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IN THE MATTER OF THE APPLICATION OF ARIZONA PUBLIC SERVICE COMPANY FOR APPROVAL OF ITS 2010 ENERGY EFFICIENCY IMPLEMENTION PLAN	DOCKET NO. E-01345A-08-0172 **REQUEST FOR NEW ENERGY EFFICIENCY PROGRAM APPROVAL**

In Decision No. 71444 (December 23, 2009), the Arizona Corporation Commission ("Commission") ordered Arizona Public Service Company ("APS" or "Company") to file a residential repayment financing program ("Financing Program") as a supplement to the Company's 2010 Energy Efficiency Implementation Plan. The Financing Program is intended to respond to the Commission's concern that the Company's exclusion of a residential repayment financing program would detrimentally limit the reach of energy efficiency programs at a time when all efficiencies must be pursued, and all APS customers should be afforded a fair and realistic opportunity to access cost saving energy efficiency measures.

The Company is seeking the Commission's approval of the Financing Program for residential customers, which Financing Program is attached as Exhibit A to this filing.

RESPECTFULLY SUBMITTED this 26th day of February 2010.

Arizona Corporation Commission
DOCKETED
FEB 26 2010
DOCKETED BY

By: Thomas L. Mumaw
Thomas L. Mumaw
Linda J. Benally
Attorneys for Arizona Public Service Company

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Exhibit A

ARIZONA PUBLIC SERVICE COMPANY

RESIDENTIAL ENERGY EFFICIENCY FINANCING REPORT AND APS'S PROPOSED RESIDENTIAL ENERGY EFFICIENCY FINANCING PROGRAM

In Compliance With
Commission Decision No. 71444 dated December 23, 2009
Docket No. E-01345A-08-0172

February 26, 2010

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EXECUTIVE SUMMARY

This report describes Arizona Public Service Company's ("APS" or "Company") development and proposed implementation plan for a residential energy efficiency financing program ("REEF" or "Program") in response to Decision No. 71444. The REEF would involve an initial $1.5 million commitment from a third party lending source (National Bank of Arizona) to offer APS residential consumer loans ranging from $1,000 to $20,000 to help provide customers with the capital needed to make cost effective home energy efficiency upgrades. The Program (summarized below) would use customer rebate dollars to help buy down interest rates, and additionally, APS would invest in a Guaranty Reserve Account in order to provide APS customers with below market interest rates in the range of 6.5% to 7.99% on approved energy efficiency projects. The Program is intended to meet a diverse range of consumer financing needs; therefore, both secured and unsecured loans would be offered with flexible payment terms between 12 to 120 months.

In an effort to make the REEF easy to use for customers, APS plans to market the Program as part of the Home Performance with ENERGY STAR® home audit program ("Home Performance Program")[1] and offer customers loan pre-approvals by phone at the time that contractors are making audit recommendations. To remind customers of the benefits that will result from financed projects, APS plans to provide the lender with a quarterly special statement in the financing bill that indicates the amount of estimated savings resulting from the energy efficiency work performed. APS believes that the REEF program design will offer significant benefits for APS customers while leveraging private capital funds to minimize program costs and maximize cost effectiveness.

APS's Proposed REEF Program elements include:

- Third party financing through National Bank of Arizona ("NBAZ") capped initially at $1.5 million;
- Guaranty Reserve Account on deposit with NBAZ to lower interest rates and to cover default costs;
- Loans available between $1,000 and $20,000 for 12 to 120 months, either secured or unsecured;
- Loan qualification criteria based on customers' APS payment history and bank underwriting criteria to manage risk;
- Fully integrated into Home Performance Program through implementation contractors; and
- Third party billing by NBAZ, which may include an accompanying energy savings report.

[1] Approved by the Commission in ACC Decision No. 71444 (December 23, 2009).

