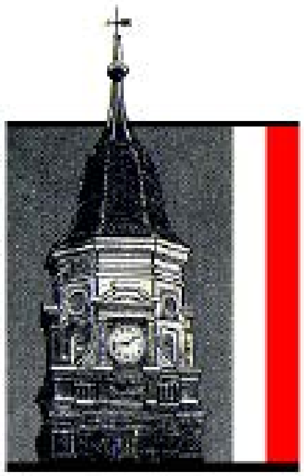

Statement of Investment Policy

Knox County Government
Tennessee

Revised 05/16/2013

Statement of Investment Policy
Knox County, Tennessee

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Statement of Investment Policy
Knox County, Tennessee

I. Purpose

The purpose of this policy is to set forth the investment and operational policies for the management of the public funds of the Knox County Government (the "County"). These policies have been adopted by, and can be changed only by, a majority vote of the Knox County Investment Committee.

These policies are designed to ensure the prudent management of public funds, the availability of operating and capital funds when needed, and an investment return competitive with comparable funds and financial market indices and are in compliance with T.C.A. Section 5-8-301, regarding the investment of all idle county funds.

II. Scope of the Investment Policy

In accordance with Tennessee law, this investment policy is a comprehensive one that governs the overall administration and investment management of those idle funds held in the investment portfolio of the County. This policy applies to all financial assets of County as cited herein, except for such funds that make up the retirement system portfolio that are allocated to outside trustees and money managers (the "County Portfolio"). This policy shall apply to such idle funds from the time of receipt until the time the funds ultimately leave County accounts. These funds include, but are not limited to, all bond funds, debt service reserve funds, capital project funds, public library funds, general and construction school funds, highway funds, all float and those pension monies not yet allocated to outside trustees and money managers. The guidance set forth herein is to be strictly followed by all those responsible for any aspect of the management or administration of these funds.

III. Investment Objectives

The County Portfolio shall be managed to accomplish the following hierarchy of objectives:

Preservation of Principal - Safety of principal is the foremost objective of the investment program. Investments shall be undertaken in a manner that seeks the preservation of capital in the overall portfolio. The objective will be to limit credit risk and interest rate risk to a level commensurate with the risks associated with prudent investment practices and performance benchmarks, if applicable.

A. Credit Risk

The County will limit credit risk, the risk of loss due to the failure of the security issuer or backer, by:

- Limiting investments to the types of securities listed in Section IX of this investment Policy and as allowed under Title 5, Chapter 8 of the Tennessee Code Annotated

- Diversifying the investment portfolio so that potential losses from any type of security or from any individual securities will be minimized and by limiting investments to specified credit ratings.

B. Interest Rate Risk

The County will minimize the risk that the market value of securities in the portfolio will fall due to changes in general interest rates by:

- Limiting the maximum maturity of the overall portfolio to 5 years.

Maintenance of Liquidity – The portfolio shall be managed in such a manner that funds are available to meet reasonably anticipated cash flow requirements in an orderly manner.

Maximize Return - The Investment portfolio shall be designed with the objective of attaining a market rate of return throughout budgetary and economic cycles, taking into account the investment risk constraints and liquidity needs. Return on investment is of least importance compared to the safety and preservation of principal and liquidity objectives described above.

IV. Organization

The organization of the investment functions of the County will consist of an Investment Committee as prescribed by TCA 5-8-302 and duly ordained by the Commission of Knox County pursuant to the adoption of Knox County Ordinance No: 0-09-9-116 on September 9,1990. The composition of the Investment Committee and its responsibilities are as follows:

Composition. This Committee will consist of six members; the county mayor, the county trustee, the director of finance, the chairman of the county commission, one member of the county board of education, selected by the board of education, and one member of the commission, elected to serve as such by the commission. The county mayor shall serve as chairman of the investment committee. The terms of the members of the committee shall coincide with their respective terms of office. The Knox County Trustee will hold the position of Vice-Chairman for the Investment Committee. The Vice-Chairman will have the same authority and duties as the Chairman in the event the Chairman is absent.

Duties and Responsibilities. It will be the duty of the Investment Committee to make recommendations and policy regarding the placement and growth of county funds. To that end the Investment Committee is authorized to select the financial services firms making the highest and best bid(s) for interest on daily balances of county funds, and to recommend and determine the method and entity for the investment of idle funds.

The Investment Committee will meet at least quarterly and more frequently at the request of the County Executive.

V. Delegation of Authority under T.C.A. Section 5-8-302.

The Investment Committee will direct that the Knox County Trustee carry out the Investment Policy and applicable procedures. The Trustee will have responsibility for the investment process, carry out the day-to-day operational requirements and will maintain written administrative procedures for the operation of the investment program consistent with this Investment Policy and the Trustee shall comply with and follow the action of the committee's designation of the types, amounts and maturities of investments

The County may employ an outside investment manager(s) to assist in managing some or the entire Portfolio. Such outside investment manager(s) must be registered under the Investment Advisors Act of 1940.

VI. Standard of Prudence

Except where specifically directed by the State Constitution, statutes, or regulations, the general investment policies of the County will be guided by the "prudent person" rule. The "Prudent Person" rule states the following:

> Investments shall be made with judgment and care, under circumstances then prevailing, which persons of prudence, discretion and intelligence exercise in the management of their own affairs, not for speculation, but for investment, considering the probable safety of their capital as well as the probable income to be derived from the investment.

Portfolio managers (either internal or external) acting in accordance with this policy or any other written procedures pertaining to the administration and management of the County Portfolio and who exercise the proper due diligence shall be relieved of personal responsibility for an individual security's credit risk or market price changes, provided that these deviations are reported in a timely fashion to the Director of Finance and that appropriate action is taken to control and prevent any further adverse developments.

While the standard of prudence to be used by Authorized Staff who are officers or employees is the "Prudent Person" standard, any person or firm hired or retained to invest, monitor, or advise concerning these assets shall be held to the higher standard of "Prudent Expert". The standard shall be that in investing and reinvesting moneys and in acquiring, retaining, managing, and disposing of investments of these funds, the Investment Advisor shall exercise: the judgment, care, skill, prudence, and diligence under the circumstances then prevailing, which persons of prudence, discretion, and intelligence, acting in a like capacity and familiar with such matters would use in the conduct of an enterprise of like character and with like aims by diversifying the investments of the funds, so as to minimize the risk, considering the probable income as well as the probable safety of their capital.

VII. Ethics and Conflict of Interest

Employees involved in the investment process shall refrain from personal business activity that could conflict with the proper execution and management of the investment program, or that could impair their ability to make impartial decisions. Employees and investment officials shall disclose any material interests in financial institutions with which they conduct business. They shall further disclose any personal finance or investment positions that could be related to the performance of the County Portfolio. Employees and officers shall refrain from undertaking personal investment transactions with the same individual with whom business is conducted on behalf of County.

VIII. Authorized Investments

Investments should be made subject to the cash flow needs and such cash flows are subject to revisions as market conditions and the County's needs change. However, when the invested funds are needed in whole or in part for the purpose originally intended or for more optimal investments, the Knox County Trustee or management designee may sell the investment at the then-prevailing market price and place the proceeds into the proper account at the County's custodian.

The following are the investment requirements and allocation limits on security types, issuers, and maturities as established by the County. The Knox County Trustee or management designee shall have the option to further restrict investment percentages from time to time based on market conditions, risk and diversification investment strategies. The percentage allocations requirements for investment types and issuers are calculated based on the original cost of each investment at the time of purchase. Investments not listed in this Policy are prohibited.

