Debt and
Interest Rate Management Policy

Updated May 2015

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1. Introduction

The purpose of this document ("the Policy") is to maintain policies that govern the Northern California Power Agency's ("NCPA" or "the Agency") implementation or use of any Fixed Rate Debt, Variable Rate Debt or interest rate Swaps and/or other interest rate Derivative-type transactions. NCPA's debt and investment portfolio involves, and will continue to involve, different interest rate payments and interest rate risks. A variety of financial instruments are available to offset, hedge, or reduce those interest rate risks or provide a lower net cost of borrowing with respect to the Agency's debt. The Policy governs the use of such hedging instruments and debt financing structures. It should be noted that certain of the Policy limits and guidelines included in this document are based on current financial circumstances as of the Policy's most recent update and shall be subject to change as circumstances change, upon approval of the NCPA Finance Committee. It should also be noted that the Policy is not intended to address commodity derivatives or other agreements which the Agency might utilize as part of hedging for power supply management or other operations.
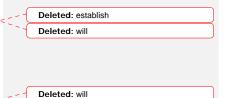
2. Use of Fixed Rate Debt

NCPA has historically utilized Fixed Rate Debt issuances to finance the majority of the capital requirements. As it relates to using Fixed Rate Debt structures, NCPA will follow guidelines consistent with the Government Finance Officers Association Best Practices for Governmental Debt Management. Additionally, NCPA will carefully consider the regulations, risks, and benefits of various kinds of Fixed Rate Debt such as traditional tax-exempt municipal bonds, taxable bonds, Build America Bonds, or other forms of Fixed Rate Debt. NCPA will also apply several guidelines specifically to the use of Fixed Rate Debt for refinancing existing debt obligations. Those include:

- For a Fixed Rate Debt refinancing of existing Fixed Rate Debt, NCPA will generally apply a minimum 5% Net Present Value Savings target for transactions which are expected to maintain the same level of risk related to the debt.
- For a Fixed Rate Debt refinancing of existing Synthetic Fixed Rate Debt, Variable Rate Debt or Synthetic Variable Rate Debt transactions which are believed and expected to reduce the risk related to the debt, NCPA will generally attempt to complete transactions that do not result in a Net Present Value Savings of less than 0%; however, the Policy does not preclude NCPA from executing a transaction that results in a Net Present Value Savings of less than 0% if the risk mitigation benefits are deemed to merit the cost.

As it relates to the risk and benefit tradeoffs of different Fixed Rate Debt structures, methods of sale, timing, detailed deal structure considerations and other factors, NCPA will rely on the expertise of the NCPA Finance Committee, NCPA's Financial Advisor and NCPA's Bond Counsel. Moreover, notwithstanding the guidelines above, the Agency will not be precluded from issuing Fixed Rate Debt if so approved by the NCPA Commission ("Commission").

3. Use of Variable Rate Debt

As it relates to using Variable Rate Debt structures, NCPA will follow guidelines consistent with the Government Finance Officers Association Best Practices for Governmental Debt Management. Additionally, NCPA shall use an overall asset/liability approach to management of its debt portfolio. As part of this management, NCPA shall attempt to manage its Unhedged Variable Rate Debt exposure to no more than the greater of 20% or $100 million of the outstanding revenue bond obligations per project. For purposes of this limitation, Unhedged Variable Rate Debt exposure shall include both the principal amount of direct issue Variable Rate Debt and the notional amount of Synthetic Variable Rate Debt less:

- The amount of direct Variable Rate Debt for which variable interest rate exposure has been eliminated or reduced by interest rate Swaps or interest rate Caps, Collars or other hedging instruments.
- The amount of short–term assets held in reserves at NCPA i.e. cash accounts which provide a natural hedge against the Variable Rate Debt.

NCPA shall also attempt to manage its total Variable Rate Debt (both Hedged and Unhedged) exposure to no more than the greater of 50% or $250 million of the outstanding revenue bond obligations per project.

NCPA may consider various structures for the issuance of Variable Rate Debt and, under appropriate market conditions as determined by the Finance Committee, Synthetic Variable Rate Debt. Decisions about which debt structure or Swap instrument to utilize at any point in time shall be based on a number of factors including the relative costs, benefits, and risks to NCPA and its members.