I. INTRODUCTION

This report describes the potential options APS considered in developing the REEF. This report was prepared in response to Decision No. 71444:

> IT IS FURTHER ORDERED that Arizona Public Service Company file a residential repayment financing program, as a supplement to the 2010 implementation application, which will address timeframes for implementation of such a program and tariffs. The supplement shall include an option for on the utility bill repayment and an option which would allow customers the option to repay energy efficiency measures through a parallel bill in a manner similar to the utility bill. *ACC Decision No. 71444 at 24.*

This report discusses various frameworks for how a residential energy efficiency financing program could be structured and the advantages and potential disadvantages of each approach. Based on this analysis, APS provides a recommended program design for the implementation of a REEF.

II. BACKGROUND

APS began implementing the current portfolio of demand side management ("DSM") energy efficiency programs in 2005. Based on the residential energy efficiency measures which were included in the programs through 2009, financing was either not necessary to drive program participation (e.g., the energy efficient compact fluorescent lighting program) or was already being offered through other channels (e.g., new home builder financing, air conditioning manufacturer financing).

With the inclusion of new programs in 2010 such as the Home Performance Program, which promotes comprehensive energy efficiency home upgrades, APS understands the value of offering financing options to customers to help cover the higher upfront costs of these extensive energy efficiency retrofits. Although many vendors offer financing for their products, the comprehensive approach to home energy upgrades in the Home Performance program cuts across several potential product manufacturers/vendors and includes actions not traditionally financed such as home air and duct sealing jobs.

To meet one of the provisions of the 2009 Rate Case Settlement Agreement, APS began to research financing programs for non-residential customers in mid 2009.[2] APS also decided to research residential financing program options in anticipation of introducing the Home Performance Program. The Commission's order in December 2009 accelerated the Company's focus on residential financing and expanded discussions to include several potential implementation options including "on the utility bill" repayment.

[2] See ACC Decision No. 71448, Exhibit A, Paragraph 14.11 (December 30, 2009).

III. GOALS AND ISSUES ASSOCIATED WITH DEVELOPING AND IMPLEMENTING A RESIDENTIAL ENERGY EFFICIENCY PROGRAM

One of the major barriers to greater energy efficiency for most homeowners is the lack of funds to complete major energy efficiency home upgrade projects. By offering special financing in addition to (or in some cases potentially in lieu of) rebates, a residential financing program can increase customer participation in energy efficiency programs and expand the pool of customers that can afford to participate. As such, financing can be a valuable tool for helping to achieve aggressive DSM program savings goals. However, financing programs are complex and can be difficult and costly to implement; therefore, there are relatively few utilities that offer residential financing programs at this time.

According to the Southwest Energy Efficiency Project ("SWEEP") report Recent Innovations in Financing for Clean Energy, "[o]nly a few financial institutions have participated in energy efficiency or renewable energy lending programs so far... Likewise, relatively few utilities offer financing for energy efficiency measures or projects. Broader participation from banks, utilities, and other lenders will be needed in order to move energy efficiency financing into the mainstream."[3] Further, among those utilities that are offering financing programs, there is no one universal model that is considered optimal for all utilities. Nevertheless, as utilities strive to meet aggressive energy savings goals amid the poor economy, there is currently an increasing national interest in the potential for energy efficiency financing.

IV. DESIGN PARAMETERS

Energy efficiency financing programs can be implemented in a wide variety of ways, and there are many different program design parameters that must be considered in structuring a successful program. The design parameters are: (1) Sources of Capital, (2) Interest Rates, (3) Loan Terms, (4) Loan Types and Amounts, (5) Risk Management, (6) Program Integration, (7) Ease of Use, and (8) Repayment Billing. Each of these design parameters are discussed in the next section of this report.

A. Sources of Capital

One challenge to creating a successful energy efficiency financing program is to find one or more sources of capital that can be used to create an attractive loan product for consumers. Financing programs throughout the country have relied on a number of creative mechanisms to secure significant and sustainable sources of capital.

There are three major categories of funding commonly utilized in other energy efficiency programs. They are:

[3] Recent Innovations in Financing for Clean Energy, Matthew H. Brown and Beth Conover, Southwest Energy Efficiency Project, October 2009, p. viii, item 11.

