Office of the Secretary
Service Date
March 9, 2011

BEFORE THE IDAHO PUBLIC UTILITIES COMMISSION

IN THE MATTER OF THE APPLICATION OF IDAHO POWER COMPANY FOR APPROVAL OF REVISIONS TO THE IRRIGATION PEAK REWARDS PROGRAM, SCHEDULE 23	CASE NO. IPC-E-10-46 ORDER NO. 32200

On December 10, 2010, Idaho Power Company filed an Application requesting approval of changes to its Irrigation Peak Rewards Program (Schedule 23). The Program is a voluntary load control program for agricultural irrigation customers and is used to decrease the Company's system summer peak by interrupting service to specified irrigation pumps during June 15 through August 15. For Program participants, the Company interrupts specified irrigation pumps any Monday through Saturday between the hours of 1:00 p.m. and 8:00 p.m., up to a maximum of 60 hours per season. The Company uses either dispatchable or timer-based load control devices to interrupt selected pumps for a limited number of hours. In exchange for allowing the Company to interrupt electric service, participating customers receive a monthly incentive payment in the form of bill credits during June, July and August.

Based on a review the Company completed during 2010, Idaho Power proposed the following changes to the Peak Rewards Program:

(1) Change the incentive payment from a fixed payment to a combination of a fixed and variable payment, and pay the variable portion of the incentive by check after the end of the Program season;

(2) Modify the Dispatchable Option 3 requirements to fit the fixed and variable payment structure;

(3) Change the opt-out penalty to $1.00 per kW for Dispatchable Options 1, 2, and 3;

(4) Extend the interruptible period from 8:00 p.m. to 9:00 p.m. on a voluntary basis;

(5) Implement one program test event per season that is not subject to a variable payment; and,

(6) Add language specifying that Program participation may be limited based on the Company's need for peak load reduction.

The Company states that the Program, as revised, would more closely align the Program incentives with the Company's need for demand response resources.

On January 12, 2011, the Commission issued a Notice of Application and Notice of Modified Procedure establishing a time period for the filing of written comments. The Idaho Conservation League (ICL); Idaho Irrigation Pumpers Association, Inc.; and Commission Staff filed written comments. In addition, many irrigation customers filed comments, most expressing concern that reducing the level of compensation could devalue the Program for irrigators, resulting in a loss of Program participants. The Idaho Conservation League supports the Company's proposed changes to the Program, while Staff and the Irrigators oppose some of the changes. Idaho Power filed reply comments on February 16, 2011.

After review and consideration of the record, the Commission in this Order approves some of the changes to Idaho Power's Peak Rewards Program. Each change requested by the Company and the associated comments will be discussed in turn.

1. Change the Incentive Payment Structure

The current Program pays a fixed amount to each participant whether or not Idaho Power exercises its ability to interrupt service during the irrigation season. Last year, the Company paid participating irrigators approximately $11.5 million and interrupted service on three occasions. Idaho Power proposed to change the payment structure from a fully-fixed amount so that participants are paid a variable amount based on the Company's actual interruption of service. If no interruptions are called, the participants would not be paid the variable portion of the compensation. Idaho Power proposed that 40% of the amount be fixed and 60% of the compensation amount be variable. The Company also proposed paying the variable portion no more than 60 days after the August 15 end date of the Program, stating this will "avoid issues with its billing system" and "highlight to the participants that they are paid the fixed incentive through the bill credit and that the variable portion of the payment is based on the amount of time the Program operates." Pengilly Dir., pp. 23-24, ll. 20-23, 1-2.

Staff supported changing the incentive structure from a fixed incentive payment to a combination of fixed and variable incentive payments. Staff disagreed, however, with the Company's proposal to base the fixed and variable incentive payments on the short-term variations in needed demand response. Staff suggested the Company design the incentive payments to ensure the Program remains a long-term reliable resource, with consistency from year to year so participation levels do not drop. Although the Company stated it "anticipates that the proposed level of fixed incentive will be adequate to retain current participants," Staff asserted that the Company did not provide information to demonstrate the proposed incentive payments will not cause customers to abandon the Program. Pengilly Dir., p. 17, ll. 5-7.

