



An Overview of the US Closed-End Fund Market

By Paul Mazzilli

Introduction

Closed-end funds (CEFs) are professionally managed investment companies that offer investors various unique benefits. They offer investors ways to generate capital growth and income through portfolio performance, dividends and distributions, and through making trades in the marketplace at beneficial prices.

CEF shares trade as individual stocks. They are listed on major securities exchanges and can be bought and sold in the open market. They typically trade in relation to, but independent of, their underlying net asset values (NAVs). Intra-day trading allows investors to purchase and sell shares of closed-end funds just like the shares of other publicly traded securities. In addition, when shares of closed-end funds trade at prices below their underlying NAVs (at a discount), investors have the opportunity to enhance the return on their investment by making bargain purchases that may also offer more attractive yields on the discounted market price.

Closed-end funds are among the oldest types of investment companies. The first closed-end fund in the United States was formed in 1893, more than 30 years before the first mutual fund was created in the United States. Currently, there are more than 650 closed-end funds with some \$224 billion in assets. Some CEFs have management and performance histories that date back over half a century. Closed-end funds provide investors an important way to achieve their long-term investment goals.

Closed-end funds have a fixed number of shares outstanding. Following an initial public offering, their shares are traded on an exchange between investors. Transactions in shares of closed-end funds are based on their market price as determined by the forces of supply and demand among investors in the marketplace. Thus, the market price of a CEF may be above (at a premium to) or below (at a discount to) its NAV. The invested capital in a closed-end fund is fixed and will change only at the direction of management. Capital can be increased through the issuance of shares in conjunction with a rights or secondary offering or through the reinvestment of certain fund dividends and distributions. Capital can be reduced when shares of the CEF fund are repurchased in conjunction with a stock repurchase program or tender offer.

Investors buy closed-end funds to diversify their assets and to let professionals manage their money. Some funds offer relatively low-risk, broadly diversified portfolios that many investors may find attractive as the core US equity or fixed income portions of their portfolios. Others offer diversified investments in particular industries. Closed-end funds enable US investors to diversify internationally and to participate in markets that may boost their overall portfolio performance.

Many closed-end funds have lower expense ratios than open-end funds with similar investment objectives. Closed-end funds do not have recurring marketing expenses and do not incur the trading, accounting, and reporting costs related to the constant inflows and outflows of open-end

funds. Some of the older funds have lower management fees than newer funds. In addition, some have unique structures that involve no outside management contracts or fees; the managers are employees of the fund investment company. On average, closed-end equity funds have expense ratios that are 40–60 basis points lower than those of open-end funds with similar objectives. Expenses can have a significant impact on the returns of long-term investors. If a shareholder invested \$10,000 for 25 years at a net return of 10% per year, he or she would have \$108,347 at the end of the period. The same investment yielding 9.5% (assuming fees were 50 basis points higher) would be worth \$96,683.

Closed-end funds also provide an efficient structure for portfolio managers. They are capitalized through public offerings and are not subject to daily cash flows. This allows the portfolio to remain fully invested at all times. Closed-end funds facilitate investment in markets and securities that otherwise might be inaccessible. Because they do not have to produce cash to meet redemptions, closed-end funds can be an attractive vehicle for investing the equity or debt of emerging markets, such as Russia and India. In the US market, venture capital, restricted securities, and other investments that are illiquid, but often highly profitable, are also viable investments for closed-end funds. In addition, closed-end funds are efficient vehicles for undertaking option writing strategies.

Many closed-end funds trade at discounts to their net asset values. Because of supply and demand factors, the price of a closed-end fund often differs from its underlying net asset value (NAV). In contrast, open-end funds take in new money and make cash redemptions at each day's closing NAV. The relationship between the price and NAV of a closed-end fund can fluctuate in direction, creating risks as well as opportunities.

Many factors affect fund premiums and discounts. Factors affecting supply and demand include changes in investors' asset allocations, events in the global markets, the new issue calendar, sales by investors to realize tax losses, and concerns on the part of taxable investors about possible capital gains distributions. All of these factors can create trading opportunities for investors who are mindful of changes in the relative valuations of funds and alternative investments.

Possible Advantages of Closed-End Funds

Diversification—In closed-end funds you own a share in a portfolio that invests in many securities, which helps to spread market risk. If any one security performs poorly, it is less likely to have a severe impact on your investment.

