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**COUNTY OF DARE, NORTH CAROLINA**

**PRELIMINARY SWAP ANALYSIS**

**MAY 12, 2005**

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**DEC Associates, Inc.**

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## Introduction

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The County of Dare has engaged DEC Associates, Inc. to provide Swap Advisory services with regard to a combination Basis Swap and Swaption, proposed by UBS for the purposes of achieving a synthetic advance refunding of the County's outstanding COPs, series 1998B, 2001, 2002 and 2004. The combined synthetic advanced refunding would amount to approximately \$26,000,000 and is estimated to produce present value savings of approximately, \$1,758,000 or 6.7%.

As Swap Advisor it is our role to evaluate the Swap, together with County staff and the North Carolina Local Government Commission, and its contemplated savings for the following applicable points:

- Compatibility with the County's overall financial plan
- Appropriateness of the proposed structure
- Comparison to other potential refunding methods
- Risks and rewards for the proposed structure
- Rating Agency review of the transaction
- County ability to handle costs of risks
- Market level of the swap pricing

Under Local Government Commission policy the County must have a Swap Advisor and must achieve a minimum level of savings in order to proceed with the proposed synthetic refunding. Due to the nature of a synthetic method to refund the COPs the County should achieve a minimum net present value savings level of approximately 5%, compared to a minimum level of savings of 3% for a traditional refunding method. The higher level of savings needed for the synthetic method is in recognition of the greater level of risks and the need to be compensated for the higher risk level.

It is currently anticipated that the synthetic refunding would be approved by the North Carolina Local Government Commission in its June, 2005 meeting and that the Swap(s) would be entered into shortly thereafter, if they meet the County's anticipated savings levels.

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## Available Structures for the Refunding of the COPs

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There are at least three methods currently available to refund the proposed COPs of the County. Although these three methods are available they each present different levels of savings, based upon their structures, the current pricing available in the capital markets, levels of risk and the like.

The three methods are a traditional fixed rate refunding, a variable to fixed rate swap combined with the issuance of variable rate COPs of the County and a basis swap alone and in combination with a swaption. Currently the traditional method does not provide savings sufficient to use this technique and the fixed rate swap method is less economically viable than the basis swap/swaption method. The following defines the three methods:

**Traditional Refunding** – this method incorporates the issuance of fixed rate COPs and uses the proceeds of the COPs to refund the currently outstanding COPs issued at a higher rate in an earlier year. This method has been used numerous times in our State and is the customary method used when savings are at an appropriate level.

**Synthetic Refunding Using a Fixed Rate Swap** – this method incorporates the issuance of variable rate COPs by the County together with the entering into of a swap for which the County receives a variable rate and pays a fixed rate. The fixed rate paid by the County would be lower than the fixed rate on the originally issued COPs, thereby creating the refunding savings.

**Synthetic Refunding Using a Basis Swap/Swaption** – this method incorporates the entering into of a basis swap alone or with a swaption or the use of a swaption alone. A basis swap and swaption are described in detail in the next section. By combining both swap methods the savings outcome should be higher than the use of either method alone and each should meet minimum savings thresholds.

## **Proposed Structure of the Synthetic Refunding**

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**The following provides information on Interest Rate Swaps as a financing vehicle, while later information addresses specifics with respect to the proposed UBS structure.**

### **Comparing Interest Rate Indices**

In the tax-exempt market, variable rate issuers will most commonly hedge their variable rate risk with an interest rate swap based upon one of two indices.

#### **BMA Index**

- The Bond Market Association Municipal Swap Index is a tax-exempt, weekly reset index composed of 650 different high-grade, tax-exempt VRDBs.
- The BMA Index is a widely used benchmark for borrowers and dealer firms of variable rate tax-exempt paper.
- A BMA Index Swap provides protection against interest rate risk, tax rate risk and other market movement risks.

#### **Percentage of LIBOR**

- LIBOR is the “London Interbank Offered Rate” that the most creditworthy international banks dealing in Eurodollars charge each other for large loans and is the commonly used taxable variable rate index.
- A percentage of LIBOR swap provides some protection against interest rate risk but not as efficiently as BMA.
- The basis of the variable rate received under a swap (% of LIBOR) often differs from the basis of the rate paid on the variable rate debt, creating a risk called “basis risk”.
- As compensation for retaining the greater risks of a % of LIBOR basis, greater savings through a significantly lower fixed rate on the swap generally occurs.