1) Public Funding.

Public funding sources are currently being utilized in programs like Pennsylvania's Keystone Home Energy Loan Program ("HELP").[4] These programs typically rely on State Treasury funds as an initial source of capital. While these funds can be an attractive source of capital, given current economic conditions in Arizona, it is unlikely that state treasury funds would be an option (at least in the near term) for funding APS programs. Another potential public funding source could be from federal grants, particularly from the American Recovery and Reinvestment Act of 2009 ("ARRA"). However, these funds are largely being delivered to local municipalities through Energy Efficiency Community Block Grants ("EECBG") or State Energy Program ("SEP") grants, where each municipality can determine how it wishes to allocate funding between energy improvements to public buildings and facilities or as a means to create new efficiency programs. While these funds can be utilized by local jurisdictions in cooperation with an electric utility, they are not directly available for utility programming. And since each municipality is developing an individual plan, it would not be feasible to develop a federal funds based utility financing program that would be consistent across the many municipalities that APS serves. The State of Arizona did discuss the idea of using some ARRA money to start a revolving loan fund but decided not to pursue this approach. Therefore, this is not considered a viable source of capital funding at this time.

2) Utility funding.

Another potential source of capital is through utility funding, either in the form of DSM program funds or utility shareholder capital. While it may be necessary for APS to pursue this funding option in the future, there are significant unknown elements to this type of funding at this time. The Company has conducted a high level overview to determine whether under Arizona law APS could act as a consumer lender. While this may be possible, it could expose the Company to a number of unknown risks and concerns, which include the following:

- Lending/financing is outside of APS's core business expertise, which in turn could expose customers, shareholders, and other stakeholders to additional business risks.
- Due to current economic conditions and volatile credit markets, there is a significant risk of additional future regulations and scrutiny in current consumer lending laws that would subject the company to a wide range of new regulations which may include requirements such as licensing, extensive recordkeeping, and advertising restrictions.
- APS financing would require substantial expertise in lending laws and regulations that APS does not currently possess, leading to additional costs.

3) Private Third Party Funding.

Private funding by a third party is a more traditional source of capital that includes bank loans, consumer credit, and home equity lines of credit. However, as a stand alone source of capital, private funding sources typically offer financing based on current market rates, not special

[4] Pennsylvania's Keystone HELP program is principally supported by the Pennsylvania Department Of Environmental Protection, the Pennsylvania Treasury Department, and the Pennsylvania Housing Finance Agency. More information on the program itself can be found at http://www.keystonehelp.com/.

interest rates and terms to make the program attractive to customers. In addition, banks are rarely willing to offer loans for non-traditional projects like energy efficiency retrofits. As a result, most consumers must look to high interest consumer lines of credit or home equity lines of credit to fund projects. Furthermore, the recent economic downturn has made these lines of credit more difficult to obtain.

Fortunately, private sources of capital, when combined with utility support in the form of an interest rate buy-down or loan loss reserve fund, offer the potential for a highly successful financing product with low program costs. This type of program can be implemented fairly quickly and can leverage utility program dollars with private capital to produce a cost effective solution that is able to offer the special interest rates and terms that will attract customer participation. APS believes that this option represents the best solution for capital funding of a residential energy efficiency financing program at this time.

B. Interest Rates

Interest rates are an important variable that contributes to the success of a financing program. In order to appeal to customers, a financing program must offer a competitive interest rate. However, interest rates are only one aspect of a successful financing program, and it is also important to balance the attractiveness of the interest rate with the program cost required to deliver that interest rate.

Some successful residential energy efficiency financing programs like Keystone HELP and Manitoba Hydro Power Smart[5] have found that interest rates in the range of 4.99% to 8.99% are very attractive to residential customers and still offer a cost effective and sustainable financing model. It is not necessary to achieve a zero or ultra-low interest rate in order to appeal to residential customers. In fact, other factors like ease of use and marketing tend to offer equal contributions to the success of a financing program, and according to some lenders, there is even some evidence indicating that zero interest loan programs may increase loan default rates and further drive up program costs.