When applicable and possible, NCPA will attempt to stagger the renewal or remarketing risks associated with different kinds of Variable Rate Debt. NCPA will do so with the objective of limiting the risk that multiple series or significant dollar amounts of Variable Rate Debt might become subject to unanticipated redemption within a similar period of time.

4. Variable Rate Debt with Credit Enhancement

The use of Variable Rate Debt by NCPA has typically required use of credit facilities such as a direct pay Letters of Credit ("LOC") primarily to ensure that the Variable Rate Debt has one of the two highest short-term ratings. Such short-term ratings are important to obtaining the lowest cost to NCPA and are necessary for the marketing of Variable Rate Demand Obligations ("VRDOs") to money market and other short-term investors.

For the purposes of the Policy, Variable Rate Debt products which require Credit Enhancement shall include VRDOs which require either a Letter of Credit or Line of Credit (Standby Bond Purchase Agreement or "SBPA") and not Direct Purchase Variable Rate Debt (Variable Rate Debt which does not have bank rating exposure but which still has similar credit terms as VRDOs with Credit Enhancement). Direct Purchase Variable Rate Debt will be tracked as Variable Rate Debt without Credit Enhancement, the guidelines for which are given in Section 5.

NCPA recognizes that concentration with a Credit Enhancement provider on Variable Rate Debt exposes NCPA to substantial risk. Given the risks associated with Credit Enhancement providers, NCPA should adhere to the following policies with regard to Variable Rate Debt structures which require Credit Enhancement:

- The amount of bond insurance by any one bond insurer on NCPA's VRDOs should not exceed the greater of 30% or $150 million outstanding revenue bond obligations on any NCPA project;
- The amount of credit capacity provided by any one banking institution should not exceed the greater of 30% or $150 million outstanding revenue bond obligations on any NCPA project;
- The ratings of any bond insurer for insured VRDOs must be no less than A1, A+ or equivalent by any two of the national recognized rating agencies (i.e. Moody's Investors Service, Standard and Poor's, or Fitch Ratings) at the time of procurement and implementation of the bond insurance;
- The long-term credit ratings of any LOC or SBPA providers must be no less than A2, A or equivalent by any two of the national recognized rating agencies (i.e. Moody's Investors Service, Standard and Poor's, or Fitch Ratings) and the short-term credit ratings and must have no less than P1, A-1, or equivalent short-term ratings by any two of the national recognized rating agencies (i.e. Moody's Investors Service, Standard and Poor's, or Fitch Ratings) at the time of procurement and implementation of the LOC or SBPA.If credit ratings fall below the above levels at any time during the term of the credit enhancement, the financial situation of the banking institution and the downgrade impact on NCPA shall be monitored. In addition, consideration shall be given

to the possible replacement of the banking institution or other possible options for replacement products if the situation warrants such change.

NCPA will also attempt to limit the amount of Variable Rate Debt which requires Credit Enhancement to no more than the greater of 30% or $150 million of the outstanding revenue bond obligations per project.

The Commission should approve any increases in exposure above the limits set above for Credit Enhancement providers.

5. Variable Rate Debt without Credit Enhancement

In recent years numerous structures have emerged to allow debt issuers to borrow funds without Credit Enhancement using bonds or notes which function as Variable Rate Debt the interest cost of which fluctuate from time to time. Such structures may be subject to remarketing and therefore not pegged to a particular index or may be indexed for a period of time to a published index such as LIBOR or SIFMA. Such structures are characterized by the lack of Credit Enhancement requirement but which have a different risk profile. "Direct Purchase" structures are to be considered under these guidelines instead of the guidelines applying to Variable Rate Debt with Credit Enhancement.

For the purposes of the Policy, NCPA will limit the issuance of Variable Rate Debt structures without Credit Enhancement to structures which have the following characteristics:

- The amount of Variable Rate Debt which is subject to a mandatory tender with the penalty of a failed mandatory tender being an immediate Event of Default will be limited to the greater of 10% or $50 million outstanding revenue bond obligations on any NCPA project;
- The amount of Variable Rate Debt which is subject to a mandatory tender with the penalty of a failed mandatory tender being an Event of Default subsequent to a penalty rate period of 180 days or less will be limited to the greater of 20% or $100 million outstanding revenue bond obligations on any NCPA project;
- In all cases, NCPA will favor Variable Rate Debt structures for which acceleration of principal repayment occurs over a period of not less than 3 years; and
- NCPA will attempt whenever possible to match the trading levels or index of the Variable Rate Debt with the appropriate receipt or payment leg of interest rate Swaps (if applicable).