## Proposed Structure of the Synthetic Refunding

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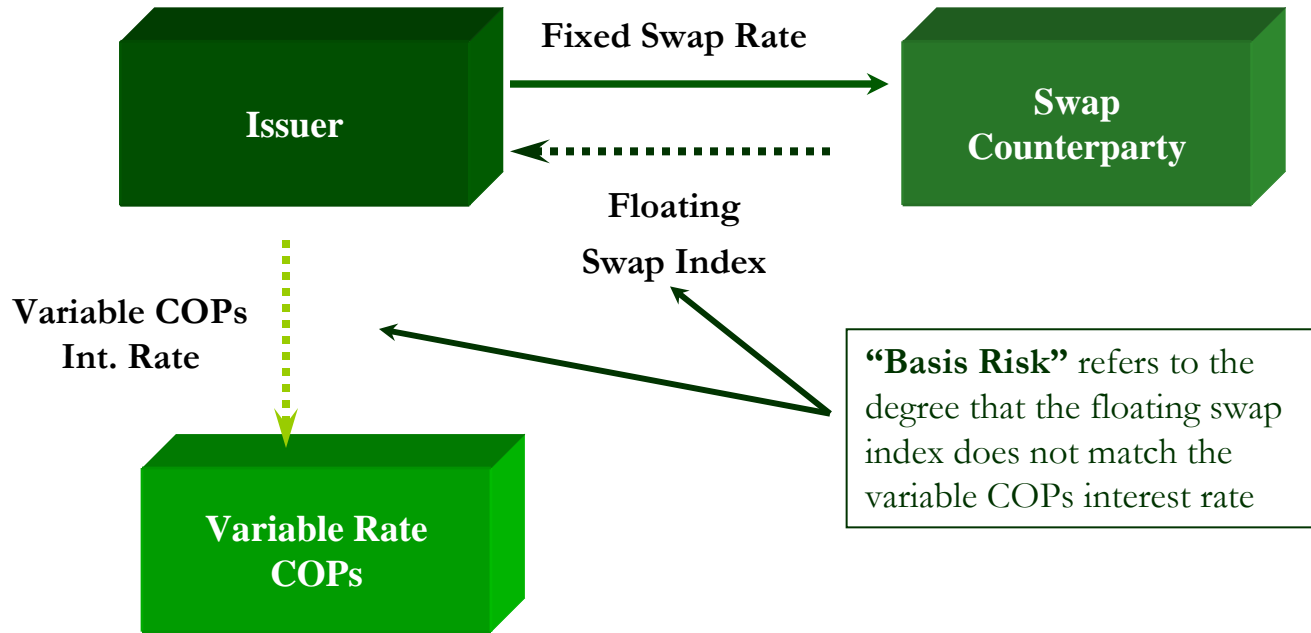
### Risk Management

- Interest rate swaps are a way to isolate individual risks providing for greater capacity in risk management and potentially lower costs from traditional fixed rate COPs.
- Each risk the County eliminates creates a cost.

	Allocation of Risk Between County and Investor	
	Fixed Rate COPs	Variable Rate COPs
<b>Interest Rate Risk</b> -Exposure to interest rate fluctuations	Investor	County
<b>Tax Risk</b> -Exposure to changes in tax law (e.g Tax Reduction)	Investor	County
<b>Credit Risk</b> -If the County's credit deteriorates, its cost of debt may increase	Investor	County
<b>Market Risk</b> -Changes in tax-exempt bond market dynamics	Investor	County

# Proposed Structure of the Synthetic Refunding

## Mechanics and Risks of Synthetic Refundings



Risks Inherent in Variable Rate COPs	BMA Swap Protection	% of LIBOR Swap Protection
Interest Rate Risk	Yes	Yes
Tax Risk	No	Yes
Market Risk	No	Yes
Credit Risk	No	No