As APS sought to achieve a financing program that would be attractive to consumers and cost effective for its customers, APS identified the following mechanisms to achieve lower interest rates:

1) Interest Rate Buy Down.

This mechanism allows customer rebates to be used to reduce the principal of the loan or to buy down the interest rate. However, at current APS incentive levels for the Home Performance Program, using only consumer rebate funds to buy down the rate will not provide enough funding to achieve the target interest rate levels. In this case, additional DSM dollars would need to be allocated to buy the interest rate down to a desired level. The cost to directly buy down interest rates can be significant and would apply directly toward the cost of the program,

[5] More information on the Manitoba Hydro Power Smart program can be found at http://www.hydro.mb.ca/your_home/what_is_power_smart/index.shtml.

substantially impacting program cost effectiveness and resulting in many measures being no longer cost-effective.

2) Guaranty Reserve Account

A default reserve account leverages DSM dollars to create a fund used to cover the cost of loan defaults. This greatly reduces the risk to private lenders and therefore drives down interest rates. In this model, the DSM program costs are limited to a return on the reserve account plus the actual cost of loan defaults. Thus, this approach enhances program cost effectiveness. The SWEEP report Recent Innovations in Financing for Clean Energy looked at current program default rates for several energy efficiency loan programs nationwide, and found that default rates are generally below 2%, so actual program costs to cover defaults are relatively low. APS believes that a Guaranty Reserve Account is the preferred option for achieving attractive interest rates as it leverages utility funding to lower interest rates without significantly increasing program costs.

C. Loan Terms

Loan term refers to the length of time of the loan. One objective is to try to get as close to a zero impact cash flow for the customer as possible, so that energy savings are close to covering the monthly loan payments. Longer terms help move projects closer to cash flow neutrality. However, longer term loans are more difficult to finance, and they can increase the risk of loan defaults. Therefore, to strike a proper balance, it is important to offer attractive terms that are acceptable to lenders and that minimize program default costs.

D. Loan Types and Amounts

The range of available loan amounts should be as broad as possible to cover all types of customer needs, from very small jobs to comprehensive whole house retrofits. To encourage the broadest array of projects, it is important to offer loan amounts that fit the needs of residential customers and the cost range of typical energy efficiency upgrade projects. In general, the lower end of the range should start as low as $1,000 with the high end of the range for typical financing projects being as high as $20,000. Offering a variety of loan types and terms, including both secured and unsecured financing options, will enable the program to meet the financing needs of the widest range of customers and offer the best terms for each situation.

E. Risk Management

In order to limit defaults but still attract and encourage participation in the program, lending guidelines should be set appropriately. When using a third party lender for financing, the guidelines will generally be a combination of utility criteria and lender requirements. Loan criteria used by utilities usually consist of time as a utility customer and review of payment history. Lender loan criteria will generally follow the standard underwriting requirements of the lender and may include criteria such as employment stability, bankruptcy history and FICO scores.

F. Integration of Financing into the Overall Energy Efficiency Program

Integration of financing into the DSM program offering is essential and a main contributor to the success of the program. APS believes that regardless of the other aspects of the program, all financing options that are pursued should always be directly integrated into the program marketing and delivery. In the case of the Home Performance Program, the program is delivered through participating home performance contractors, so it is essential that these participating contractors be trained to fully explain and offer financing options at the time that audit recommendations are delivered to the customer. Ideally, the program marketing materials and participating contractor should be able to show the estimated savings and payback the customer will likely achieve by taking advantage of the financing and installing energy efficient equipment.

1) Ease of Use.

As identified in the SWEEP report, making the financing option as easy as possible for the customer is another essential element of the program. Programs that pre-approve customers or offer approvals by phone are the most streamlined, quick, and easy programs to administer and use. The financing options should be easy for contractors to explain and easy for customers to understand. Closing and funding the loan are essential elements in the program and should be easy for everyone involved.