NCPA will also attempt to limit the amount of Variable Rate Debt without Credit Enhancement to no more than the greater of 30% or $150 million of the outstanding revenue bond obligations per project.

6. Compliance with Regulatory Requirements for Debt Transactions

In order to facilitate NCPA's receipt of financing proposals associated with existing or contemplated debt, NCPA shall have in place an Independent Registered Municipal Advisor ("IRMA") to provide advice to NCPA on proposals from broker-dealers or banks. NCPA's IRMA will be required to be registered as a Municipal Advisor with the Securities and Exchange Commission ("SEC") and the Municipal Securities Rulemaking Board ("MSRB").

NCPA will comply with all regulatory requirements associated with the execution of new debt transactions or the maintenance of existing debt including meeting NCPA's continuing disclosure obligations.

7. Use of Interest Rate Swaps

NCPA will determine if interest rate Swaps are appropriate in accordance with the provisions of Section 5922(a) of the Government Code and the Agency may execute interest rate Swaps only if the transaction can be reasonably expected to achieve one or more of the following objectives:

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- Result in a lower net cost of borrowing with respect to the Agency's debt, or achieve a higher net rate of return on the investment of Agency moneys;
- Reduce exposure to changes in interest rates either in connection with a particular debt financing or investment transaction or in the management of interest rate risk with respect to the Agency's overall debt and investment portfolios;
- Manage variable interest rate exposure consistent with prudent practices and guidelines approved by the Commission; or
- Manage other financial risks or counterparty exposures in a manner consistent with prudent practices and guidelines approved by the Commission.

NCPA may utilize the following interest rate Swaps, on a either current or forward basis, after identifying the objectives to be realized and assessing the attendant risks:

- Interest rate Swaps, including fixed, floating and/or basis Swaps;
- Interest rate caps, floors and collars; or
- Options, including on Swaps, caps, floors and/or collars and/or cancellation or index-based features.

The Agency shall not execute interest rate Swaps under the following circumstances:

- When a financial instrument is used for speculative purposes rather than for managing and controlling interest rate risk in connection with Agency debt or investments;
- When the financial instrument creates extraordinary leverage or financial risk; or
- When there is insufficient price "transparency" to permit the Agency and its advisors to reasonably value the instrument, as a result, for example of the use of unusual structures or terms.

In addition, review of any proposed interest rate Swap shall consider the following:

- Identify the proposed benefit and potential risks as outlined in the Policy;
- Prepare an independent analysis of potential savings from a proposed transaction, on a Project and per participant basis;
- Prepare an analysis of the Fixed Rate Debt versus Variable Rate Debt and Swap exposure on a Project and per participant basis before and after the proposed transaction;
- Prepare a cash flow sensitivity analysis using parameters recommended by Standard & Poor's of 7.0% of LIBOR and BMA/LIBOR ratio at 75% to determine worst case impacts of LIBOR based Swaps; and
- Consider views of rating agencies based on published reports or criteria used by rating agencies.

8. Interest Rate Swaps – Term and Notional Amounts

NCPA shall determinate the appropriate term for an interest rate Swap agreement on a case-by-case basis. Any Swap shall not extend beyond the greater of: the final maturity date of existing debt of NCPA, or in the case of a refunding transaction, beyond the final maturity date of the refunding bonds or the termination of the related Third Phase Agreement for the relevant NCPA project. No new interest rate Swap transaction shall be approved that causes the notional amount of all interest rate Swaps to exceed 50% or $250 million of the total amount of outstanding revenue bonds, or liquid assets on a project basis—except to the extent that an interest rate Swap is intended as a modification to another interest rate Swap (i.e. a basis Swap executed to modify the terms of an existing fixed payer Swap may not be counted as an interest rate Swap on its own so long as the fixed payer Swap which it modifies remains in place).