Staff also disagreed with the Company's approach for determining the fixed incentive amount because it fails to value the Program as a long-term resource. Staff Comments, p. 4. Staff suggested the proportion of fixed costs necessary to build and operate a simple-cycle peaking plant would be a more appropriate guideline for determining the proportion of fixed Program incentives. Staff expressed reservations about the Company's determination of the split between the fixed and variable payment amounts, but Staff did not make a separate recommendation of a more appropriate allocation. Staff Comments, pp. 4-5.

ICL also supports the proposal to change the incentive payments from 100% fixed to a fixed/variable structure. ICL noted the dual value of the Program: "It is appropriate to pay a certain amount to irrigators for them to essentially stand by. It is also appropriate to pay a certain amount to irrigators when Idaho Power actually curtails their loads." ICL Comments, p. 3. ICL did not comment on the specific allocation proposed by Idaho Power, stating ICL "does not have the technical expertise to determine if the specific monetary amounts the Company proposes are appropriate." *Id.*

The Irrigators oppose the Company's proposal to add a variable component to the incentive payment structure. Noting that the change would reduce the fixed payment amount from $32 per kW to $12.78 per kW, the Irrigators stated their major concern is the impact the change will have on the number of customers willing to participate over time. Irrigators Comments, pp. 9, 11-12. The Irrigators stated they made improvements and adjustments to their individual systems to allow for up to 60 hours of interruption per year, and if payments are significantly reduced, irrigators will not recover their costs and will abandon the Program. The Irrigators urged the Commission to reject Idaho Power's proposal to change the credit payments from a fixed amount to a fixed/variable structure where only 40% of the payment amount is fixed. Irrigators Comments, p. 13. If the Commission determines it is appropriate to lower the Program costs, the Irrigators suggest reducing the fixed payment to $25 per kW (by reducing the maximum number of interruptible hours from 60 to 28) which "would go a long way to maintaining the present level of participation in the dispatchable Program." Irrigators

Comments, p. 15. The result would be a fixed component of 75% and a variable component of 25%.

In reply comments, Idaho Power indicated it could support different allocations of fixed and variable costs than it proposed. The Company noted that Staff's suggestion to base the split on fixed and variable costs to operate a simple-cycle peaking plant would result in a 50-50 allocation between fixed and variable payments. Accordingly, Idaho Power stated it "can mathematically support an incentive level of 50 percent fixed incentive payment and 50 percent variable incentive payment with the variable portion based on the number of hours a participant is interrupted through the Program." Idaho Power Reply Comments, p. 9. The Company also proffered a third possibility should the Commission determine that neither the 40/60 nor 50/50 allocation of fixed and variable payments is appropriate. The Company stated "a logical minimum variable payment basis would be to set the variable portion of the incentive at or above the 30-year levelized variable cost of a simple-cycle combustion turbine." Idaho Power Reply Comments, p. 9. This would result in a ratio of 75% fixed and 25% variable. Idaho Power Reply Comments, pp. 9-10. At least one of the individual irrigation customers who filed written comments also recommended the 75%/25% allocation.

Based on this record, the Commission finds that it is reasonable and prudent to authorize a change to the incentive payment structure to include a variable compensation amount. Because Idaho Power's use of the curtailment offered by the Program varies from year to year, it is reasonable to base a portion of the Program costs on actual interruptions during the irrigation season. The Company's original proposal, however, would constitute a significant change to the overall incentive payment amount and is not sufficiently supported in the record. The Peak Rewards Program has been effective in reducing Idaho Power's summer peak demand. Significantly altering the incentives to irrigation customers could cause customers to drop out, thereby reducing the Program's effectiveness. The Commission finds that changing the incentive payment amount to include a 25% variable portion is fair and reasonable. The Irrigators recommended this allocation as adequate to keep customers in the Program, and Idaho Power's reply comments agreed an allocation of 75% fixed and 25% variable is justifiable.