The County is empowered by Acts 1943, chapter 23, part 3, subsection 5-8-301 of the Code of the State of Tennessee to invest idle funds to the maximum extent practical in the following securities:

A. U.S. Treasury Obligations. United States Treasury bills, notes, or any other obligation or security issued by or backed by the full faith and credit of the United States Treasury.

B. Federal Agency Obligations. Bonds, notes, debentures, or other obligations or securities issued by or backed by the full faith and credit of any United States Government agency.

C. Federal Instrumentalities (United States Government Sponsored Enterprises ("GSE") which are non-full faith and credit

D. Repurchase Agreements. The County may purchase obligations of the United States or its agencies under a repurchase agreement provided that the following conditions are met:

1. the contract is fully secured by deliverable U.S. Treasury or Federal Agency obligations as described in (A) and (B) above, having a market value at all times of at least one hundred two percent (102%) of the amount of the repo plus accrued interest;
2. the collateral on the repurchase agreement must have a maturity date that exceeds the term of the repurchase agreement, but in no event will the collateral have a maturity that exceeds 10 years;

3. a master repurchase agreement or specific written, repurchase agreement approved by the State Director of Local Finance governs the transaction;
4. the securities are held free and clear of any lien by an independent third party acting solely as agent for the County, and such third party is (i) a Federal Reserve Bank, or (ii) a bank which a member of the Federal Deposit Insurance Corporation and which has combined capital, surplus and undivided profits of not less than $25 million;
5. a perfected first security interest under the Uniform Commercial Code, or book entry procedures prescribed at 31 C.F.R. 306.1 et seq. of 31 C.F.R. 350.0 et seq. in such securities is created for the benefit of the County;
6. for repurchase agreements with terms to maturity of greater than one (1) day, the value of the collateral securities will be continuously monitored and, if the value of the collateral falls below the amount required, then additional cash and/or acceptable securities must be delivered to the County's custodian within one business day. If a collateral deficiency is not corrected within this time frame, the collateral securities will be liquidated;
7. the County will enter into repurchase agreements only with (i) primary government securities dealers who report daily to the Federal Reserve Bank of New York or (ii) any bank, savings and loan association or diversified securities broker-dealer subject to regulation of capital standards by any state or federal regulatory agency; and
8. the repurchase agreement, including an open repo, has a term to maturity of no greater than ninety (90) days.

The County may invest in repurchase agreements only if the State Director of Local Finance approves repurchase agreements as an authorized investment and if such investments are made in accordance with procedures established by the State Funding Board.

E. Commercial paper. Unsecured short-term debt of U.S. corporations may be purchased if the following conditions are met:

1. The maturity is no greater than ninety (90) days;
2. The total amount invested in commercial paper will not exceed thirty percent (30%) of the portfolio book value at the date of acquisition. The amount invested in any single issuing corporation will not exceed two percent (5%) of the portfolio book value at the date of acquisition; or $2,000,000.00, whichever is less;
3. The total holdings of an issuers' paper will not represent more than five percent (5%) of the issuing corporation's total outstanding commercial paper;
4. A financial review shall be made to ascertain the financial strength of the issuer and purchases will be limited to corporations that meet the following criteria:
   a. A if the corporation has senior long term debt it must have a minimum rating of "A" or equivalent and a short term debt minimum rating of "A1" or equivalent as provided by a majority of the rating services that rate the issuer. If there is no long-term debt rating of the issuer, the short-term debt rating must be "A1" or

equivalent by all of the rating services that rate the issuer. Under all circumstances, a minimum of two short term debt ratings must be available, and

b. The commercial paper rating must be based on the merits of the issuer or guarantee/agreement of a non-bank corporation, and not be backed by a letter of credit or insurance from a third party;

5. Issues may be acquired from authorized broker/dealers or directly from an eligible issuer.

F. **Prime Bankers' Acceptances** meeting the following terms and conditions may be purchased:

1. Eligible for purchase by the Federal Reserve System as required by TCA 9-4-602(a)(1);
2. Issued by domestic banks with a minimum long-term debt rating of "AA" or foreign banks with a "AAA" long-term debt rating by a majority of the rating services that have rated the issuer. The short-term debt rating must be at least "A1" or equivalent by all of the rating services that rate the issuer (minimum of two ratings must be available);
3. A maturity no greater than ninety (90) days;
4. The amount invested in any one commercial bank pursuant to this paragraph will not exceed three percent (3%) of the portfolio book value at the date of acquisition or $5,000,000, whichever is less; and
5. arises out of the current shipment of goods between countries or within the United States, or arises out of storage within the United States of goods under contract of sale or expected to move into the channel of trade within a reasonable time and that are secured throughout their life by a warehouse receipt or similar document conveying title to the underlying goods.

G. **Certificates of Deposit**. Certificates of deposit and other evidence of deposit in Tennessee State chartered banks and savings and loan associations and federally chartered banks and savings and loan associations. All investments made pursuant to this subdivision shall be secured in a manner set forth in TCA §§ 5-8-201, 5-8-207, or title 9, chapter 4, parts 1 and 4.

H. **State Pool**. The pooled investment fund (known as the Tennessee Local Government Investment Pool) established by Title 9, Chapter 4, part 7

I. **Municipal Bonds**. The County may invest in the following municipal bonds:

1. Bonds of the State of Tennessee, including any revenue bond issued by any agency of the State, specifically including institutions under the control of the State Board of

Education, the Board of Trustees for the University of Tennessee and bonds issued in the name of the State School Bond Authority;

2. Bonds of any county or municipal corporation of this State, including bonds payable from revenues, but expressly excluding bonds of any road, levee, or drainage district; and
3. Bonds of any other state or political subdivision thereof.

Any funds invested pursuant to this subdivision (H) shall be invested only in bonds rated "A" or higher by any nationally recognized rating service.

J. A portion of the County's Main Operating Account will also be considered as an eligible investment. Any amount over $10 million will be the amount considered as the invested amount.

K. However those investments as set out in Paragraphs E and F above shall first be authorized by the county legislative body pursuant to T.C.A. Section 5-8-301(d)(3).

IX. Portfolio Diversification

The County will diversify the overall portfolio to eliminate the risk of loss from an over concentration of assets in a specific class of security, a specific maturity, and/or a specific issuer. The maximum percentage of the portfolio (book value at the date of acquisition) permitted in each eligible security is as follows:

U.S. Treasury	100% maximum
Federal Agency/Instrumentalities	100% maximum
Tennessee LGIP	50% maximum
Repurchase Agreements	20% maximum
Commercial Paper	30% maximum
Bankers' Acceptances	10% maximum
Insured/Collateralized Certificates of Deposit	100% maximum
State, County and Municipal Obligations	50% maximum

The combined amount of bankers' acceptances and commercial paper shall not exceed forty percent (40%) of the total book value of the portfolio at the date of acquisition.