9. Interest Rate Swaps – Counterparty Ratings

The Agency shall be authorized to enter into interest rate Swap transactions only with Qualified Swap Counterparties (or their guarantors) which must have no less than A1, A+, or equivalent long-term ratings by any two of the national recognized rating agencies (i.e. Moody's Investors Services, Standard and Poor's, or Fitch Ratings) at the time that the interest rate Swap is executed. In addition, the counterparty must have a demonstrated record of successfully executing Swap transactions. Each counterparty shall have a minimum capitalization of at least $250 million.

10. Interest Rate Swaps – Counterparty Exposure Limits

In order to diversify the Agency's counterparty credit risk and to limit the Agency's credit exposure to any one counterparty, the following limits are established on termination exposure for any one counterparty. These limits shall only apply at the time a Swap and/or related transaction is entered into, and thus may be exceeded during the term of a Swap or Swaps with the same counterparty. Upon approval by the Commission, exceptions may be made to these limits to the extent that the execution of a Swap achieves one or more of the objectives outlined herein.

For the purposes of these limits, "Maximum Net Termination Exposure" shall mean an amount equal to the aggregate maximum reasonably anticipated net termination payment exposure for all of the Agency's existing and proposed Swap agreements with such counterparty as determined by the Agency's financial advisor, bond counsel, in-house counsel and finance staff ("Finance Team"). At any given time, maximum reasonably anticipated net termination payment exposure shall be calculated based on market conditions and at assumed market conditions representing a change in taxable rates both up and down by 200 basis points. Prior to entering a new Swap with a counterparty, the maximum reasonable anticipated net termination payment exposure should be less than the Maximum Net Termination Exposures listed below or as changed from time to time by the Finance Committee due to changing financial circumstances.

The established limits vary based upon the credit rating of the counterparty. If the counterparty has more than one rating, the lowest rating will govern for purposes of calculating the permissible levels of exposure. The limits are as follows:

Counterparty Credit Exposure Limits			
Credit Rating	Maximum Collateralized Exposure	Maximum Uncollateralized Exposure	Maximum Total Termination Exposure
AA Category	$50 million	$25 million	$50 million
A Category	$25 million	$10 million	$25 million
Below A	$10 million	$0	$10 million

In addition, the sum total notional amount per Swap counterparty may not exceed 35% of NCPA's total revenue bond indebtedness on a project basis.

Individual Swap contract limits will determine collateral and terminations provisions. When possible, these documents shall be drafted to so as not to conflict with NCPA's policies.

If any exposure limit is exceeded by a counterparty during the term of a Swap agreement, the General Manager shall consult with the Agency's Finance Team regarding appropriate strategies, if any, to mitigate this exposure.

11. Interest Rate Swaps – Maximum Termination Exposure

As of the date of execution of any Swap agreement and/or related instrument, the aggregate maximum reasonably anticipated net termination payment exposure for all of the Agency's existing and proposed Swap agreements, as determined by the Agency's Finance Team, shall not exceed

$75,000,000 or amounts as determined from time to time by the NCPA Finance Committee based on currently available financial data for the Agency.

12. Interest Rate Swaps – Collateral Requirements

As part of any Swap agreement, NCPA may require collateralization or other Credit Enhancement to secure any or all Swap payment obligations of the counterparty. As appropriate, the General Manager may require collateral or other Credit Enhancement to be posted by each Swap counterparty under the following circumstances:

- Each counterparty may be required to post collateral if the credit rating of the counterparty or its guarantor falls below the A2, A or equivalent by any two of the national recognized rating agencies (i.e. Moody's Investors Service, Standard and Poor's, or Fitch Ratings). The amount of collateral posted shall be equal to the positive termination value of the Swap agreement to the Agency from time to time.
- Collateral shall consist of cash, U.S. Treasury securities and U.S. Agency securities.
- Collateral shall be deposited with a custodian, acting as agent for the Agency, or as mutually agreed upon between the Agency and each counterparty.
- A list of acceptable securities that may be posted as collateral and the valuation of such collateral will be determined and mutually agreed upon during negotiation of the Swap agreement with each Swap counterparty.
- The market value of the collateral shall be determined on at least a monthly basis.
- The General Manager will determine reasonable threshold limits for the initial deposit and for increments of collateral posted thereafter.
- The General Manager shall determine on a case-by-case basis whether other forms of Credit Enhancement are more beneficial to the Agency.