Regarding payment of the variable incentive amount after the end of the irrigation season, both Staff and the Irrigators recognize this change would be appropriate if the payment structure includes a variable amount. Both also suggested, however, that it could be paid sooner than the 60 days proposed by Idaho Power. In reply comments, the Company agreed to shorten the time from 60 days to 45 days. Idaho Power stated that a period shorter than 45 days is unworkable "given that meter data necessary to calculate the variable incentive is not available until 30 days after the Program ends." Idaho Power Reply Comments, p. 11.

Because part of the incentive payments will be determined after actual curtailments are known, it is appropriate for Idaho Power to pay the variable incentive payments after the close of the Program season. Idaho Power agreed to shorten the time for payment to 45 days, and the Commission finds this payment schedule to be fair and reasonable.

2. Dispatchable Option 3 Modifications

The Company proposed three modifications for Dispatchable Option 3 customers. Option 3 irrigators are those with more than one pump per meter and who operate at least 1,000 cumulative horsepower. There are only 12 Option 3 customers. Irrigators Comments, p. 17. Option 3 participants currently have the option to vary their participation during each curtailment. With a change in the incentive payment structure to include a variable component, the amount of the fixed incentive payment will change. Thus, the Company proposed that Option 3 participants identify their demand reduction prior to June 1 of each year so it can determine the fixed incentive to pay them.

Staff supports the Company's proposal to use participants' nominated load reduction, in the absence of an event, to more accurately reflect their contribution to the Program during a curtailment. Similar to Options 1 and 2 customers, Staff stated it is reasonable to have Option 3 participants nominate demand prior to the Program season. ICL also supports this change to ensure Idaho Power has "the ability to accurately track whether the participant actually delivers what they propose to." ICL Comments, p. 3.

The Irrigators object to the proposal to require Option 3 customers to identify their load reduction in advance. The Irrigators contend that Option 3 was designed to allow the small number of large use customers to participate to the extent possible when a curtailment is called. Requiring these customers to identify their load reduction in advance greatly reduces the flexibility for these customers, the main purpose for Option 3, according to the Irrigators. Irrigators Comments, p. 18.

In its reply comments, Idaho Power contends the nomination requirement "will allow Idaho Power to better plan its capacity during interruptions, but will not limit the ability to participate." Idaho Power Reply Comments, p. 12. The Company stated it is not its intent to reduce Option 3 customers' flexibility and that a customer concerned about his ability to reduce load could participate but identify zero kW as the proposed curtailment. In that event, the customer's fixed and variable incentive payments would reflect the loads actually turned off; the nominated kW would be used to determine the customer's incentive payment when no curtailment occurs and is the basis for the calculation of the opt-out penalty. Idaho Power Reply Comments, p. 12.

The second change Idaho Power proposed for Option 3 customers is to implement an opt-out penalty. Option 3 currently does not have an opt-out penalty because participants provide varying curtailment amounts during each particular interruption. The proposal applies an opt-out penalty to the difference between what a customer actually provides and what the customer nominated in advance.

Staff believes it is reasonable for Option 3 participants to pay an opt-out penalty under an appropriately established fixed and variable incentive structure. If an opt-out penalty is not included in the proposed incentive structure, Staff stated that participants could receive a fixed payment for capacity they may not provide. Absent an opt-out penalty, a participant may not completely curtail what is nominated during an event, but would still receive the fixed incentive based on the nomination. Staff Comments, p. 6. ICL also supports adding an opt-out penalty to Option 3, stating a penalty "is critical to ensure the resource is there when Idaho Power needs it." ICL Comments, p. 4.

The Irrigators oppose an opt-out penalty for Option 3 customers as inconsistent with the purpose of that option. Option 3 allows participation by large use customers who cannot be subjected to automatic interruptions like Option 1 and 2 customers, and provides the customer flexibility to "manage his system as best as he could in order to provide a substantial level of interruption." Irrigators Comments, p. 19.

Idaho Power did not address the opt-out penalty for Option 3 in its reply comments.