The County's Portfolio will be further diversified to limit the exposure to any one issuer. No more than three 3% or five millions dollars, whichever is less, of County's Portfolio will be invested in the securities of any single issuer with the following exceptions:

U.S. Treasury Obligations	100% maximum
Federal Agency Obligations	100% maximum
Tennessee LGIP	50% maximum
Knox County Obligations	100% maximum
City of Knoxville Obligations	100% maximum

Commercial Paper	5% maximum

X. Liquidity and Maximum Maturity

Maintenance of adequate liquidity to meet the cash flow needs of the County is essential. Accordingly, the portfolio will be structured in a manner that ensures sufficient cash is available to meet anticipated liquidity needs. Selection of investment maturities must be consistent with the cash requirements of the County in order to avoid the forced sale of securities prior to maturity.

For purposes of this Investment Policy, assets of the County shall be segregated into three categories based on expected liquidity needs and purposes – short-term operating funds, the core portfolio and bond proceeds.

Short-Term Operating Funds. Assets categorized as short-term funds will be invested in permitted investments maturing in twelve (12) months or less. The average weighted maturity of the short-term assets will not exceed 180 days. To the extent possible, an attempt will be made to match investment maturities with known cash needs and anticipated cash flow requirements.

Core Portfolio. The operating fund core portfolio will be invested in permitted investments with a stated maturity of no more than 5 years from the date of purchase. To control the volatility of the core portfolio, the Investment Committee will determine a duration target, not to exceed three years.

No operating funds are to be invested for a maturity of greater than three (3) years without approval of the Investment Committee or greater than five (5) years without approval from the state director of local finance or as otherwise provided by State Statute; however, the County may collateralize its repurchase agreements using securities with maturities of up to 10 years. Notwithstanding these limitations, in no case will the assets in either category be invested in securities with a term to maturity that exceeds the expected disbursement date of those funds.

Bond Proceeds. Proceeds from the sale of bonds will be invested in compliance with the specific requirements of the bond covenants without further restriction as to the maximum term to maturity of securities purchased. However, the duration of the bond proceeds portfolio will not exceed two (2) years without the approval of the Investment Committee. Investments of bond reserves, construction funds, and other non-operating funds ("core funds") shall have a term appropriate to the need for funds and in accordance with debt covenants.

XI. Monitoring and Adjusting the Portfolio

Those responsible for the day-to-day management of the County Portfolio will routinely monitor the contents of the portfolio, the available markets and the relative values of competing instruments, and will adjust the portfolio as necessary to meet the investment objectives listed herein.

XII. Internal Controls and Investment Procedures

The Trustee shall establish a system of internal controls governing the administration and management of the County Portfolio, and these controls shall be documented in writing. Such controls shall be designed to prevent and control losses of County funds arising from fraud, employee error, misrepresentation by third parties, unanticipated changes in financial markets, or imprudent actions by any personnel. The Trustee shall establish an annual process of independent review by an external auditor. This review will provide internal control by assuring compliance with policies and procedures. Such internal controls shall include, but not limited to, the following:

A. Separation of functions:

By separating the person who authorizes or performs the transaction from the person or persons who record or otherwise account for the transaction, a proper separation of duties is achieved.

B. Custodial safekeeping:

Securities purchased from any bank or dealer, including appropriate collateral, shall be placed into a third party bank for custodial safekeeping.

C. Clear delegation of authority to subordinate staff members:

Subordinate staff must have a clear understanding of their authority and responsibilities to avoid any improper actions. Clear delegation of authority also preserves the internal control structure that is built around the various staff positions and their respective responsibilities.

Written confirmation of electronically initiated transactions for investments and wire transfers:

Due to the potential for error and improprieties arising from telephone or other electronically initiated transactions, all such transactions should be supported by written communications and approved by an individual other than the individual initiating said transaction. Repetitive wires do not require a secondary approval; however, all non-repetitive wires shall have secondary approval.

D. Documentation of transactions and strategies:

All transactions and the strategies that were used to develop said transactions should be documented in writing and approved by the appropriate person.

XIII. Bank Selection and Review

It will be the duty of the Investment Committee to accept bids from various banking institutions for the purpose of depositing County funds, handling operational accounts, and collecting interest thereon. Bids may be solicited and awarded in any manner appropriate under the circumstances. Documentation will be kept on all bids received.

The Investment Committee will have full authority to formulate, make and approve the contract(s) with a bank or banks making he highest and best bid(s) to pay interest on daily balances of the County funds; The Investment Committee, subsequent to the signing of any such contract, will notify the County Trustee, or other appropriate official, in writing, and instruct him to place County funds in his custody, or thereafter to be collected by him, on deposit in the bank or banks so specified in the amounts specified. The County Trustee, or other appropriate official, upon receiving such notice will place such funds as designated in the bank or banks designated therein.

The County Trustee, after receipt of a monthly statement from each contracting bank, will make both a monthly and quarterly report to the Investment Committee showing the amount of the monthly and quarterly balance as per the bank statement and the interest to be placed to the credit of the proper County fund;

The contracting bank shall provide collateral for County deposits in accordance with requirements for public funds deposits in Tennessee.

XIV. Selection, Approval of Brokers, Qualified Financial Institutions

The Trustee shall maintain a list of financial institutions and broker/dealers that are approved for investment purposes. Written procedures will describe the competitive selection process for financial institutions with which investment transactions will be conducted. All brokers, dealers, and depositories deemed to be "qualified institutions" will be provided with current copies of the Investment Policy. Receipt of this policy, including confirmation that it has been reviewed by persons dealing directly with the County's account will be received prior to any organization providing investment services to the County. A current audited financial statement is required to be on file for each financial institution and broker/dealer with which County trades. In addition, all financial institutions interested in transacting securities trades with County are required to complete a "Broker/Dealer Request for Information" as detailed in the Appendix to this policy.

The County's Investment Advisor(s) shall utilize and maintain its own list of approved primary and non-primary securities dealers.

XV. Collateralization

Collateralization is required on all deposits of County funds (including Certificates of Deposits) by Acts 1990, chapter 702, subsection 9. As per the statute, "required collateral" means collateral whose market value is equal to 105% of the value of the deposit so secured thereby, less so much of such amount as is protected by federal deposit insurance.

The following securities may be pledged as collateral on deposits:

1. Securities issued by or backed by the full faith and credit of the United States Government, its agencies, or government sponsored enterprises;
2. Obligations guaranteed by the Tennessee Industrial Development Authority not to exceed the amount of the guarantee;
3. Bonds of the State of Tennessee including any revenue bond issued by any agency of the state specifically including institutions under the control of the State Board of Regents, the Board of Trustees of the University of Tennessee and Bonds issued in the name of the State School Board Authority;
4. The State of Tennessee Collateral Pool;

Collateral for any deposit or investment of public funds by the County in the form of Collateralized Mortgage Obligations (CMOs) and Real Estate Mortgage Investment Conduits (REMICs) is strictly prohibited regardless that they may be direct obligations of a U.S. Agency. Variable rate notes (VRNs) and structured notes are also prohibited.

Whenever possible, every attempt should be made to secure County deposits and investments through the State of Tennessee Collateral Pool.

XVI. Safekeeping and Custody

Except as noted below, all investment securities purchased by the County or held as collateral on either deposits or investments shall be held in third-party safekeeping at a financial institution (to be designated as the "Custodian") qualified to act in this capacity. All transactions will be conducted on a delivery-vs.-payment basis. All securities held for the County account will be held free and clear of any lien. The Custodian shall issue a safekeeping receipt to County listing the specific instrument, rate, maturity and other pertinent information. On a monthly basis, the custodian will also provide reports which list all securities held for County, the book value of holdings and the market value as of month-end.