In connection with any collateralization requirements that may be imposed upon the Agency in connection with a Swap agreement, the Agency may post collateral or it may seek to obtain Swap insurance in lieu of posting collateral. The General Manager shall recommend a preferred approach to the Agency on a case-by-case basis.

13. Interest Rate Swaps – Termination Provisions

All interest rate Swap transactions shall contain provisions granting the Agency the right to optionally terminate a Swap agreement at any time over the term of the agreement.

A termination payment to or from the Agency may be required in the event of termination of a Swap agreement due to a default by or a decrease in the credit rating of either NCPA or the counterparty. Prior to entering into the Swap agreement or making any such termination payment, as appropriate, the General Manager shall evaluate whether it would be financially advantageous for the Agency to enter into a replacement Swap as a means of offsetting any such termination payment. Any such Swap would be subject to NCPA Commission and other approvals as set forth herein.

Any Swap termination payment due from the Agency shall be made from legally available Agency monies and shall be billed to each participant in accordance with member contracts. Any such termination payments shall be reported to the NCPA Commission at the next Commission meeting.

The Agency shall consider the extent of its exposure to termination payment liability in connection with each Swap transaction, and the availability of sufficient liquidity to make any such payments that may become due.

14. Form of Interest Rate Swap Agreements

Each interest rate Swap executed by the Agency shall contain terms and conditions as set forth in the International Swap and Derivatives Association, Inc. ("ISDA") Master Agreement, including the Schedule to the Master Agreement and a Credit Support Annex, as supplemented and amended in accordance with the recommendations of the Agency's Finance Team. Each Swap agreement between the Agency and each Qualified Swap Counterparty (as detailed below) shall include payment, term security, collateral, default, remedy, termination, and other terms, conditions and provisions as the Finance Team deem necessary or desirable.

Subject to the provisions contained herein, the terms of any NCPA interest rate Swap shall use the following guidelines:

- Downgrade provision triggering termination shall in no event be worse than those affecting the counterparty;
- Preferred governing law for Swaps shall be in California;
- Termination value should be set by a "market quotation" methodology, unless NCPA deems an alternate method appropriate.

15. Compliance with Regulatory Requirements for Interest Rate Swap Transactions

NCPA qualifies as a "Special Entity" as defined in Section 1a (50) of the Commodity Exchange Act and Commodity Futures Trading Commission ("CFTC") Regulation 23.401(c). As such, NCPA will not be a "Reporting Counterparty" which would be subject to certain obligations. NCPA, however, will comply with Schedule IV, Part 1 of the ISDA Protocol in order to be covered under the Safe Harbor in Dodd-Frank. Schedule IV, Part 1 requires that NCPA meet several requirements:

- NCPA will not rely on Swap recommendations (if any) provided by Swap Dealers;
- NCPA will rely on advice from a Designated QIR;
- NCPA will comply with written policies and procedures reasonably designed to ensure that the Designated QIR selected by NCPA satisfies the applicable requirements of CFTC Regulation 23.405(b)(1) and that such policies and procedures provide for ongoing monitoring of the performance of such representative consistent with the requirements of CFTC Regulation 23.450(b)(1); and
- NCPA will exercise independent judgment in consultation with a Designated QIR, in evaluating all Swap recommendations (if any) of Swap dealers that are presented to NCPA with respect to Swaps to be executed by NCPA on its own behalf.

NCPA will comply with all regulatory requirements associated with the execution of new interest rate swaps or the maintenance of existing interest rate swaps.

16. Authority for Fixed Rate Debt, Variable Rate Debt and Swap Agreements

The Commission may adopt resolutions from time to time authorizing the issuance of Fixed Rate Debt, Variable Rate Debt or execution of interest rate Swaps which will be executed by the NCPA General Manager.

Prior to seeking Commission approval of a proposed Fixed Rate Debt, Variable Rate Debt, or interest rate Swap transaction, NCPA will invite to a Finance Committee meeting, all participants in the Project subject to the proposed transaction to express their views as to whether to recommend the proposed transaction to the Commission for its consideration. Any objection by a participant shall be considered.