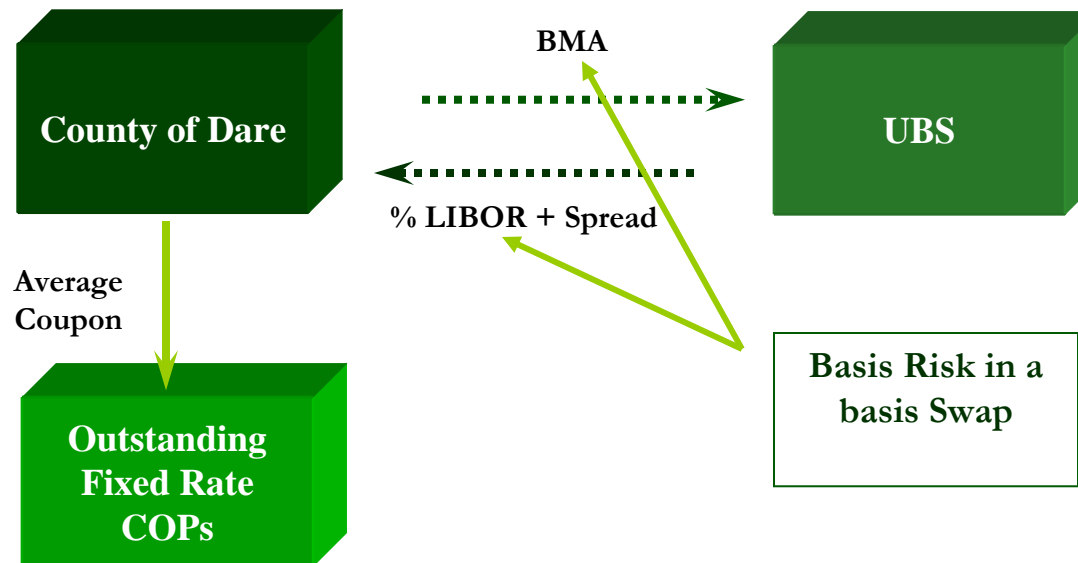
} Basis Risk

## Proposed Structure of the Synthetic Refunding

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UBS has proposed the use of a combination of a BMA to percent of LIBOR basis swap and a BMA swaption. The following information outlines the mechanics of a basis swap.

- A basis swap is an interest rate swap agreement whereby the County makes an interest payment to UBS based on the BMA Index and receives an interest payment from UBS based on a % of LIBOR plus a constant spread (annuity).
- A basis swap takes advantage of current BMA/LIBOR ratios to establish an annuity payment that can be used to reduce the County's overall interest cost.
- The notional amount and amortization of the basis swap is based on the par amount and amortization of several outstanding COPs issues. The fixed annuity received from UBS reduces the average coupon paid on the outstanding COPs.



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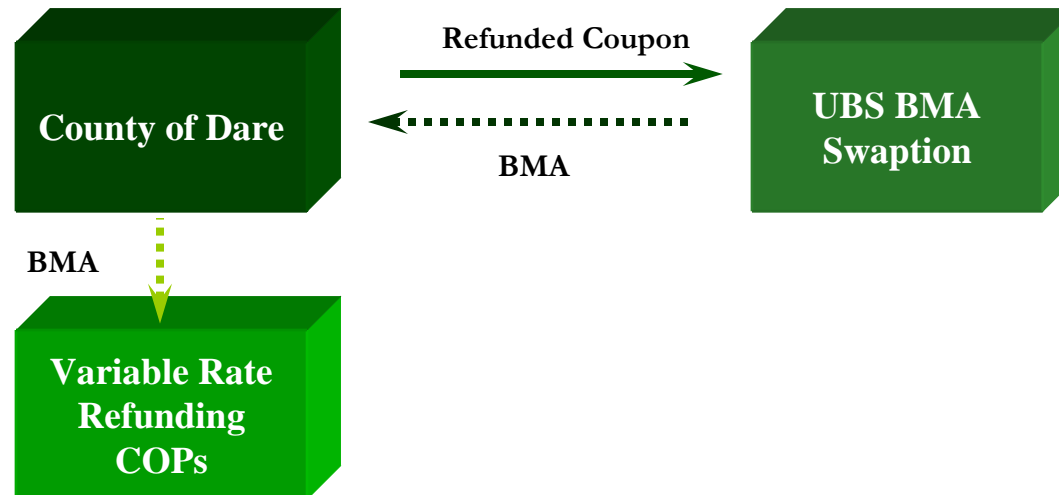
## Proposed Structure of the Synthetic Refunding

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In combination with the basis swap UBS has proposed the use of a BMA swaption to form an integrated refunding approach. The following information outlines the mechanics of a BMA swaption.