2) Repayment Billing.

There are a wide variety of options to structure monthly billing of financed payment charges to customers, with various levels of integration into the utility bill. How this aspect of the program is addressed can significantly affect the costs and implementation of a financing program. Since integration into billing was explicitly addressed by the Commission's order, much consideration went into this aspect of the program. It is important to note that all of the billing options can be equally integrated into the program marketing and offering to the customer. Some options include:

Option 1: Direct Third Party Billing

In this option, the loan would be administered by a third party lender who would then bill participating customers for monthly payments in completely separate envelopes and separate statements from the APS bill. This option has several implementation advantages (including significantly reduced costs and reduced implementation challenges), while potentially sacrificing some integration. See table below for a summary of advantages and disadvantages:

Advantages	Disadvantages
• Lowest initial cost. • Lowest on-going implementation cost. • Decreased risk for billing errors. • Shortest implementation timeline (Approximately 2 months). • Potentially more diverse payment options for consumers. • Less potential confusion for customers on when and who to pay. • Potential for APS to work with multiple lenders.	• Does not integrate monthly payments. • Will require two separate payments each month. • Provides less connection between monthly payment and utility bill savings (could be mitigated with optional energy savings report described below)

Estimated Initial Cost
In the case of third party billing by the lending institution, the total cost of billing is covered by the lender, so this option does not incur any program costs and no APS computer system modifications are required.

Estimated Ongoing Cost
Ongoing billing administration costs are borne by the lender and do not impact program costs.

Optional Energy Savings Report
One potential disadvantage to the third party billing model is the lack of integration and connection for the customer between their financed energy efficiency improvements and energy savings. A highly cost effective solution would be to include a regular energy saving report from APS as an insert to the bank's financing bill or in a separate mailing to the customer. This option allows customers to compare their energy savings to the cost of the improvements at a relatively low program cost and it accomplishes one of the main objectives behind bill integration, which is to provide a clear connection between the monthly costs and the associated energy savings resulting from an energy efficiency home improvement project. Estimated costs for the optional energy savings report are relatively minimal. To insert the report into the lender's bill will require a one time Information Technology ("IT") modification of the lender's billing system which is estimated at $30,000. Ongoing mailing costs are estimated at $3,000-$5,000 per quarterly report regardless of whether the report is inserted into the lender's bill or sent as a separate mailing to the customer. APS's set up and ongoing costs for this approach will be minimal.

Option 2: Parallel Billing

In this option, the financing provider would send monthly statements to APS, which would then be inserted into participating customers' monthly APS bills. See table below for a summary of advantages and disadvantages:

Advantages	Disadvantages
• More integrated than 3rd party approach. • Minimal initial costs. • Relatively fast implementation timeline (approx. 2-3 months). • Less electronic transfer of secure data compared to on-bill approach.	• Higher on-going implementation cost. • Increased risk of missing statements. • Increased risk of mismatched bills due to manual handling. • Potential delays in billing cycles due to manual handling. • Potential confusion for customers on when and where to pay. Errors may result in a credit impact. • Cannot be utilized with the Company's E-billing system. • Less integrated than other approaches. • Additional component to the utility bill that increases bill size and mailing cost.

Estimated Initial Cost

Not including costs related to reducing interest rates or improving loan terms, parallel billing is a manual process that does not require significant computer system modifications to implement. Because of this, the estimated initial cost for parallel billing is small.

Estimated Ongoing Cost

The estimated ongoing cost of implementing a parallel billing model is at least $1,000 to $3,000 a month, depending on loan volume. These costs include the staff time to indentify utility bills, match them with a corresponding lender bill and manually combine the two documents in a single envelope. Additional costs for postage and oversized envelopes will likely apply, which could further increase ongoing costs.

Option 3: Partially Integrated "On-Bill"

The partially integrated on-bill approach is a moderately cost effective solution that prints an informational message on the utility bill that details the customer's monthly charge from the lender. The charge is then automatically withdrawn from the customer's account and paid directly to the bank. The lender will still be required to send a separate bill in order to fulfill consumer lending regulation requirements. See the following table for a summary of advantages and disadvantages.