Certificates of Deposit may be held in physical form by the County Trustee providing that said certificates of deposit are collateralized through the State of Tennessee collateral pool, or collateral pledged on such deposits is held by the Custodian and a system of internal controls has been established to protect the County against loss. To facilitate security settlement, the County may use a draft/cheque to purchase certificates of deposit and may accept a draft/cheque for the redemption amount of such securities.

Appropriate County officials and representatives of the Custodian responsible for, or in any manner involved with, the safekeeping and custody process of the County shall be bonded in such a fashion as to protect the County from losses from malfeasance and misfeasance.

XVII. Reporting

The Trustee and/or any outside investment manager(s) shall prepare and submit to the Investment Committee a "Quarterly Investment Report" that summarizes the following: (i) recent market conditions, economic developments and anticipated investment conditions,

(ii) the investment strategies employed in the most recent quarter, (iii) portfolio return (on a market value basis) versus appropriate benchmarks; (iv) a summary of broker activity, and (v) any areas of policy concern warranting possible revisions of current or planned investment strategies.

XVIII. Investment policy adoption

This policy is adopted this 7th day of December 2012.

Approved by

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County Executive

Approved by unanimous vote of the Knox County Investment Committee on December 7, 2012.

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Secretary

XIX. Glossary of Cash and Investment Management Terms

Accrued Interest. Interest earned but which has not yet been paid or received.

Agency. See "Federal Agency Securities."

Ask Price. Price at which a broker/dealer offers to sell a security to an investor.Also known as "offered price."

Asset Backed Securities (ABS). A fixed-income security backed by notes or receivables against assets other than real estate. Generally issued by special purpose companies that "own" the assets and issue the ABS. Examples include securities backed by auto loans, credit card receivables, home equity loans, manufactured housing loans, farm equipment loans and aircraft leases.

Average Life. The average length of time that an issue of serial bonds and/or term bonds with a mandatory sinking fund feature is expected to be outstanding.

Bankers' Acceptance (BA's).A draft or bill of exchange drawn upon and accepted by a bank.Frequently used to finance shipping of international goods. Used as a short-term credit instrument, bankers' acceptances are traded at a discount from face value as a money market instrument in the secondary market on the basis of the credit quality of the guaranteeing bank.

Basis Point. One hundredth of one percent, or 0.01%. Thus 1% equals 100 basis points.

Bearer Security.A security whose ownership is determined by the holder of the physical security. Typically, there is no registration on the issuer's books. Title to bearer securities is transferred by delivery of the physical security or certificate. Also known as "physical securities."

Benchmark Bills: In November 1999, FNMA introduced its Benchmark Bills program, a short-term debt securities issuance program to supplement its existing discount note program. The program includes a schedule of larger, weekly issues in three- and six-month maturities and biweekly issues in one-year for Benchmark Bills. Each issue is brought to market via a Dutch (single price) auction. FNMA conducts a weekly auction for each Benchmark Bill maturity and accepts both competitive and non-competitive bids through a web based auction system. This program is in addition to the variety of other discount note maturities, with rates posted on a daily basis, which FNMA offers. FNMA's Benchmark Bills are unsecured general obligations that are issued in book-entry form through the Federal Reserve Banks. There are no periodic payments of interest on Benchmark Bills, which are sold at a discount from the principal amount and payable at par at maturity. Issues under the Benchmark program constitute the same credit standing as other FNMA discount notes; they simply add organization and liquidity to the short-term Agency discount note market.

Benchmark Notes/Bonds: Benchmark Notes and Bonds are a series of FNMA "bullet" maturities (non-callable) issued according to a pre-announced calendar. Under its Benchmark Notes/Bonds program, 2, 3, 5, 10 and 30-year maturities are issued each quarter. Each Benchmark Notes new issue has a minimum size of $4 billion, 30-year new issues having a minimum size of $1 billion, with re-openings based on investor demand to further enhance liquidity. The amount of non-callable issuance has allowed FNMA to build a yield curve in Benchmark Notes and Bonds in maturities ranging from 2 to 30 years. The liquidity emanating from these large size issues has facilitated favorable financing opportunities through the development of a liquid overnight and term repo market. Issues under the Benchmark program constitute the same credit standing as other FNMA issues; they simply add organization and liquidity to the intermediate- and long-term Agency market.

Benchmark.A market index used as a comparative basis for measuring the performance of an investment portfolio. A performance benchmark should represent a close correlation to investment guidelines, risk tolerance and duration of the actual portfolio's investments.

Bid Price. Price at which a broker/dealer offers to purchase a security from an investor.

Bond Market Association (BMA). The bond market trade association representing the largest securities markets in the world. In addition to publishing a Master Repurchase Agreement, widely accepted as the industry standard document for Repurchase Agreements, the BMA also recommends bond market closures and early closes due to holidays.

Bond. Financial obligation for which the issuer promises to pay the bondholder (the purchaser or owner of the bond) a specified stream of future cash flows, including periodic interest payments and a principal repayment.

Book Entry Securities. Securities that are recorded in a customer's account electronically through one of the financial markets electronic delivery and custody systems, such as the Fed Securities wire, DTC and PTC

(as opposed to bearer or physical securities). The trend is toward a certificate-free society in order to cut down on paperwork and to diminish investors' concerns about the certificates themselves. The vast majority of securities are now book entry securities.

Book Value. The value at which a debt security is reflected on the holder's records at any point in time. Book value is also called "amortized cost" as it represents the original cost of an investment adjusted for amortization of premium or accretion of discount. Also called "carrying value." Book value can vary over time as an investment approaches maturity and differs from "market value" in that it is not affected by changes in market interest rates.

Broker/Dealer.A person or firm transacting securities business with customers. A "broker" acts as an agent between buyers and sellers, and receives a commission for these services. A "dealer" buys and sells financial assets from its own portfolio. A dealer takes risk by owning inventory of securities, whereas a broker merely matches up buyers and sellers. See also "Primary Dealer."

Bullet Notes/Bonds. Notes or bonds that have a single maturity date and are non-callable.

Call Date. Date at which a call option may be or is exercised.

Call Option. The right, but not the obligation, of an issuer of a security to redeem a security at a specified value and at a specified date or dates prior to its stated maturity date. Most fixed-income calls are a par, but can be at any previously established price. Securities issued with a call provision typically carry a higher yield than similar securities issued without a call feature. There are three primary types of call options (1) European - one-time calls, (2) Bermudan - periodically on a predetermined schedule (quarterly, semi-annual, annual), and (3) American - continuously callable at any time on or after the call date. There is usually a notice period of at least 5 business days prior to a call date.

Callable Bonds/Notes. Securities, which contain an imbedded call option giving the issuer, the right to redeem the securities prior to maturity at a predetermined price and time.

Certificate of Deposit (CD). Bank obligation issued by a financial institution generally offering a fixed rate of return (coupon) for a specified period of time (maturity). Can be as long as 10 years to maturity, but most CDs purchased by public agencies are one year and under.

Collateral. Investment securities or other property that a borrower pledges to secure repayment of a loan, secure deposits of public monies, or provide security for a repurchase agreement.

Collateralization. Process by which a borrower pledges securities, property, or other deposits for securing the repayment of a loan and/or security.