The General Manager must obtain the approval of the NCPA Finance Committee and the NCPA Commission prior to the issuance of Fixed Rate Debt or Variable Rate Debt or execution of any interest rate Swap transaction. The General Manager, with the concurrence of outside Bond Counsel, shall determine whether a proposed debt transaction or interest rate Swap agreement is legally valid and complies with any applicable provisions of the Agency's legal agreements.

The Agency recognizes that changes in the capital markets, Agency programs, financial circumstances and other unforeseen circumstances may from time to time produce situations that are not covered by this policy and will require modifications or exceptions to achieve policy goals. In these cases management flexibility is appropriate, provided specific authorization from the NCPA Finance Committee and the NCPA Commission is obtained prior to execution of a transaction.

17. Identification and Evaluation of Financial and Other Risks

Prior to obtaining Commission approval of the issuance of Fixed Rate Debt or Variable Rate Debt or execution of interest rate Swaps, the NCPA Finance Committee shall identify and evaluate the financial risks associated with the proposed transaction, and summarize them clearly and concisely for the Commission, along with any measures that will be taken to mitigate those risks. The following types of risks shall be evaluated in connection with each proposed transaction:

- **Market or Interest Rate Risk**: Does the proposed transaction hedge or create exposure to fluctuations in interest rates? If so, what factors might affect such rates?
- **Tax Law Risk**: Is the proposed transaction subject to rate adjustments, extraordinary payments, termination or other adverse consequences in the event of a future change in Federal Income Tax Policy? Is the proposed transaction subject to receipt of funds from the Federal Government?
- **Termination Risk**: Under what circumstances might the proposed transaction be terminated? At what cost? Does the Agency have sufficient liquidity to cover this exposure? Does the financing structure have elements to deal with unanticipated termination?
- **Risk of Uncommitted Funding (Put risk)**: Does the transaction require or anticipate a future financing action? Is that action dependent upon third party participation? What commitments can be or have been secured for such participation? What policies or procedures does the Agency have in place to deal with this risk?
- **Legal Authority**: Is there any uncertainty regarding the legal authority of any party to participate in the transaction?
- **Counterparty Credit Risk**: What is the creditworthiness of the counterparty? What provisions have been made to mitigate exposure to adverse changes in their credit standing?
- **Ratings Risk**: What exposure does the Agency have to ratings of third parties? What effect would a change in an Agency project debt rating have on the transaction? Will the execution of the transaction have a negative impact on any one participant's credit rating?
- **Basis Risk**: Does the anticipated payments that the Agency would make or receive under the interest rate Swap match the payments or receipts that it seeks to hedge?
- **Tax Status of Agency Debt**: Does the transaction comply with all tax law requirements with respect to the Agency's outstanding bonds?
- **Accounting Risk:** Does the proposed transaction create any accounting issues that could have a detrimental effect on the Agency's financial statements? Would the proposed transaction have any effect on compliance with bond covenants? How are any such effects addressed or mitigated?
- **Administrative Risk:** Can the proposed transaction be readily administered and monitored by the Agency's finance staff or team consistent with the requirements outlined in this policy?
- **Subsequent Business Conditions:** Does the proposed transaction or its benefits depend upon the continuation or realization of specific industry or business conditions?
- **Credit Enhancement Provider Risk:** Does the financial strength and credit ratings of the Credit Enhancement provider (if any) affect the business terms of the Fixed Rate Debt, Variable Rate

Debt or interest rate Swap? Does a credit downgrade trigger events that affect the economics of the Fixed Rate Debt, Variable Rate Debt or interest rate Swap?

- **Credit risk:** Is it expected that credit support, if needed, will be available and exist at a reasonable cost over the term of any Fixed Rate Debt, Variable Rate Debt or interest rate Swap?
- **Amortization risk**: Is the Fixed Rate Debt or Variable Rate Debt amortization appropriate for the life of the project, assets and 3rd Phase Agreements to which it is related? Does the amortization of the underlying debt or assets, match a proposed interest rate Swap agreement?