- A BMA swaption gives UBS the option to enter into a BMA interest rate swap with the County at the call date of a particular COPs issue.
- UBS will pay the County an upfront premium or an ongoing annuity for this option.
- If UBS exercises this option, the County will issue variable rate COPs to refund the prior issue. As a result the County will pay UBS a fixed swap rate equal to the average coupon of the refunded COPs and receive BMA to offset the variable rate paid to the COPs holders.
- UBS will pay the call premium (if any) on the refunded COPs, and all estimated costs of issuance and ongoing fees associated with the variable rate refunding COPs.



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## **Proposed Structure of the Synthetic Refunding**

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**The following lists the risks inherent in Interest Rate Swaps.**

### **Basis Risk**

- The risk that the % of LIBOR and fixed spread the County receives under the basis swap does not fully offset the BMA rate the County pays to UBS. Changes in tax law and the relative level of interest rates affect the relationship, creating the level of basis risk present in a percent of taxable and tax-exempt transaction.
- Potentially mitigated by structure and use of an appropriate swap index on which swap is to be based.

### **Counterparty Risk**

- The risk that the swap counterparty may be subject to a downgrade in credit, or ability to meet its obligations under the swap agreement.
- Potentially mitigated by accessing the swap market through highly rated counterparties.
- UBS is a double A rated counterparty.

### **Termination Risk**

- The risk that a swap could be terminated prior to the expiration of the term of the agreement and the County is required to make a termination payment. UBS cannot voluntarily terminate except as documented in the legal agreements.
- Potentially mitigated by executing swaps only with highly rated counterparties and developing termination payment contingency plans.

## Advisor's Preliminary Review of the Proposed Structure

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DEC Associates has reviewed the preliminary information related to the refunding proposed to the County by UBS and we have the following preliminary observations:

- County Finance Department staff is well versed in the concepts contained in the proposal and have evaluated the savings for the proposed approach and the various risks inherent in the refunding methods.
- County Finance staff have developed a risk management strategy and have made disclosure to the County Commission concerning the management of the cost of risk, should they occur.
- At current market conditions the use of a basis swap combining BMA with 70% of LIBOR as the basis component, provides savings of approximately \$930,000 npv and 3.58% npv on a forward starting basis swap or \$1,247,000 npv and 4.78% npv for a current starting basis swap. These savings amounts are within a range that provides the County with acceptable savings for proceeding with further work on the swap transaction. Savings for the basis swap should be in a range of 3% npv or better for the County to assume the inherent risks of the transaction.
- At current market conditions the use of a BMA swaption provides savings of approximately \$510,000 npv and 1.96% npv. The savings amounts are slightly below an acceptable savings amount, however, we advise continuing to evaluate the swaption in view of the potential for capital market conditions that would increase the savings. Savings for a swaption should be in a range of 2.5% to 3.0% npv or better for the County to give up its right to refund on a traditional basis in the future.
- We will continue to monitor the structure, legals and economics surrounding the swap structure proposed by UBS and will provide final advice and recommendations as the financing moves toward completion. A final report will be presented to County Finance at the pricing.

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## Tasks to Accomplish Before the Transaction is Completed

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- Secure the approval of the County Commission for the completion of the swap(s)
- Secure the approval of the North Carolina Local Government Commission for the structure and economics of the swap(s)
- Complete the legal documentation review process
- Finalize the business structure for the swap or swaps to be used and codify the business terms into the final legal documents
- Determine on the day of pricing the appropriateness of the economics, within the ranges approved by the County Commission and the Local Government Commission, and with the advice of the Swap Advisor
- Close the transaction(s)