Collateralized Mortgage Obligation (CMO).A security that pools together mortgages and separates them into short, medium, and long-term positions (called tranches). Tranches are set up to pay different rates of interest depending upon their maturity. Interest payments are usually paid monthly. In "plain vanilla" CMOs, principal is not paid on a tranche until all shorter tranches have been paid off. This system provides interest and principal in a more predictable manner. A single pool of mortgages can be carved up into numerous tranches each with its own payment and risk characteristics.

Commercial Paper. Short term unsecured promissory note issued by a company or financial institution. Issued at a discount and matures for par or face value. Usually a maximum maturity of 270 days, and given a short-term debt rating by one or more NRSROs.

Convexity.A measure of a bond's price sensitivity to changing interest rates. A high convexity indicates greater sensitivity of a bond's price to interest rate changes.

Corporate Note.A debt instrument issued by a corporation with a maturity of greater than one year and less than ten years.

Counterparty. The other party in a two party financial transaction. "Counterparty risk" refers to the risk that the other party, to a transaction, will fail in its related obligations. For example, the bank or broker/dealer in a repurchase agreement.

Coupon Rate. Annual rate of interest on a debt security, expressed as a percentage of the bond's face value.

Current Yield. Annual rate of return on a bond based on its price. Calculated as (coupon rate / price), but does not accurately reflect a bond's true yield level.

Custody. Safekeeping services offered by a bank, financial institution or trust company, referred to as the "custodian." Service normally includes the holding and reporting of the customer's securities, the collection and disbursement of income, securities settlement and market values.

Dealer. A dealer, as opposed to a broker, acts as a principal in all transactions, buying and selling for his own account.

Delivery Versus Payment (DVP). Settlement procedure in which securities are delivered versus payment of cash, but only after cash has been received. Most security transactions, including those through the Fed Securities Wire system and DTC, are done DVP as a protection for both the buyer and seller of securities.

Depository Trust Company (DTC). A firm through which members can use a computer to arrange for securities to be delivered to other members without physical delivery of certificates. A member of the Federal Reserve System and owned mostly by the New York Stock Exchange, the Depository Trust Company uses computerized debit and credit entries. Most corporate securities, commercial paper, CDs and BAs clear through DTC.

Derivatives. For hedging purposes, common derivatives are options, futures, swaps and swaptions. All Collateralized Mortgage Obligations ("CMOs") are derivatives. (1) Financial instruments whose return profile is linked to, or derived from, the movement of one or more underlying index or security, and may include a leveraging factor, or (2) financial contracts based upon notional amounts whose value is derived from an underlying index or security (interest rates, foreign exchange rates, equities or commodities).

Derivative Security. Financial instrument created from, or whose value depends upon, one or more underlying assets or indexes of asset values.

Designated Bond.FFCB's regularly issued, liquid, non-callable securities that generally have a 2 or 3 year original maturity. New issues of Designated Bonds are $1 billion or larger. Re-openings of existing Designated Bond issues are generally a minimum of $100 million. Designated Bonds are offered through a syndicate of two to six dealers. Twice each month the Funding Corporation announces its intention to issue a new Designated Bond, reopen an existing issue, or to not issue or reopen a Designated Bond. Issues under the Designated Bond program constitute the same credit standing as other FFCB issues; they simply add organization and liquidity to the intermediate- and long-term Agency market.

Discount Notes. Unsecured general obligations issued by Federal Agencies at a discount. Discount notes mature at par and can range in maturity from overnight to one year. Very large primary (new issue) and secondary markets.

Discount Rate. Rate charged by the system of Federal Reserve Banks on overnight loans to member banks. Changes to this rate are administered by the Federal Reserve and closely mirror changes to the "fed funds rate."

Discount Securities. Non-interest bearing money market instruments that are issued at discount and redeemed at maturity for full face value. Examples include: U.S. Treasury Bills, Federal Agency Discount Notes, Bankers' Acceptances and Commercial Paper.

Discount. The amount by which a bond or other financial instrument sells below its face value. See also "Premium."

Diversification. Dividing investment funds among a variety of security types, maturities, industries and issuers offering potentially independent returns.

Dollar Price. A bond's cost expressed as a percentage of its face value. For example, a bond quoted at a dollar price of 95 ½, would have a principal cost of $955 per $1,000 of face value.

Duff & Phelps. One of several NRSROs that provide credit ratings on corporate and bank debt issues.

Duration. The weighted average maturity of a security's or portfolio's cash flows, where the present values of the cash flows serve as the weights. The greater the duration of a security/portfolio, the greater its percentage price volatility with respect to changes in interest rates. Used as a measure of risk and a key tool for managing a portfolio versus a benchmark and for hedging risk. There are also different kinds of duration used for different purposes (e.g. MacAuley Duration, Modified Duration).

Fannie Mae. See "Federal National Mortgage Association."

Fed Money Wire. A computerized communications system that connects the Federal Reserve System with its member banks, certain U. S. Treasury offices, and the Washington D.C. office of the Commodity Credit Corporation. The Fed Money Wire is the book entry system used to transfer cash balances between banks for themselves and for customer accounts.

Fed Securities Wire. A computerized communications system that facilitates book entry transfer of securities between banks, brokers and customer accounts, used primarily for settlement of U.S. Treasury and Federal Agency securities.

Fed. See "Federal Reserve System."

Federal Agency Security. A debt instrument issued by one of the Federal Agencies. Federal Agencies are considered second in credit quality and liquidity only to U.S. Treasuries.

Federal Agency. Government sponsored/owned entity created by the U.S. Congress, generally for the purpose of acting as a financial intermediary by borrowing in the marketplace and directing proceeds to specific areas of the economy considered to otherwise have restricted access to credit markets. The largest Federal Agencies are GNMA, FNMA, FHLMC, FHLB, FFCB, SLMA, and TVA.

Federal Deposit Insurance Corporation (FDIC). Federal agency that insures deposits at commercial banks, currently to a limit of $250,000 per depositor per bank.

Federal Farm Credit Bank (FFCB). One of the large Federal Agencies. A government sponsored enterprise (GSE) system that is a network of cooperatively-owned lending institutions that provides credit services to farmers, agricultural cooperatives and rural utilities. The FFCBs act as financial intermediaries that borrow money in the capital markets and use the proceeds to make loans and provide other assistance to farmers and farm-affiliated businesses. Consists of the consolidated operations of the Banks for Cooperatives, Federal Intermediate Credit Banks, and Federal Land Banks. Frequent issuer of discount notes, agency notes and callable agency securities. FFCB debt is not an obligation of, nor is it guaranteed by the U.S. government, although it is considered to have minimal credit risk due to its importance to the U.S. financial system and agricultural industry. Also issues notes under its "designated note" program.

Federal Funds (Fed Funds). Funds placed in Federal Reserve Banks by depository institutions in excess of current reserve requirements, and frequently loaned or borrowed on an overnight basis between depository institutions.

Federal Funds Rate (Fed Funds Rate). The interest rate charged by a depository institution lending Federal Funds to another depository institution. The Federal Reserve influences this rate by establishing a "target" Fed Funds rate associated with the Fed's management of monetary policy.

Federal Home Loan Bank System (FHLB). One of the large Federal Agencies. A government sponsored enterprise (GSE) system, consisting of wholesale banks (currently twelve district banks) owned by their member banks, which provides correspondent banking services and credit to various financial institutions, financed by the issuance of securities. The principal purpose of the FHLB is to add liquidity to the mortgage markets. Although FHLB does not directly fund mortgages, it provides a stable supply of credit to thrift institutions that make new mortgage loans. FHLB debt is not an obligation of, nor is it guaranteed by the U.S. government, although it is considered to have minimal credit risk due to its importance to the U.S. financial system and housing market. Frequent issuer of discount notes, agency notes and callable agency securities. Also issues notes under its "global note" and "TAP" programs.

