

Policies targeting Behavioral Challenges involving Vehicle to Grid Integration

UCLA

**Luskin Center
for Innovation**

Lessons from Residential Demand Response

Gamification:

1. Stage the choice occasion: build awareness & anticipation,
2. Make rewards immediate and tangible,
3. Reward sustained incremental progress through status and streaks incentives,
4. Provide local social comparisons

Although effective, small rewards lost their power to sustain cooperative behavior over time. Automation is a superior strategy.

Lessons from Literature on Behavior

1. Behavioral challenges are greater than technology challenges now.
2. TOU EV rates work when drivers have discretion about when to charge,
3. EVSE are not yet priced optimally given their financial costs
4. Synchronizing supply of connected EVs with demand for grid services is great challenge.
5. Who will pay for the grid services? Existing DR programs have not been financially viable.