Professional Management—The portfolio manager or team selects securities and monitors them on a full-time basis. You can participate in closed-end funds without developing investment expertise or devoting hours of time to research specific issues.

Clear Objectives—Most closed-end funds specialize in either stocks or fixed income securities and pursue a consistent objective, such as capital appreciation or current income. Some funds are highly specialized, investing in a given region, country or specific type of security.

Economy of Scale—The costs of operating a closed-end fund are divided pro rata among all shareholders. The major ongoing cost, a management fee paid to the investment advisor, is based on assets and is very competitive with the same expense in open-end mutual funds.

Periodic Distributions—Most CEFs make distributions according to a prescribed schedule. If you depend on your investments for current income, this will allow you to plan the timing of income. Many funds have fixed distribution objectives, but the actual amounts of income distributed by closed-end funds vary with market conditions and fund performance.

“Pass Through” Taxation—Similar to open-end mutual funds, closed-end funds generally do not pay taxes at the fund level on amounts distributed to investors. The taxation is said to “pass through” to the shareholders.

Opportunity to Buy at a Discount—When closed-end funds can be bought at a discount to net asset value, investors are buying a dollar’s worth of assets for less than a dollar. This can be attractive for two reasons:

- The yields of income-oriented funds will be higher when calculated on actual dollars invested at a discount, compared to NAV. For example, suppose a fund has a NAV of \$10.00 per share, market price of \$9.00 a share, and generates income of \$0.50 per year. The yield based on NAV is 5% (\$0.50 divided by \$10.00). If you bought a mutual fund at NAV, this is the yield you would receive. But in the closed-end fund, the yield based on actual dollars invested is 5.6% (\$0.50 divided by \$9.00).
- If the discount of the closed-end fund you are holding narrows, the reduction in the discount will give a boost to the fund’s performance when you sell the shares. Using the same example in the paragraph above, suppose you bought the closed-end fund at a \$1.00 discount to NAV. Several years later, you sell it at NAV. Your capital gain would be the change in NAV over this period plus the \$1.00 reduction in the discount.

Efficient Portfolio Management—Unlike open-end mutual fund managers who must be concerned about constant inflows and outflows of cash, closed-end fund managers are responsible for a stable pool of capital. Although fund shares trade actively, this does not affect the fund manager because no assets are flowing into or out of the portfolio. Therefore, closed-end fund managers can put capital to work in a long-term strategy, without worrying whether their fund will have enough liquidity to pay back investors who suddenly redeem shares. This may lead to superior investment results. It also makes the closed-end fund structure advantageous for investing in specialized areas, such as less liquid securities or markets, venture capital opportunities, real estate, option writing, and private placements. Regardless of trading volume or market price fluctuations, closed-end fund managers are never forced to sell securities in a declining market to meet redemptions. Conversely, in a bull market, closed-end fund managers are not flooded with new cash that they must invest at rising prices.

Leverage Potential—Closed-end funds may issue senior securities (preferred stock or debentures) or borrow money to “leverage” their investment positions. This gives portfolio managers of closed-end funds in the fixed income area in particular the opportunity to enhance yield and provide investors with superior performance. It also gives them more flexibility to take advantage of timely market opportunities. The use of leverage, of course, increases the likelihood of share price volatility and market risk. Thus, some closed-end funds do not leverage their portfolios as a matter of policy because they seek to avoid the increased level of risk for investors.

Comparatively Lower Expense Ratios—Closed-end funds do not incur ongoing costs associated with distributing their shares as do most open-end mutual funds; thus, the expense ratios of closed-end funds are usually less than those of mutual funds with similar investment objectives. Over time, a lower expense ratio provides a boost to investment performance.

Types of Closed-End Funds

Municipal Bond Funds -- Municipal funds account for almost half of all CEFs. These funds seek to provide current income exempt from regular federal income tax by investing in municipal securities - bonds issued by state and local governments and agencies. Single-state municipal funds are intended to provide income free from state related taxes as well. Options available within the municipal fund sector besides the typical investment grade long-term funds are insured

funds, intermediate term funds, and funds with a substantial amount of low-quality or non-rated bonds.

Equity Funds -- The second largest part of the CEF market invests in US and international equities. There are a wide array of equity-oriented funds to suit investors looking for broad-based equity allocations and sector-specific exposure. Domestic equity funds invest primarily in companies whose common stock is both listed and incorporated in the U.S. There are also many sector-specific or specialty funds that invest in specific industries or securities, such as master limited partnerships (MLPs), real estate investment trusts (REITs), or venture capital investments. Global/international equity funds invest in both U.S. and foreign equity securities. While some funds are fully diversified throughout various countries, there are also funds available that invest specifically in equity securities of a single country.