18. Anticipated Value Thresholds and Criteria

Any proposed Variable Rate Debt or Swap transactions under the Policy not having tax risk should be anticipated to generate at least 7% Net Present Value Savings or at least 2% incremental benefit above a traditional Fixed Rate Debt refunding transaction when compared to the notional amount of the Swap. Any proposed transactions under this policy having tax risk (i.e. a LIBOR Swap) should be anticipated to generate at least 10% Net Present Value Savings or at least 5% incremental benefit above a traditional Fixed Rate Debt refunding transaction when compared to the notional amount of the Swap, as determined by the General Manager. All transaction related fees should be included in the calculation to determine the net present value benefit of the transaction. NCPA should also consider the potential for fees to increase from assumed levels. Also, the renewal risk associated with credit facilities should be incorporated in the analysis. This threshold shall be a guideline and is subject to override by the Commission, should the transaction, in the Commission's sole judgment, help to meet any of the other objectives outlined herein.

Notwithstanding the net present value thresholds described, the Finance Team may consider and the Commission may authorize Swap or Variable Rate Debt transactions which, in the determination of the Finance Team are risk neutral to the Agency's financial obligations or which result in risk reduction and not net present value benefit.

19. Procurement Process Requirements

The Agency may either negotiate or competitively bid its Fixed Rate Debt, Variable Rate Debt or interest rate Swap transactions.

20. Monitoring and Reporting Requirements

The Agency's Finance Team will monitor any Fixed Rate Debt, Variable Rate Debt and interest rate Swaps that the Agency has outstanding on at least a monthly basis. The Agency's Finance Team will provide a written report the Commission regarding the status of all Variable Rate Debt and interest rate Swaps at least on a semi-annual basis to the NCPA Finance Committee and to the NCPA Commission. Such reports shall include the following information:

- Highlights of all material changes to Fixed Rate Debt, Variable Rate Debt and interest rate Swaps entered into by the Agency since the last report;
- Highlight any changes to Fixed Rate Debt, including any subsidy considerations, material bond proceeds fund investment issues, continuing obligation considerations, escrow considerations, rating triggers, or other developments which might affect the expected continuity and performance of the Fixed Rate Debt;
- The performance of Variable Rate Debt compared to relevant indices since the last report;
- Tracking of future put dates, remarketings, Credit Enhancement renewals, and other pending dates of importance for the continuation of Variable Rate Debt structures;
- Changes to any fees paid to any third parties including Credit Enhancement providers, remarketing agents, etc.;
- Market value of each of the Agency's interest rate Swaps;

- The net impact to the Agency of a 50 basis point movement (up and down) in the appropriate taxable Swap market curves, and a tax/market adjusted movement in tax-exempt market Swap curves;
- For each counterparty, the Agency shall provide the total notional amount position, the average life of each interest rate Swap agreement, and the remaining term of each interest rate Swap agreement;
- Separately for each Variable Rate Debt structure or interest rate Swap, the actual cumulative cost or benefit versus the projected cost or benefit of the transaction;
- The credit ratings and outlooks (making particular note of any rating changes) for each interest rate Swap counterparty and credit enhancer associated with a Variable Rate Debt structure or interest rate Swap;
- The credit ratings and outlooks (if applicable) for any Variable Rate Debt with Credit Enhancement or any Variable Rate Debt without Credit Enhancement;
- Actual collateral posting by each interest rate Swap counterparty;
- A summary of each interest rate Swap, including, but not limited to, the type of interest rate Swap, the rates and dollar amounts paid by the Agency and received by the Agency, and other terms;
- Information concerning any default by an interest rate Swap counterparty under an agreement with the Agency, and the results of the default, including but not limited to the financial impact to the Agency and its members, if any.
- A summary of any planned Fixed Rate Debt, Variable Rate Debt and interest rate Swaps and the projected impact of such Variable Rate Debt and interest rate Swaps on the Agency and its members.
- A summary of any Fixed Rate Debt, Variable Rate Debt and interest rate Swaps that were refinanced or terminated.

21. Accounting and Budget Treatment

The Agency shall comply with any applicable accounting standards for the treatment of Fixed Rate Debt, Variable Rate Debt, interest rate Swaps and related financial instruments. On an annual basis the budget treatment for debt and Swaps shall be reviewed and recommendations made as to the treatment for each annual operating budget, as determined by the project participants.

22. Commission Authorization to Control

Nothing in this Policy shall affect the validity or enforceability of any agreement by the Agency pursuant to authorization by the NCPA Commission.

23. Biennial Review of Policy

The Finance Committee shall review the Agency's Debt and Interest Rate Management Policy on a biennial basis and recommend appropriate changes to the NCPA Commission.