Federal Home Loan Mortgage Corporation (FHLMC or "Freddie Mac"). One of the large Federal Agencies. A government sponsored public corporation (GSE) that provides stability and assistance to the secondary market for home mortgages by purchasing first mortgages and participation interests financed by the sale of debt and guaranteed mortgage backed securities. FHLMC debt is not an obligation of, nor is it guaranteed by the U.S. government, although it is considered to have minimal credit risk due to its importance to the U.S. financial system and housing market. Frequent issuer of discount notes, agency notes, callable agency securities and MBS. Also issues notes under its "reference note" program.

Federal National Mortgage Association (FNMA or "Fannie Mae"). One of the large Federal Agencies. A government sponsored public corporation (GSE) that provides liquidity to the residential mortgage market by purchasing mortgage loans from lenders, financed by the issuance of debt securities and MBS (pools of mortgages packaged together as a security). FNMA debt is not an obligation of, nor is it guaranteed by the U.S. government, although it is considered to have minimal credit risk due to its importance to the U.S. financial system and housing market. Frequent issuer of discount notes, agency notes, callable agency securities and MBS. Also issues notes under its "benchmark note" program.

Federal Reserve Bank. One of the 12 distinct banks of the Federal Reserve System.

Federal Reserve System (the Fed). The independent central bank system of the United States that establishes and conducts the nation's monetary policy. This is accomplished in three major ways: (1) raising or lowering bank reserve requirements, (2) raising or lowering the target Fed Funds Rate and Discount Rate, and (3) in open market operations by buying and selling government securities. The Federal Reserve System is made up of twelve Federal Reserve District Banks, their branches, and many national and state banks throughout the nation. It is headed by the seven member Board of Governors known as the "Federal Reserve Board" and headed by its Chairman.

Financial Industry Regulatory Authority, Inc (FINRA).is a private corporation that acts as a self-regulatory organization (SRO). FINRA is the successor to the National Association of Securities Dealers, Inc. (NASD). Though sometimes mistaken for a government agency, it is a non-governmental organization that performs financial regulation of member brokerage firms and exchange markets. The government also has a regulatory arm for investments, the Securities and Exchange Commission.

Fiscal Agent/Paying Agent.A bank or trust company that acts, under a trust agreement with a corporation or municipality, in the capacity of general treasurer. The agent performs such duties as making coupon payments, paying rents, redeeming bonds, and handling taxes relating to the issuance of bonds.

Fitch Investors Service, Inc. One of several NRSROs that provide credit ratings on corporate and municipal debt issues.

Floating Rate Security (FRN or "floater").A bond with an interest rate that is adjusted according to changes in an interest rate or index.Differs from variable-rate debt in that the changes to the rate take place immediately when the index changes, rather than on a predetermined schedule. See also "Variable Rate Security."

Freddie Mac. See "Federal Home Loan Mortgage Corporation".

Ginnie Mae. See "Government National Mortgage Association".

Global Notes: Notes designed to qualify for immediate trading in both the domestic U.S. capital market and in foreign markets around the globe. Usually large issues that are sold to investors worldwide and therefore have excellent liquidity. Despite their global sales, global notes sold in the U.S. are typically denominated in U.S. dollars.

Government National Mortgage Association (GNMA or "Ginnie Mae"). One of the large Federal Agencies.Government-owned Federal Agency that acquires, packages, and resells mortgages and mortgage purchase commitments in the form of mortgage-backed securities.Largest issuer of mortgage pass-through securities. GNMA debt is guaranteed by the full faith and credit of the U.S. government (one of the few agencies that is actually full faith and credit of the U.S.).

Government Securities. An obligation of the U.S. government, backed by the full faith and credit of the government. These securities are regarded as the highest quality of investment securities available in the U.S. securities market. See "Treasury Bills, Notes, Bonds, and SLGS."

Government Sponsored Enterprise (GSE). Privately owned entity subject to federal regulation and supervision, created by the U.S. Congress to reduce the cost of capital for certain borrowing sectors of the economy such as students, farmers, and homeowners. GSEs carry the implicit backing of the U.S. Government, but they are not direct obligations of the U.S. Government. For this reason, these securities will offer a yield premium over U.S. Treasuries. Some consider GSEs to be stealth recipients of corporate welfare. Examples of GSEs include: FHLB, FHLMC, FNMA and SLMA.

Government Sponsored Enterprise Security. A security issued by a Government Sponsored Enterprise. Considered Federal Agency Securities.

Index.A compilation of statistical data that tracks changes in the economy or in financial markets.

Interest-Only (IO) STRIP.A security based solely on the interest payments from the bond. After the principal has been repaid, interest payments stop and the value of the security falls to nothing. Therefore, IOs are considered risky investments. Usually associated with mortgage-backed securities.

Internal Controls. An internal control structure ensures that the assets of the entity are protected from loss, theft, or misuse. The internal control structure is designed to provide reasonable assurance that these objectives are met. The concept of reasonable assurance recognizes that 1) the cost of a control should not exceed the benefits likely to be derived and 2) the valuation of costs and benefits requires estimates and judgments by management. Internal controls should address the following points:

1. **Control of collusion** - Collusion is a situation where two or more employees are working in conjunction to defraud their employer.

2. **Separation of transaction authority from accounting and record keeping** - By separating the person who authorizes or performs the transaction from the people who record or otherwise account for the transaction, a separation of duties is achieved.

3. **Custodial safekeeping** - Securities purchased from any bank or dealer including appropriate collateral (as defined by state law) shall be placed with an independent third party for custodial safekeeping.

4. **Avoidance of physical delivery securities** - Book-entry securities are much easier to transfer and account for since actual delivery of a document never takes place. Delivered securities must be properly safeguarded against loss or destruction. The potential for fraud and loss increases with physically delivered securities.

5. **Clear delegation of authority to subordinate staff members** - Subordinate staff members must have a clear understanding of their authority and responsibilities to avoid improper actions. Clear delegation of authority also preserves the internal control structure that is contingent on the various staff positions and their respective responsibilities.

6. **Written confirmation of transactions for investments and wire transfers** - Due to the potential for error and improprieties arising from telephone and electronic transactions, all transactions should be supported by written communications and approved by the appropriate person. Written communications may be via fax if on letterhead and if the safekeeping institution has a list of authorized signatures.

7. **Development of a wire transfer agreement with the lead bank and third-party custodian** - The designated official should ensure that an agreement will be entered into and will address the following points: controls, security provisions, and responsibilities of each party making and receiving wire transfers.

Inverse Floater. A floating rate security structured in such a way that it reacts inversely to the direction of interest rates. Considered risky as their value moves in the opposite direction of normal fixed-income investments and whose interest rate can fall to zero.

Investment Advisor.A company that provides professional advice managing portfolios, investment recommendations and/or research in exchange for a management fee.

Investment Adviser Act of 1940. Federal legislation that sets the standards by which investment companies, such as mutual funds, are regulated in the areas of advertising, promotion, performance reporting requirements, and securities valuations.