Taxable Bond Funds -- The third largest part of the US CEF market invests in taxable fixed income securities. These funds invest in bonds or other debt related instruments. They hold diversified portfolios of securities, such as corporate bonds, senior bank loans, and preferred stock. Some funds concentrate on one particular type of debt instrument, while others invest in various forms of debt securities (i.e. multi-sector bond funds). There are also a number of funds that invest in international fixed income securities, both in developed and emerging market countries. The following are the specific types of CEFs that are categorized as taxable bond funds:

Investment-grade corporate bond funds invest primarily in domestic corporate bonds rated BBB or above.

Mortgage-backed funds invest primarily in a variety of mortgage-backed securities and mortgage derivatives. Many assets have high credit ratings because of US government guarantees. These funds can be complex compared with corporate or government bond funds because their cash flows can consist of interest and amortization of principal.

Preferred/Equity income funds seek attractive current income with modest capital growth. They typically invest in dividend-paying securities, including common and preferred stocks. Some dividend income funds seek to maximize the amount of income qualifying for the dividends received deduction (DRD) and the favorable 15% maximum rate on dividends from qualified securities. However, many newer funds focus on higher-yielding trust-structured preferred stock, which are tax deductible for the issuer but taxed as ordinary income for the investor.

Multi-sector funds allocate assets among several fixed income sectors. Typically, three sectors are emphasized: US government securities, foreign government securities, and high yield bonds. These funds usually do not invest more than 50% in any one sector.

Senior loan funds invest primarily in senior collateralized bank loans of below-investment-grade corporations. The income generated from these funds is tied to short-term interest rates. The short-term, floating-rate nature of portfolio loans can foster principal stability relative to some other asset classes. The main risk of these funds is credit related. One of their most important benefits is that they can provide a potential hedge against rising interest rates.

High yield bond funds invest primarily in domestic issues of corporate debt rated below-investment-grade (below triple-B). Although these funds offer high current income, their portfolios have above-average risk and volatility. Several high yield funds also invest in non-US sovereign and corporate debt.

Hybrid funds typically invest in a combination of high yield bonds and floating-rate bank loans of below-investment-grade companies. Hybrid funds tend to exhibit less NAV sensitivity to changes in interest rates than dedicated high yield funds.

Emerging market debt funds typically invest mostly in emerging market government securities. In addition, some assets may at times be invested in emerging market corporate bonds. Portfolios are usually US dollar-denominated, but they may include some sovereign bonds that entail currency risk. Although these funds offer high current income, their portfolios can have a higher degree of risk and potential volatility.

Global income funds invest primarily in US and foreign government and corporate debt. They frequently emphasize developed countries, but they may also have exposure to countries with lower credit ratings. Most funds offer broad country diversification and maintain a majority of their holdings in US dollar-denominated debt. However, some possess significant currency risk.

Equity Income Funds – Equity income funds may hold high yielding equities or provide exposure to portions of both the equity and debt markets in order to provide high levels of current income. Most of these funds pass income through to shareholders on a monthly or quarterly basis.

Option Income Funds -- The option income sector is one of the newest sectors. Option income funds may be attractive to investors seeking higher income and lower volatility. They offer a way to give up some upside potential in order to generate high current income. While each fund's strategy differs, the main objective is to invest in a portfolio of common stocks and write call options on those stocks or comparable indexes. The premium received on the call options then flows through to investors through distributions by the fund on a monthly or quarterly basis. While some funds try to maximize the income generated by writing calls on 100% of their portfolios, others may seek to "cover" just 30-50% of their holdings. Covering a smaller percentage of a portfolio results in less current income, but increases the potential for capital appreciation. In addition, the decision to use index options or single stock options impacts the amount of income generated and the tax rates applied. Single stock call options tend to generate higher levels of income since stocks are more volatile than indexes. However, index options can be more tax efficient.