Advantages	Disadvantages
• More integrated statements. • Energy savings and financed improvement charges appear on the same statement. • Low on-going implementation costs. • More scalable than parallel billing approach. • Automated processing will reduce error potential. • Electronic withdrawal from consumer accounts will mitigate credit impact from payment confusion. • Can be utilized with E-billing system.	• High initial cost for IT modifications. • Longer set-up time (Approx. 5-7 months). • Risk of double payment • Not as clear for customer to determine what and who to pay.

Estimated Initial Cost

The partially integrated on-bill model will require significant computer system modifications to both APS and the lending institution billing systems in order to print an additional informational message on the utility bill. These modifications will take a secure data file from the lender and match that information with a corresponding utility account number. The preliminary estimated cost is at least $150,000 including modifications made by both APS and the lender. Actual costs could be higher pending further investigation of this approach.

Estimated Ongoing Cost

Some administrative costs will be associated with the ongoing implementation of this billing option. It is anticipated that the ongoing cost should be minimal.

Option 4: Fully Integrated "On-Bill"

A fully integrated on-bill model will print the customer's financing charge directly on the utility bill, with both the utility bill and lender charges paid directly to APS. This model offers the greatest integration for customers, but at highly significant program costs and implementation challenges, including a substantially longer timeline to begin implementation. It also introduces unique program challenges in dealing with collections and how interest would accrue between the time that APS receives payments and the time they are posted with the participating lender. There are many potential variables, challenges and complexities to this model that APS has been unable to fully explore at this point. Significant additional effort and cost would need to be incurred to fully explore all of the potential ramifications of this billing option. See the following table for a summary of the advantages and disadvantages as we currently understand them:

Advantages	Disadvantages
• Most integrated approach. • Easier to make payments. • Avoids risk of double payments. • Can be utilized with E-billing system. • Potentially low on-going implementation costs. • More scalable than parallel billing approach. • Automated processing will reduce error potential.	• Very high up-front development costs. • Longest implementation timeline (over 1 year). • Legal concerns surrounding consumer lending laws. • Difficulty in allocating partial payments between the electric bill and the financing repayment. • Administrative burden of tracking payments. • Increased risk for APS in tracking and transferring of payments. • Significant unknown variables for both APS and lender. • Potential unwillingness by lenders to participate.

Estimated Initial Cost
Based on the current analysis of this approach, the fully integrated on-bill model is by far the most expensive billing option. APS and potential lenders have not been able to fully explore all of the potential issues and the range of costs associated with this billing option. We expect cost may exceed our initial estimates.

Implementation of a fully integrated on bill model would require modification in both the billing and payment systems for both APS and the participating lender. Preliminary estimates suggest that these modifications will require an expenditure of $800,000 or more and require over one year to complete.

Estimated Ongoing Cost
To ensure a consistent transfer of data and funds between APS and the lender, APS would need to incur potentially significant ongoing administrative costs.

V. APS'S PROPOSED REEF PROGRAM

The following section outlines the REEF. This section is organized using the same subheadings as the prior section to provide specific information on how APS proposes to address each design parameter. Note that all design parameters, timelines, and estimated program costs are based on the currently available information and are subject to change in final program negotiations with the participating lender.

A. Design Parameters

1. Sources of Capital

APS believes that the most feasible, timely and cost effective option for a source of funding capital is through private third-party funding. In tandem with the Company's non-residential financing program development, APS contacted ten private financial institutions to gauge interest in creating an energy efficiency financing program. Of those contacted, three banks expressed interest in partnering with APS. After several meetings and after receiving preliminary proposals from each lender, APS proposes that the source of capital for the REEF be provided by National Bank of Arizona ("NBAZ") NBAZ maintains a strong reputation for financial stability with a large network of local branches throughout the APS service territory. In addition, they offer a strong commitment to assist in marketing APS's energy efficiency programs.