Investment Grade. Bonds considered suitable for preservation of invested capital; bonds rated a minimum of Baa3 by Moody's, BBB- by Standard & Poor's, or BBB- by Fitch. Although "BBB" rated bonds are considered investment grade, most public agencies cannot invest in securities rated below "A."

Liquidity. Relative ease of converting an asset into cash without significant loss of value.Also, a relative measure of cash and near-cash items in a portfolio of assets. Also, a term describing the marketability of a money market security correlating to the narrowness of the spread between the bid and ask prices.

Local Government Investment Pool (LGIP). An investment by local governments in which their money is pooled as a method for managing local funds, (i.e., Tennessee LGIP Fund).

Long-Term Core Investment Program. Funds that are not needed within a one year period.

Market Value. The fair market value of a security or commodity.The price at which a willing buyer and seller would pay for a security.

Mark-to-market. Adjusting the value of an asset to its market value, reflecting in the process unrealized gains or losses.

Master Repurchase Agreement.A widely accepted standard agreement form published by the Bond Market Association (BMA) that is used to govern and document Repurchase Agreements and protect the interest of parties in a repo transaction.

Maturity Date. Date on which principal payment of a financial obligation is to be paid.

Medium Term Notes (MTN's). Used frequently to refer to corporate notes of medium maturity (5-years and under). Technically, any debt security issued by a corporate or depository institution with a maturity from 1 to 10 years and issued under an MTN shelf registration. Usually issued in smaller issues with varying coupons and maturities, and underwritten by a variety of broker/dealers (as opposed to large corporate deals issued and underwritten all at once in large size and with a fixed coupon and maturity).

Money Market. The market in which short-term debt instruments (bills, commercial paper, bankers' acceptance, etc.) are issued and traded.

Money Market Mutual Fund (MMF).A type of mutual fund that invests solely in money market instruments, such as: U.S. Treasury bills, commercial paper, bankers' acceptances, and repurchase agreements. Money market mutual funds are registered with the SEC under the Investment Company Act of 1940 and are subject "rule 2a-7" which significantly limits average maturity and credit quality of holdings. MMF's are managed to maintain a stable net asset value (NAV) of $1.00. Many MMFs carry ratings by a NRSRO.

Moody's Investors Service. One of several NRSROs that provide credit ratings on corporate and municipal debt issues.

Mortgage Backed Securities (MBS). Mortgage-backed securities represent an ownership interest in a pool of mortgage loans made by financial institutions, such as savings and loans, commercial banks, or mortgage companies, to finance the borrower's purchase of a home or other real estate. The majority of MBS are issued and/or guaranteed by GNMA, FNMA and FHLMC. There are a variety of MBS structures, some of which can be very risky and complicated. All MBS have reinvestment risk as actual principal and interest payments are dependent on the payment of the underlying mortgages which can be prepaid by mortgage holders to refinance and lower rates or simply because the underlying property was sold.

Mortgage Pass-Through Securities. A pool of residential mortgage loans with the monthly interest and principal distributed to investors on a pro-rata basis. Largest issuer is GNMA.

Municipal Note/Bond.A debt instrument issued by a state or local government unit or public agency. The vast majority of municipals are exempt from state and federal income tax, although some non-qualified issues are taxable.

Mutual Fund. Portfolio of securities professionally managed by a registered investment company that issues shares to investors. Many different types of mutual funds exist (bond, equity, money fund); all except money market funds operate on a variable net asset value (NAV).

Negotiable Certificate of Deposit (Negotiable CD). Large denomination CDs ($100,000 and larger) that are issued in bearer form and can be traded in the secondary market.

Net Asset Value. The market value of one share of an investment company, such as a mutual fund. This figure is calculated by totaling a fund's assets which includes securities, cash, and any accrued earnings, subtracting this from the fund's liabilities and dividing this total by the number of shares outstanding. This is calculated once a day based on the closing price for each security in the fund's portfolio. (See below.)

[(Total assets) - (Liabilities)]/(Number of shares outstanding)

NRSRO.A "Nationally Recognized Statistical Rating Organization."A designated rating organization that the SEC has deemed a strong national presence in the U.S. NRSROs provide credit ratings on corporate and bank debt issues. Only ratings of a NRSRO may be used for the regulatory purposes of rating. Includes Moody's, S&P, Fitch and Duff & Phelps.

Offered Price. See also "Ask Price."

Open Market Operations. Federal Reserve monetary policy tactic entailing the purchase or sale of government securities in the open market by the Federal Reserve System from and to primary dealers in order to influence the money supply, credit conditions, and interest rates.

Par Value. Face value, stated value or maturity value of a security.

Physical Delivery. Delivery of readily available underlying assets at contract maturity.

Portfolio. Collection of securities and investments held by an investor.

Premium. The amount by which a bond or other financial instrument sells above its face value. See also "Discount."

Primary Dealer. Any of a group of designated government securities dealers designated by to the Federal Reserve Bank of New York. Primary dealers can buy and sell government securities directly with the Fed. Primary dealers also submit daily reports of market activity and security positions held to the Fed and are subject to its informal oversight. Primary dealers are considered the largest players in the U.S. Treasury securities market.

Prime Paper. Commercial paper of high quality. Highest rated paper is A-1+/A-1 by S&P and P-1 by Moody's.

Principal. Face value of a financial instrument on which interest accrues.May be less than par value if some principal has been repaid or retired. For a transaction, principal is par value times price and includes any premium or discount.

Prudent Investor Standard. Standard that requires that when investing, reinvesting, purchasing, acquiring, exchanging, selling, or managing public funds, a trustee shall act with care, skill, prudence, and diligence under the circumstances then prevailing, including, but not limited to, the general economic conditions and the anticipated needs of the agency, that a prudent person acting in a like capacity and familiarity with those matters would use in the conduct of funds of a like character and with like aims, to safeguard the principal and maintain the liquidity needs of the agency. More stringent than the "prudent person" standard as it implies a level of knowledge commensurate with the responsibility at hand.

Range Note.A type of structured note that accrues interest daily at a set coupon rate that is tied to an index. Most range notes have two coupon levels; a higher accrual rate for the period the index is within a designated range, the lower accrual rate for the period that the index falls outside the designated range. This lower rate may be zero and may result in zero earnings.

Rate of Return. Amount of income received from an investment, expressed as a percentage of the amount invested.

Realized Gains (Losses). The difference between the sale price of an investment and its book value. Gains/losses are "realized" when the security is actually sold, as compared to "unrealized" gains/losses which are based on current market value. See "Unrealized Gains (Losses)."

Reference Bills: FHLMC's short-term debt program created to supplement its existing discount note program by offering issues from one month through one year, auctioned on a weekly or on an alternating four-week basis (depending upon maturity) offered in sizeable volumes ($1 billion and up) on a cycle of regular, standardized issuance. Globally sponsored and distributed, Reference Bill issues are intended to encourage active trading and market-making and facilitate the development of a term repo market. The program was designed to offer predictable supply, pricing transparency and liquidity, thereby providing alternatives to U.S. Treasury bills. FHLMC's Reference Bills are unsecured general corporate obligations. This program supplements the corporation's existing discount note program. Issues under the Reference program constitute the same credit standing as other FHLMC discount notes; they simply add organization and liquidity to the short-term Agency discount note market.

Reference Notes: FHLMC's intermediate-term debt program with issuances of 2, 3, 5, 10 and 30-year maturities. Initial issuances range from $2 - $6 billion with re-openings ranging $1 - $4 billion.