24. Glossary

- **Asset/Liability Matching:** Matching the term and amount of assets and liabilities in order to mitigate the impact of changes in interest rates.
- **Call Option:** The right to buy an underlying asset after a certain date and at a certain price. A call option is frequently embedded in a municipal; bond, giving the issuer the right to buy, or redeem, the bonds at a certain price.
- **Cap:** A ceiling on the interest rate paid.
- **Collar:** The combination of owning a Cap and selling a Floor. General structured so the net cost of a collar is close to zero, i.e. the expense for the cap premium is offset by the credit received for the floor premium.

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- **Collateral:** Assets pledged to secure an obligation. The assets are potentially subject to seizure in the event of a default.
- **Credit Enhancement:** Any one of the variety of third party offerings, including bond insurance, Letters-of-Credit, Standby Bond Purchase Agreement and other comparable products, which provide of rating enhancing security or additional liquidity.
- **Derivative:** A financial product that is based upon another product. Generally derivatives are risk mitigation tools.
- **Downgrade:** A negative change in credit ratings.
- **Floor:** A lower limit on the interest rate that may be paid.
- **Forward Starting Swap:** Interest rate Swaps that start at some time in the future.
- **Hedge:** A transaction that reduces the interest rate risk of an underlying security.
- Interest rate Swap: The exchange of a fixed interest rate and a floating interest rate between counterparties.
- **Hedged:** Debt obligations which are associated with an interest rate Swap intended to reduce the volatility of the cost and risk of other obligations.
- **ISDA:** The International Swaps and Derivatives Association, a global trade association representing participants in the derivatives industry.
- **Liquidity support:** An agreement by a bank to make payment on a variable rate security to assure investors that the security can be sold.
- **Letter of Credit:** An agreement by a bank to provide both long-term and irrevocable short-term Credit Enhancement.
- **LIBOR:** The London Interbank Offer Rate. Used as an index to compute the variable rates for certain interest rate Swaps.
- **Notional Amount:** The agreed upon principal amount used to determine the interest payments in a Swap transaction.
- **Net Present Value Savings**: The savings derived from a refinancing by discounting the net cashflow savings of the refunding transaction when compared to the refunded transaction inclusive of estimates of all costs, fund earnings, etc. at the yield estimated for tax purposes, to the estimated date of issuance of the refunding bonds, divided by the par amount of the refunded bonds.
- **Option:** There are two primary types of options, put and call. An option is considered a wasting asset because it has a stipulated life and may expire worthless.
- **Put Option:** A contract that grants the purchaser the right, but not the obligation to exercise.
- **SIFMA index:** The Securities Industry and Financial Markets Association Municipal Swap Index, the principal benchmark for floating rate payments of tax-exempt issuers. The SIFMA Index is a national composite of approximately 200, high-grade seven day tax-exempt variable rate issues of $10 million or more.
- **Swap:** An immediate or forward starting contractual agreement between two parties to exchange future net cash flows based on predetermined indices calculated on an agreed notional amount. May include a "Swaption" or a Swap option, which is an agreement that provides one party with the right to begin, terminate or extend a Swap, based on certain agreed upon parameters.
- **Swaption:** An option on an interest rate Swap that gives the purchaser the right, but not the obligation to enter into an interest rate Swap.
- **Synthetic Fixed Rate:** Variable rate debt which by virtue of an associated Swap hedge which has a variable rate receipt leg and a fixed payment leg which approximates the variable rates on the debt, has an expected fixed cost profile which (together with the associated Swap) approximates that of Fixed Rate Debt.
- **Synthetic Variable Rate:** Fixed rate debt which by virtue of an associated Swap hedge which has a fixed rate receipt leg and a variable payment leg which approximates the rates on the debt, has an expected variable cost profile which (together with the associated Swap) approximates that of Variable Rate Debt.

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- **Termination payment:** A payment made by a counterparty that is required to terminate the Swap agreement. The payment is commonly based on the market value of the Swap, which is computed using the rate on the initial Swap and the rate of a replacement Swap.
- **Unhedged:** Debt obligations which are not associated with an interest rate Swap intended to reduce the volatility of the cost of those obligations.
- **Yield curve:** The graphic or tabular representation of interest rates across different maturities (i.e. short-term to long-term).

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