The third change proposed for Option 3 is to the baseline from which participants' load reduction is calculated. Currently, participants' load reduction is calculated by subtracting the average demand during a curtailment from a baseline, defined as maximum demand 24 hours prior to an event. The Company proposed to revise calculation of the baseline by using the 12-hour nighttime period (10:00 p.m. and 11:00 a.m.) prior to a curtailment.

Staff disagreed with the Company's proposal to use the maximum demand during the 12-hour nighttime period to determine baseline. Staff noted the Company's rationale behind the proposal is to limit gaming by participants in order to receive a larger credit. Staff Comments, p. 6. The Company provides participating customers notice of a pending curtailment by 4:00 p.m. on the day prior to the curtailment, and Staff believes the Company's proposal would inaccurately capture normal usage. If customers increase their overnight usage in anticipation of being curtailed the following day, the load reduction estimate might be too high. If participants begin to shut down early in anticipation of being curtailed, the load reduction estimate might be too low. Staff agrees that the current way of calculating participants' load reduction could overestimate normal usage because it is based on a single spike in usage, but Staff disagrees that the proposal would result in a more accurate estimate than the current method. Staff Comments, p. 7. Staff suggested the Company use the day prior to the event notification to establish a baseline, by averaging participants' usages over the same period in which the actual event occurred. Staff Comments, p. 7.

The Irrigators describe the proposal to change the baseline to calculate Option 3 customer credits as "an overreaction to a non-existent problem." Irrigators Comments, p. 19. The Irrigators do not believe gaming of the system is a problem, but "agrees that measures should be in place so that gaming does not take place." Irrigators Comments, p. 20. The Irrigators recommended the maximum demand be measured from the 24-hour period prior to the *announcement* of a curtailment, rather than the 24 hours prior to *commencement* of the curtailment. *Id.*

In its reply comments, Idaho Power agreed to adopt a methodology similar to that proposed by Staff and the Irrigators, "with one small clarification." Idaho Power Reply Comments, p. 12. The Company proposes to use the maximum demand in the 24 hours preceding 2:00 p.m. of the curtailment announcement day to establish the baseline to calculate credits. *Id.*

Idaho Power proposed the three changes specific to Option 3 customers to make their program compatible with adding a variable piece to the incentive structure, and to make Option 3 similar to other program participant terms. The Commission finds that the three changes to Option 3 are reasonable and appropriate, in light of the Commission's determination to make 25% of the Program incentive payments variable. With the addition of a variable component, the amount of the fixed incentive payment will change, and it is reasonable for Option 3 participants to identify their demand reduction prior to June 1 of each year so Idaho Power can determine the amount of the fixed incentive. Participants may set their demand reduction at a level they are comfortable they can provide and may select zero and be paid the variable incentive if they participate in an event.

The Commission also finds it reasonable for Option 3 participants to pay an opt-out penalty under a fixed and variable incentive structure. If an opt-out penalty is not included, Option 3 participants could receive a fixed payment for capacity they do not provide. An Option 3 participant could choose to not curtail the full amount nominated during an event, but in the absence of an opt-out penalty, would still receive the fixed incentive based on the nomination.

Regarding the change in the baseline from which participants' load reduction is calculated, Idaho Power agreed to adopt a methodology basically the same as that proposed by Staff and the Irrigators. Idaho Power Reply Comments, p. 12. The Company proposes to use the maximum demand in the 24 hours preceding 2:00 p.m. of the curtailment announcement day to establish the baseline to calculate credits. *Id.* The Commission finds this change for Option 3 participants to be supported in the record, and fair and reasonable.

3. Opt-out Penalty for all Program Participants

The Company proposed to change the opt-out penalty from the current $0.005 per kWh of a current month billing to $1.00 per kW of demand. The proposed penalty will "make it easier for customers to estimate what an opt-out is going to cost ahead of time, which could influence their decision to opt-out." Pengilly Dir., p. 19, ll. 12-15. The Irrigators, ICL and Staff all recommended approval of this change to the Program. Staff compared the current penalty to the proposed $1.00 per kW opt-out penalty in a number of scenarios, and determined the proposed opt-out penalty is lower and easier to calculate. Staff Comments, p. 7. Similarly, the Irrigators describe the change as "far easier to determine for an irrigator." Irrigators Comments, p. 22.