The notes are high-quality bullet structures securities that pay interest semiannually. Issues under the Reference program constitute the same credit standing as other FHLMC notes; they simply add organization and liquidity to the intermediate- and long-term Agency market.

Repurchase Agreement (Repo).A short-term investment vehicle where an investor agrees to buy securities from a counterparty and simultaneously agrees to resell the securities back to the counterparty at an agreed upon time and for an agreed upon price. The difference between the purchase price and the sale price represents interest earned on the agreement. In effect, it represents a collateralized loan to the investor, where the securities are the collateral. Can be DVP, where securities are delivered to the investor's custodial bank, or "tri-party" where the securities are delivered to a third party intermediary. Any type of security can be used as "collateral," but only some types provide the investor with special bankruptcy protection under the law. Repos should be undertaken only when an appropriate BMA approved master repurchase agreement is in place.

Reverse Repurchase Agreement (Reverse Repo).A repo from the point of view of the original seller of securities. Used by dealers to finance their inventory of securities by essentially borrowing at short-term rates. Can also be used to leverage a portfolio and in this sense, can be considered risky if used improperly.

Safekeeping. Service offered for a fee, usually by financial institutions, for the holding of securities and other valuables. Safekeeping is a component of custody services.

Secondary Market. Markets for the purchase and sale of any previously issued financial instrument.

Securities Lending. An arrangement between and investor and a custody bank that allows the custody bank to "loan" the investors investment holdings, reinvest the proceeds in permitted investments, and shares any profits with the investor. Should be governed by a securities lending agreement.Can increase the risk of a portfolio in that the investor takes on the default risk on the reinvestment at the discretion of the custodian.

Sinking Fund.A separate accumulation of cash or investments (including earnings on investments) in a fund in accordance with the terms of a trust agreement or indenture, funded by periodic deposits by the issuer (or other entity responsible for debt service), for the purpose of assuring timely availability of moneys for payment of debt service. Usually used in connection with term bonds.

Spread. The difference between the price of a security and similar maturity U.S. Treasury investments, expressed in percentage terms or basis points. A spread can also be the absolute difference in yield between two securities. The securities can be in different markets or within the same securities market between different credits, sectors, or other relevant factors.

Standard & Poor's. One of several NRSROs that provide credit ratings on corporate and municipal debt issues.

STRIPS (Separate Trading of Registered Interest and Principal of Securities). Acronym applied to U.S. Treasury securities that have had their coupons and principal repayments separated into individual zero-coupon Treasury securities. The same technique and "strips" description can be applied to non-Treasury securities (e.g. FNMA strips).

Structured Notes. Notes that have imbedded into their structure options such as step-up coupons or derivative-based returns.

Swap. Trading one asset for another.

TAP Notes: Federal Agency notes issued under the FHLB TAP program. Launched in 6/99 as a refinement to the FHLB bullet bond auction process. In a break from the FHLB's traditional practice of bringing numerous small issues to market with similar maturities, the TAP Issue Program uses the four most common maturities and reopens them up regularly through a competitive auction. These maturities (2, 3, 5 and 10 year) will remain open for the calendar quarter, after which they will be closed and a new series of TAP issues will be opened to replace them. This reduces the number of separate bullet bonds issued, but generates enhanced awareness and liquidity in the marketplace through increased issue size and secondary market volume.

Tennessee Valley Authority (TVA). One of the large Federal Agencies. A wholly owned corporation of the United States government that was established in 1933 to develop the resources of the Tennessee Valley region in order to strengthen the regional and national economy and the national defense. Power operations are separated from non-power operations. TVA securities represent obligations of TVA, payable solely from TVA's net power proceeds, and are neither obligations of nor guaranteed by the United States. TVA is currently authorized to issue debt up to $30 billion. Under this authorization, TVA may also obtain advances from the U.S. Treasury of up to $150 million. Frequent issuer of discount notes, agency notes and callable agency securities.

Total Return. Investment performance measured over a period of time that includes coupon interest, interest on interest, and both realized and unrealized gains or losses. Total return includes, therefore, any market value appreciation/depreciation on investments held at period end.

Treasuries. Collective term used to describe debt instruments backed by the U.S. Government and issued through the U.S. Department of the Treasury. Includes Treasury bills, Treasury notes, and Treasury bonds.Also a benchmark term used as a basis by which the yields of non-Treasury securities are compared (e.g., "trading at 50 basis points over Treasuries").

Treasury Bills (T-Bills). Short-term direct obligations of the United States Government issued with an original term of one year or less. Treasury bills are sold at a discount from face value and do not pay interest before maturity. The difference between the purchase price of the bill and the maturity value is the interest earned on the bill. Currently, the U.S. Treasury issues 4-week, 13-week and 26-week T-Bills

Treasury Bonds. Long-term interest-bearing debt securities backed by the U.S. Government and issued with maturities of ten years and longer by the U.S. Department of the Treasury. The Treasury stopped issuing Treasury Bonds in August 2001.

Treasury Notes. Intermediate interest-bearing debt securities backed by the U.S. Government and issued with maturities ranging from one to ten years by the U.S. Department of the Treasury. The Treasury currently issues 2-year, 5-year and 10-year Treasury Notes.

Trustee. A bank designated by an issuer of securities as the custodian of funds and official representative of bondholders. Trustees are appointed to insure compliance with the bond documents and to represent bondholders in enforcing their contract with the issuer.

Uniform Net Capital Rule.SEC regulation 15C3-1 that outlines the minimum net capital ratio (ratio of indebtedness to net liquid capital) of member firms and non-member broker/dealers.

Unrealized Gains (Losses). The difference between the market value of an investment and its book value. Gains/losses are "realized" when the security is actually sold, as compared to "unrealized" gains/losses which are based on current market value. See also "Realized Gains (Losses)."

Variable-Rate Security.A bond that bears interest at a rate that varies over time based on a specified schedule of adjustment (e.g., daily, weekly, monthly, semi-annually or annually). See also "Floating Rate Note."

Weighted Average Maturity (or just "Average Maturity"). The average maturity of all securities and investments of a portfolio, determined by multiplying the par or principal value of each security or investment by its maturity (days or years), summing the products, and dividing the sum by the total principal value of the portfolio. A simple measure of risk of a fixed-income portfolio.

Weighted Average Maturity to Call. The average maturity of all securities and investments of a portfolio, adjusted to substitute the first call date per security for maturity date for those securities with call provisions.

Yield Curve. A graphic depiction of yields on like securities in relation to remaining maturities spread over a time line. The traditional yield curve depicts yields on U.S. Treasuries, although yield curves exist for Federal Agencies and various credit quality corporates as well. Yield curves can be positively sloped (normal) where longer-term investments have higher yields, or "inverted" (uncommon) where longer-term investments have lower yields than shorter ones.

Yield to Call (YTC). Same as "Yield to Maturity," except the return is measured to the first call date rather than the maturity date. Yield to call can be significantly higher or lower than a security's yield to maturity.

Yield to Maturity (YTM). Calculated return on an investment, assuming all cash flows from the security are reinvested at the same original yield. Can be higher or lower than the coupon rate depending on market rates and whether the security was purchased at a premium or discount. There are different conventions for calculating YTM for various types of securities.

Yield. There are numerous methods of yield determination. In this glossary, see also "Current Yield," "Yield Curve," "Yield to Call" and "Yield to Maturity."