactive features that will be included in that specific section, including
 - Defining the style and format (video, text, charts feeds etc...)of the content.
 - Identifying any content relationships and dependencies that exist.

3 o'clock

- Defining the database structures and design and layout requirements.
- Special attention will be given to the 3rd party data feeds to understand their technical requirements and how they will be accounted for and integrated into the Dashboard to create a seamless system.

Step 3 Designs and Architecture Planning

- Create a wire frame and technical architecture as a combined design and technical system to define:
 - Content layout, presentation and hierarchy
 - Special tools and feature tool bars i.e. linking, sharing, sign ups, commenting etc...
- Navigation planning
 - User interactions and flow paths
 - How will users access content?
 - Dashboard responses and actions to user actions
- Technical Architecture
 - Coordinating the code and technology required to support the design, the user actions and desired Dashboard responses to user actions.
 - Define database structures for content

Step 4 User Interface/Dashboard Design

Creative development and design of the Sustainability Dashboard, including the design of the navigational elements, layout and presentation format for the content.

Step 5 Primary Coding and Development

The development of the base framework and technology required to make the design and content accessible and interactive.

Step 6 Integration of 3rd party content, feeds and features

Integration of the Siemens data feed and associated gauges and charts will be provided by QA Designs/Siemens.

Step 7 Testing and Process Revisions

Once complete a comprehensive testing process should be taken to ensure the Dashboard functions properly and the user action and responses defined in the planning stages respond as they should and determine if they achieve their desired effect. This stage begins the 'reality' testing of the Dashboard to evaluate the decisions made in the planning stages in a functional stage.