The Commission finds that changing the opt-out penalty formulation as proposed by Idaho Power is fair and reasonable. All parties that commented agreed that changing it to $1.00 per kW of demand is easier to calculate and identify.

4. Extending the Interruptible Period to include 8:00 p.m. to 9:00 p.m.

Idaho Power proposed to include the hour from 8:00 p.m. to 9:00 p.m. as available for curtailments, and make participation during that hour optional rather than mandatory. The Company also proposed paying the "Extended Interruption" customers $0.05 per kWh more than the "Standard Interruption" during every interruption. The Company determined the additional incentive based on a theoretical 2011 dispatch during the extended hour, and the estimated incentive necessary to encourage participation during the extended time.

Staff supports the Company's proposal to extend the interruptible period from 8:00 p.m. to 9:00 p.m., but recommended making the extra hour mandatory rather than optional. According to Staff's analysis of the Company's load duration study, it is necessary for the Company to extend the interruptions beyond 8:00 p.m. to fully utilize the operational impact of the Program. Staff Comments, p. 7.

ICL supports the extended interruption period and the increased variable incentive for customers who participate during the 8:00 p.m. to 9:00 p.m. hour. ICL stated that extending the eligible time for interruption by one hour will allow the Company to more precisely match system peaks. ICL Comments, p. 2.

The Irrigators do not oppose the proposal to extend the interruptible time period, but "believes that the proposal is ill conceived." Irrigators Comments, p. 20. Irrigators describe the proposed additional incentive as low and not readily apparent to customers, and determined with little sophistication. Irrigators Comments, p. 21. The Irrigators stated the "extended interruption period is not well thought out and is not economically designed to bring a strong response, [but] there is no harm to the dispatchable Program by the adoption of such a provision." Irrigators Comments, p. 22. One irrigation customer who filed comments objected to making the extended hour mandatory as suggested by Staff.

In reply comments, the Company stated the additional, optional hour for interruptions will help reduce loads across the entire peak period and provide participants an opportunity to receive higher payments. Idaho Power does not propose to make it mandatory because some irrigation customers already informed the Company they would not participate if interruptions after 8:00 p.m. were mandatory. Idaho Power Reply Comments, p. 14. The Company stated it "believes that approval of the extended interruption period from 8:00 p.m. to 9:00 p.m. will allow the Company to better address the entire peak period because the available hours will be inclusive enough to enable the Company to decrease both the early and later peaks by varying interruption periods throughout the Program's hours of operation." Idaho Reply Comments, p. 15.

The Commission approves the change to add one hour – from 8 p.m. to 9 p.m. – to the Program. The Commission agrees with the Company's proposal to make it optional rather than mandatory, to maintain flexibility in the Program for participants. Adding the additional hour on a voluntary basis increases the potential effectiveness of the Program as well as the flexibility of individual customers who may be in a position to curtail usage during the added hour.

5. One Annual Program Test Event

The Company proposed to allow for one Program test interruption per season that is not subject to a variable payment. The Company currently tests its dispatchable control device communication prior to each season, but does not implement a full pre-season interruption to test every aspect of the Program.

Staff supports the Company's proposal to include one Program test event per season. Staff believes it is important for the Company to test the reliability and timeliness of interruptions to assure the capacity will be available when needed. Staff Comments, p. 8. With variable incentive payments as part of the Program, Staff also believes it is reasonable that the test event not be subject to a variable payment. Staff Comments, pp. 8-9.

