# 4B: Digital Media For Energy Savings Moderator: Laura Cornish, Ecotagious

#### Ihno Lee, Tendril

### Fame & Validation: How User-Generated Content Can Drive Change

Long adopted by brands, user-generated content hasn't seen widespread adoption in the utility world. While consumer-focused brands such as Anthropologie, West End, Burberry, and Lego highlight on their websites how consumers are using their products, wearing their clothes and decorating their houses, utilities have been late adopters when it comes to highlighting how consumers are managing their energy. While people are already tweeting energy savings tips, liking utility updates and otherwise engaging with utilities on social media, utilities haven't yet begun to incorporate user-generated content into their behavioral energy efficiency programs. Home energy reports (HERs) show consumers how their energy usage compares to other similar households, but what if these reports also shared direct "peer to peer" tips and photos on how other households were saving energy? And what if these energy savings tips were to be recognized by their utilities and then broadcast on the front page of the HER? The desire for fame or public recognition on social media (e.g., YouTube, Instagram, Facebook, Twitter, etc.) stems from the need for social acceptance and validation; it's commonly expressed among Millennials and younger generations growing up in this Digital Era. Utilities can leverage this need for public recognition while helping consumers become a vocal and powerful advocate for change. This presentation will focus on how to turn our "selfie nation" into a self-propagating force for good; specifically, how utilities can leverage the desire for fame and validation as a motivator for consumers to take energy saving actions and spur others to do the same. We'll talk about what this would look like from a program design perspective, with insights into the underlying behavioral science and lessons from successful brands that incorporate user-generated content.

#### Joana Abreu, Fraunhofer CSE

#### User testing to improve user experience & utility program delivery

To be cost-effective, residential demand response programs that rely on connected devices require mass, mostly voluntary customer participation. Therefore, front-end web platform development need to be carefully designed to encourage user enrollment and engagement and prevent alienation or fatigue. Usability testing helps develop a deep understanding of behaviors, needs, and motivations by observing how customers explore the web platform and perform key tasks. The process starts by recruiting people that match the target population and inviting them to perform a series of tasks using the web platform designed to enroll and connect customers' Wi-Fi devices. By observing user cognitive and emotional responses, usability experts evaluate the product's adequacy with target-market customers and provide recommendations. Keeping this in focus, we user tested National Grid's ConnectedSolutions platform with four target users. User's verbal and emotional reactions were video-recorded, and notes were taken about user performance and examined against a pre-defined evaluation matrix. The tests revealed insights about user concerns and expectations. We also obtained information about technical issues that prevented users from successfully registering onto the platform. For example, there were issues regarding the way the information was presented on the website, the overuse of technical terminology, and lack of feedback of the interface in key registration moments. Tests also revealed usability concerns that were easily resolved. In this paper, we will discuss the user tests format and will share insights that

could improve the design and deployment of demand response user interfaces that rely on voluntary enrollment of residential customer's connected (Wi-Fi) devices.

### Melissa Piper, National Grid

### Motivating Residential Behavioral Load Curtailment Through Rewards

National Grid began implementing Smart Energy Solutions - Clifton Park, a New York REV demonstration, in 2017 to test a variety of services that leverage the interval data available through advanced metering functionality (AMF). Project offerings include an enhanced customer portal presenting both electric and gas near real-time consumption data, Green Button download capabilities, deep energy insights, and residential load curtailment. This presentation will focus on the ability of residential customers to curtail load during "Conservation Days" through behavioral changes, and earn rewards. National Grid may call up to twenty "Conservation Days" a summer through email notifications and use of social media. Customers then respond to these calls-to-action by curtailing their energy use during defined time periods by means of their choice. Customer engagement tools, including a portal that presents near real-time usage data and energy education provide suggested ways to curtail load. Predictive models are then compared to actual energy consumption as recorded through AMI metering. Curtailment determinations are made and customers are notified of points they are awarded for reduced usage. Points can then be exchanged for various gift cards. Over 13,000 residential electric AMI meters and over 11,500 gas ERTs with interval capabilities were installed in Clifton Park for this REV demonstration. Summer 2017 was the first season of "Conservation Days". Seven curtailment events were called last summer with points being awarded to over 50% of eligible customers. "Conservation Days" will be run this summer and summer 2019. This summer will be the introduction of two-tiered rewards, where larger residential load reductions will be awarded higher levels of points.

# Paul McDonald, Oracle Utilities

# The digital behavioral portfoliolayering engagement to create new DSM opportunities

The digital behavioral portfoliolayering engagement to create new DSM opportunities In this session, you will learn how utilities are -- Layering digital behavioral communications to create incremental energy efficiency beyond traditional paper "home energy report" programs -- Creating incremental energy efficiency from customer online activity using home energy analysis tools (audits), including best practices for driving customers to online audits With evolving EE standards and budgets, new load management challenges, and rapidly changing customer expectations, utilities are increasingly looking to assemble new digital EE solutions for their customers. This session will explore how utilities are using a combination of behavioral nudges -- from bill alerts and seasonal insights to targeted digital campaigns and peak day notifications -- to build on the foundation of an existing paper-based program, or create new digital-only offerings. These new program designs give utilities added flexibility in creating cost-effective portfolios of behavioral communications. The session will focus on how behavioral components can be assembled to create effective new program designs and will review third-party validated results of from web and digital savings programs. The session will finish with a discussion of the implications of this approach for new behavioral load management challenges, including load shifting and supporting TOU and complex rate implementations.