Through the APS/NBAZ partnership, NBAZ will make financing available to residential customers in the APS service territory to finance eligible energy efficiency improvements conducted as part of the Home Performance Program. Financing will consist of loans in the amount of $1,000 to $20,000 per customer. The financing program will be available for an initial period of one year with additional one year renewal periods upon mutual agreement by APS and NBAZ. Capital from NBAZ will be made available up to an aggregate limit of $1.5 million. Based on an estimated average amount financed of approximately $5,000, the Program could finance about 300 outstanding consumer loans at any time. If the REEF reaches this financing limit, APS and NBAZ would negotiate for the provision of additional capital, or alternatively APS could seek an additional lending partner.

2. Interest Rates

Offering attractive interest rates is an important component to drive program participation. APS proposes two mechanisms be used in the REEF to achieve this. First, any utility rebates that the customer will receive as a result of their energy efficiency improvements must be used to either reduce the principal amount of the loan or to buy down the interest rate (or a combination of both).

To further reduce interest rates, the proposed Program deposits funds with NBAZ (in an interest bearing account referred to as the Guaranty Reserve Account) to serve as a collateral guaranty for the loans issued under the financing program. The funds on deposit will be used to create a reserve pool to offset loan losses incurred by NBAZ and enable the bank to offer special below-market interest rates to APS customers who participate in the program. Funds will remain on account with NBAZ until all loans issued under the financing program have been repaid in full to NBAZ.

The advantage of this approach is that Guaranty Reserve Account allows APS to leverage funds to achieve lower rates at a substantially lower program cost, rather than using DSM program funds to directly "buy down" the interest rate. Program costs reflect APS's recovery of the weighted cost of capital needed to establish the reserve account (minus interest that accrues in

the account) plus the funds that are actually expended to cover any program defaults, rather than the entire cost of a loan buy-down. APS proposes that these costs be fully recoverable through the Demand Side Management Adjustment Charge ("DSMAC"). Using this approach, no additional tariffs would need to be proposed.

3. Loan Terms

Loan terms are an important mechanism to help achieve cash neutral or positive cash flow projects, but terms must be balanced against the risk of defaults and lenders willingness to extend credit. In addition, a variety of different terms provides options for customers to choose what financing arrangement best fits their needs. The Program will provide customers with loan term options ranging from 12 to 120 months, depending on the type of loan (secured vs. unsecured) and amount financed.

4. Loan Types and Amounts

In order to provide financing that addresses a wide range of different customer needs, the Proposed REEF Program provides both secured and unsecured loans. Program options will include unsecured loans that will range from $1,000 to $20,000 with terms from 12 to 60 months, as well as secured loans that range from $5,000 to $20,000 with terms from 60 to 120 months. The selection of secured versus unsecured financing options will depend on the preference of the customer as well as their creditworthiness. Secured loans will be supported by a first or second deed of trust on the customer's primary residence.

5. Risk Management

It is important to balance the desire to offer loans to the widest range of customers with the need to minimize risk in order to limit program default rates. To qualify for a loan, APS and NBAZ propose that customers meet the following minimum criteria:

- Meet eligibility requirements for APS's program.
- Be an APS customer for a minimum of six months.
- Be a customer in good standing with APS.
- Not have filed for personal bankruptcy.
- Meet NBAZ minimum underwriting standards, which include:
  - Stability in employment (2 years in the same industry),
  - Credit bureau history (payment performance),
  - FICO scores (above 700 for unsecured and above 650 for secured),
  - Risk of Bankruptcy scores (below 450 for unsecured and 600 for secured),
  - Meet maximum debt-to-income thresholds.
  - Meet maximum loan-to-value thresholds for secured loans.

When a loan becomes 60 days past due, NBAZ will provide written notice to APS that the bank intends to offset the outstanding balance of the loan against the loan Guaranty Reserve Account when the loan becomes 90 days past due. At 90 days, the bank will charge the APS reserve account.

