

Short-Term Debt / Money Market Instruments

What are money market securities?

Treasury bills – 4-, 13-, 26-, and 52-week maturities

Minimum face \$100

Pure discount securities

Exempt from state and local taxes

Auctions – Competitive versus Non-competitive bids

Maturity	Days to maturity	Bid	Asked	Chg	Ask yld
Jun 24, 14	87	5.93	5.92	0.01	6.10

Bid and Asked are Bank Discount Yield (BD)

$$\text{Price} = \text{Face value} \left(1 - \frac{\text{Days}}{360} \times R_{BD} \right)$$

$$R_{BD} = \frac{\text{Par-Price}}{\text{Par}} \times \frac{360}{n}$$

Problems:

- 1) 360 day year
- 2) Simple interest, not compound interest
- 3) Denominator is face value, not investment amount

Ask Yield – Bond Equivalent Yield (BEY)

$$R_{BEY} = \frac{\text{Par-Price}}{\text{Price}} \times \frac{365}{n}$$

To convert BD to BEY:

$$R_{\text{BEY}} = \frac{365 \times R_{\text{BD}}}{360 - (R_{\text{BD}} \times n)}$$

Leap Year Convention – If February 29th occurs in the next 12 months, use 366 days in the year, not 365. For example, 2016 is a leap year, so starting March 1, 2015, 366 days will be used in the calculations.

Problems:

1) APR – simple interest, not compound interest

Bank discount yield < Bond equivalent yield < Effective annual rate

To find the EAR:

Other Money Market Instruments

- Negotiable CDs

- Commercial paper

- Bankers' acceptances

- Eurodollars

- Repurchase agreement (Repos)

- Reverse repos

- Federal Funds

- Brokers' call

- LIBOR loans