Most option income funds are actively managed to produce favorable rates of taxation. In certain situations, writing index options can be more tax efficient than writing single stock call options. Generally, income from writing index options is taxed as 1256 contracts subject to 60% long-term and 40% short-term gains and are "marked-to-market" at year-end. However, premiums received from writing single stock call options that expire unexercised usually are treated as short-term capital gains. Some managers also employ dividend capture strategies. This involves buying and holding a stock for more than 60 of the 120 days around an ex-dividend date. This can result in higher levels of qualified dividend income (QDI) and short-term losses (if the stock declines by the amount of the dividend paid and the dividend paid did not constitute a so-called "extraordinary dividend"). The losses can be used to offset short-term gains created by writing covered calls. While this strategy may not increase the total return of the fund, it can be effective in tax management.

Investment Risks

All investments involve risk and investors should be fully aware of the chance of loss. All investments involve risk—some more than others. Risk, however, is related to reward. Generally, investments with higher risk levels also offer higher reward prospects. Investors should be aware of the risks associated with any investment they contemplate, including shares of CEFs. The following is a summary of some of the risks to be considered.

Market Risk—Markets rise and fall based on the prices of individual securities. Investor sentiment, economic conditions, global events, and many other factors contribute to the day-to-day changes and the overall trend of the markets. Equity securities and the stock markets tend to fluctuate more widely and rapidly than fixed-income securities and the bond markets. International markets present additional risk factors. The degree of fluctuation has risen dramatically in recent years; thus, markets have become more volatile. The prospect of a market decline, and its related impact on the prices of individual securities and fund shares, represents general market risk.

Issuer Risk—The general risk that an issuer of a security will not be able to meet operating expectations or will have some other difficulty, which will cause the value of an investment to decline.

Credit Risk—The risk that an issuer will default on an obligation.

Interest Rate Risk—The risk that a rise in interest rates will cause the value of an investment to decline.

Prepayment Risk—The risk that a security will be prepaid (or called) prior to maturity and that the proceeds can be reinvested only in investments offering a less attractive yield.

Inflation Risk—The risk that inflation will result in the erosion of the value of an investment.

Liquidity Risk—The risk that the market cannot accommodate the size of an order to buy or sell a security within the desired timeframe.

Political risk—The risk that a foreign security or fund will be impacted adversely by unfavorable political developments.

Currency Risk—The risk that a currency devaluation or exchange rate change will result in the decline in the value of an investment.

Leverage Risk—The risk that the cost to a fund of its leveraged capital, such as preferred stock or debt, will exceed the earnings on the related assets; also, the risk of higher share price volatility.

Premium/Discount Risk—The fact that a CEF can trade at a premium or discount to its Net Asset Value creates additional risks related to this relationship.

About Paul Mazzilli

Paul Mazzilli is a leading exchange-traded fund (ETF) and closed-end fund (CEF) analyst with over 35 years of experience in the investment business. He most recently served as an Executive Director at Morgan Stanley, which he joined in 1975. From 1997 to 2008, Mr. Mazzilli was Director of Morgan Stanley's ETF Research team covering index-linked ETFs and actively managed closed-end fund companies. His coverage universe included a broad range of funds listed on U.S. exchanges that invest in equities in the U.S. and in international regions and countries, as well as taxable and municipal fixed income, commodities, and currencies. Among his roles at Morgan Stanley, Mr. Mazzilli was responsible for constructing asset allocation models using closed-end funds and ETFs and developing Strategic Equity Portfolios (STEPS) investing in closed-end funds and ETFs.

Mr. Mazzilli's team was the first to provide research coverage on index-linked ETFs and won many awards in this area. Such awards include the Most Useful ETF Research in the U.S. Every Year since Inception in 2004 at the annual ETF Global Awards Conference and a new award for the Best Research Team for

Exchange-Traded Funds in 2007 at the 7th Annual Capital Link Forum on Closed-End Funds and ETFs in April 2008. In 2009, Capital Link made a special award to Mr. Mazzilli in recognition of his contribution to the closed-end fund & ETF sectors.

Mr. Mazzilli joined Morgan Stanley initially in Planning and Analysis and Investment Banking administration. He later worked in Capital Markets, Pensions and Equity Derivatives. Before joining Equity Research, Mr. Mazzilli spent five years in Equity Capital Markets Services, where he worked on the development and marketing of new issues of closed-end funds for Morgan Stanley Asset Management and listed derivative securities, such as Morgan Stanley Group equity-linked notes and warrants.

Mr. Mazzilli earned a B.S. in industrial and systems engineering from Syracuse University and an M.B.A. in finance from the Columbia University Graduate School of Business.