6. Integration of Financing

The REEF will be fully integrated into the Home Performance Program. Contractors will be trained on the financing piece of the program and will be a vital tool in its success. Customers will apply for financing by telephone during the contractor visit, further enhancing the customer experience and helping to ensure that energy efficiency projects will be undertaken and completed.

7. Ease of Use

By integrating the financing program directly into the Home Performance Program, customers will be made aware of the financing program and will be offered financing as an option to fund their energy efficiency projects. Participating contractors will receive detailed training on the financing program from APS's lending partner, so they will be able to sell the benefits to customers at the same time they perform the energy audit. Customers will be able to get loans pre-approved by phone at the time of the audit, and will be able to access 79 NBAZ branches throughout the state for finalizing the loan. All of these program aspects are designed to make the residential financing program very easy for customers to use.

8. Repayment Billing

The REEF includes a third party billing approach (see Option 1 as described earlier in this report). This option is preferred due to ease of implementation, no additional cost to set-up and limited risk of customer paying the wrong entity. APS also proposes to including the optional energy savings report described earlier. If the Program is approved, APS will send the savings report to the customer at the time of their first financing bill and on a quarterly basis thereafter to notify the customer of their estimated savings as compared to the cost of financing.

B. Timeline

APS believes that residential financing is an important component to drive savings achievements within the Home Performance with ENERGY STAR® program. The Proposed REEF Program design provides many benefits as described in this report, including the ability to start the program in a relatively short timeframe after program approval. If the ACC approves the Proposed REEF Program as designed, APS estimates that program start up could be in as little as 90 days after approval. Other potential program designs, including options for integrating financing into the APS bill, have a significantly longer timeline for roll out with a year or more of lead time required for the most integrated billing options.

C. Estimated Program Costs

The Proposed REEF Program costs will include initial setup costs as well as ongoing implementation expenses. The costs included here are based on the best available estimates at this time, however many unknown elements could potentially impact these estimates. As noted

above, many factors in the program design can have significant impacts on costs, and the actual terms will have to be negotiated with the bank.

The Company proposes to recover initial setup costs, ongoing implementation costs, and carrying costs associated with the Guaranty Reserve Account through the DSMAC. Using this approach, no additional tariffs would need to be proposed. The estimated budget includes carrying costs associated with the Guaranty Reserve Account that would be ongoing and recovered on an annual basis.

The customer incentive cost is the amount expended by APS to "buy down" the interest rate for the customer. This amount is the cost to APS to establish and maintain the Guaranty Reserve Account which lowers the lending institution's risk and results in a lower loan interest rate to program participants. The total cost to APS related to the Guaranty Reserve Account is the rate of return the Company would otherwise earn from funds deposited in the account, less interest paid to APS by the lending institution, plus actual default costs that are drawn out of the account by the bank to cover defaults.

If the ACC chooses to adopt the recommended third party billing approach with an optional savings report, one time program costs are estimated to be $30,000 and ongoing annual costs are estimated to be $175,000. These costs are provided in the table below:

	One-Time Costs	Annual Costs	Description
Program Marketing[6]		$50,000	Program Marketing/Advertising
Training & Tech. Assistance[7]		$10,000	Contractor Training
Incentives[8]		$50,000	Costs Related to Reserve Fund Acct.
Program Implementation[9]	$30,000	$65,000	Initial Setup/ Default Costs/ Energy Savings Statements
Total	$30,000	$175,000	

[6] Program marketing costs include the development of collateral materials to support the joint promotion of the financing program between NBAZ and APS.
[7] Training & Technical Assistance costs are to train the energy auditors to promote and sell the financing program to consumers.
[8] The Rebate & Incentive costs are the costs described above to buy down the interest rate charged to the consumer.
[9] One time Program Implementation costs are for the initial setup of the third party lending institution's billing system. Ongoing Program Implementation costs include the cost for loan defaults and the ongoing expense to provide quarterly energy savings estimates to the bank to include with statements. Loan default costs will likely be less than the annual estimated costs during the initial year of the program ramp-up.