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**Comments by Generac Power Systems in Lead Comm'r Workshop
on SB 846 Preliminary Load Shift Goal**

Additional submitted attachment is included below.

May 3, 2023

California Energy Commission
Docket Unit, MS-4
715 P Street
Sacramento, CA

RE: 21-ESR-01 Lead Commissioner Workshop on SB 846 Preliminary Load Shift Goal - Comments

Generac would like to thank the CEC for the opportunity to provide comments on the SB 846 Load Shift goal as explored in April 28th's Lead Commissioner Workshop. Generac will be addressing similar issues related to its other DER services and products in comments to be filed in the Docket No. 22-RENEW-01 – Reliability Reserve Incentive Programs.

The Commission clearly acknowledges the central role that automation technology must play in successfully deploying dynamic pricing. Indeed, a Brattle Group study shows that residential customers who are on time of use rates and own enabling technology such as smart thermostats reduce their peak demand by an incremental 5% to 15%, compared to when no such technology is present. For example, actual California-specific TOU impacts of the eco+ thermostat optimization platform were evaluated by a third-party for 2020 and found to match with this 5-15% range. Ecobee, of which Generac is the parent company, offers an optimization platform called eco+ which tailors an algorithm unique to a given customer for the optimization that best represents their comfort preferences and the thermal profile of their home. (Details of the third-party evaluation can be found at <https://www.ecobee.com/en-us/ecoplusemv/>.)

Many states, including California, have aggressive renewable portfolio standards, challenging grid reliability with intermittency and weather dependency that complicates net load forecasting. A high proportion of renewable power requires increased demand flexibility resources that can be easily and seamlessly dispatched to manage rapidly changing production patterns and avoid shortages or blackouts.

Additionally, utility program managers are currently disincentivized to invest in load flexibility because of the siloed nature of existing public policy and utility programs.

The categories in the load shift proposal do not seem to contemplate a role for technology such as smart thermostats. These are currently bucketed into either Demand Response or Energy Efficiency categories, which does not wholistically capture their full value to the grid or to customers. The metrics used to evaluate these programs for cost-effectiveness on a kWh or kW basis do not account for thermostats' ability to shift load and reduce emissions on a continuous daily basis.

Further, DR and EE programs are generally treated from a regulatory accounting perspective as operating expenses, so utilities are not allowed to realize a return on equity as they do for generation resources. Beyond meeting mandates to invest in the programs, utilities therefore have weak incentives to maximize the potential of these resources.

The solution to the barriers posed by siloed DR and EE buckets and weak utility incentives is to establish a mandate for it like energy efficiency resource standards, without which the current robust targets would not exist. This would create the incentive to scale load flexibility, especially when its cost effectiveness is measured based on GHG savings that wholistically capture its value to the grid, rather than measuring based on peak reductions or overall energy savings only.

The CEC should leverage the opportunity in this proceeding to scale demand flexibility in California by establishing load flexibility targets which would help de-silo existing EE and DR programs.

Respectfully submitted,

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