ICL also supports adding one test interruption per season, describing it as "prudent and effective strategy to ensure reliability." ICL Comments, p. 3. ICL also agrees it should occur without cost of the variable incentive, instead, "the testing should be considered part of the standby value captured in the fixed incentive portion." *Id.*

The Irrigators recommend the Commission disallow the proposal for one free test interruption per season, for several reasons. First, the logic for a test event applies only if Idaho Power calls for no interruptions in the season. The Irrigators have prepared for maximum interruptions under the Program. Second, because the Program has successfully existed for several years, it should not be necessary to test equipment and communication channels. Nor should it be necessary to institute a test curtailment in order to "keep the Irrigators honest." Irrigators Comments, p. 16. Finally, the Irrigators contend implementing a test event suggests Idaho Power lacks incentive to maximize use of the curtailment program. Under current terms of the Program, Idaho Power pays the same whether it curtails under the Program or not. By adding a variable cost, the Company has a disincentive to curtail under the Program. Adding a test interruption removes the disincentive to test the Program but does not give the Company incentive to maximize use of the Program.

In reply comments, the Company stated simply that it "proposes that one event be included as part of the fixed payment, which is essential to remove any disincentive for the Company to use the Program at least once during the Program season to monitor electronic interruption systems and to assess Program performance." Idaho Power Reply Comments, p. 15.

On this record, the Commission cannot find adequate justification to allow for one test event that would not include payment of the variable component. Idaho Power now has several years' experience with the Program, and should be familiar with operational efficiencies and requirements. The Company did not provide convincing evidence that a test interruption, without compensation to Program participants for the variable component, is necessary for operation of the Program. With experience gained this year with the new payment structure, the Company may obtain information to support inclusion of a free test interruption each year. If so, that information can be provided to the Commission after conclusion of the irrigation season.

6. Limiting Program Participation

Idaho Power proposed to add "clarifying language" to the Program tariff "to emphasize that the Company may limit participation in an effort to better align the Program with capacity needs." Idaho Power Reply Comments, p. 16. Staff recommended the Commission deny the Company's proposal to add the limiting language, and stated the Company should not only accept participants but should promote the Program in order to achieve peak load reduction over the long term. If the Company has a short-term view of demand response and limits the Program's growth because of short-term variations in its need for peak load reduction, rate payers will end up paying for new, expensive generation facilities sooner than they otherwise would. Staff Comments, p. 9. The Irrigators also strongly opposed language to limit participation in the Program. In reply comments, the Company conceded, "in the larger context of the Program's tariff, the proposed clarifying language is not necessary." Idaho Power Reply Comments, p. 16.

On this record, the Commission finds that adding language to limit participation in the Program is not necessary, and could unduly discourage participation.

ORDER

IT IS HEREBY ORDERED that Idaho Power Company's Application for approval of revisions to the Irrigation Peak Rewards Program, Schedule 23, is approved in part. Specifically, the Commission approves (1) a change in the incentive payment amount to include a 75% fixed and a 25% variable portion, with payment of the variable incentive amounts to occur within 45 days after close of the Program season; (2) the three changes to Option 3 requiring participants to identify their demand reduction prior to June 1, to pay an opt-out penalty if they decline to participate during a curtailment, and to change the baseline from which participants' load reduction is calculated, using the maximum demand in the 24 hours preceding 2:00 p.m. of the curtailment announcement day to establish the baseline; (3) change the opt-out penalty from the current $0.005 per kWh of a current month billing to $1.00 per kW of demand for all Program participants; (4) add one hour – from 8 p.m. to 9 p.m. – to the Program on an optional basis.

IT IS FURTHER ORDERED that the proposals to add one free test event per season and language to the tariff to limit participation are not approved.

THIS IS A FINAL ORDER. Any person interested in this Order may petition for reconsideration within twenty-one (21) days of the service date of this Order. Within seven (7) days after any person has petitioned for reconsideration, any other person may cross-petition for reconsideration. See *Idaho Code* § 61-626.

DONE by Order of the Idaho Public Utilities Commission at Boise, Idaho this 9th day of March 2011.

JIM D. KEMPTON, PRESIDENT

MARSHA H. SMITH, COMMISSIONER

MACK A. REDFORD, COMMISSIONER

ATTEST:

Jean D. Jewell
Commission Secretary

bls/O:IPC-E-10-46_ws2