

Financial instruments

Company financing, in its simplest form, can be debt or equity. In this article, we explore some of the rich variety of financial instruments that lie on the risk–return continuum between these two extremes, and consider when their use might be appropriate. Various kinds of debt and equity are reviewed, together with hybrid instruments and other types of financing, such as securitisation and leasing.

A fundamental question for any business is that of how to finance its operations. At the most basic level, there is a choice between equity and debt. However, there are many financial instruments that can be used to finance a business, including some that have the characteristics of both equity and debt. This article examines a range of such instruments, and identifies situations when their use is appropriate.

How to finance ?

Key issues to be considered when financing a business include

- availability of finance when needed;
- costs of finance;
- flexibility.

Previous finance articles in MQ have identified that equity costs more than debt, and that a suitable capital structure can optimise the cost of capital. However, different

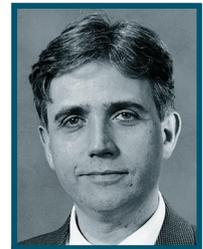
financial instruments offer different degrees of flexibility as well as incurring different costs. In essence, the holders of these instruments take different degrees of risk and therefore seek different returns.

A basic business is likely to be funded by a mixture of equity and debt. The basic differences between these are shown in *Table 1*.

There are

- many different types of debt;
- hybrid instruments (such as convertibles and warrants) which carry obligations for repayment and payment of interest like debt, but also rights to participate in the growth of the business as equity;
- different types of equity with different rights, particularly in any winding-up.

From the company's point of view, a high degree of debt is attractive, because that decreases the cost of capital (owing to the lower level of riskiness and the tax



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Table 1 Debt and equity

Debt	Equity
Repayable	Usually permanent
Interest payments must be made	Dividends discretionary
Interest tax-deductible	Dividends paid out of after-tax earnings
Paid out before equity in a liquidation	Last in line in a liquidation
Lower cost to company	Higher cost to company
Lender can protect downside by security/covenants	Shareholders' downside limited to amount paid for shares
No upside	Unlimited upside

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deductibility of interest). However, there is a limit to the total level of risk that a business can bear as a result of the combination of business risk and financial risk. Therefore, the amount of risky debt that a company can take on is also a function of the business risk, represented by the volatility of future cashflows. See *Figure 1*.

Before examining individual instruments, it is helpful to set out instruments in terms of riskiness (defined as ranking in a liquidation and as reflected in the extra return demanded). Generally, the further an instrument is to the right of *Figure 2*, the higher is the effective cost to the company and the higher is the return expected by the provider of capital. The return in the form of ordinary shares will include dividends and capital growth, whereas the other instruments may have stated 'interest rate' type returns on either a fixed or floating rate basis. In some cases, the returns expected from hybrid instruments may exceed those of preference capital because of the expected additional returns from the equity component (see below).

The differing characteristics of each type of instrument are examined below.

Equity

There are two basic types of share : ordinary shares and preference shares.

Ordinary shares

The investors who hold the ordinary shares of a corporation (called common stock in the USA) are the owners of the company. They have the right to share in the success and failure of the business indefinitely. In most countries, ordinary shareholders of publicly listed companies have the following common rights :

- a share in the profit of the business through the payment of dividends;
- voting rights at annual general meetings;
- limited liability if the company goes into liquidation;
- the last claim on the assets of a company that goes into liquidation;
- information in the form of an annual report that includes financial statements.

As noted above, ordinary shareholders receive a return through dividend payments

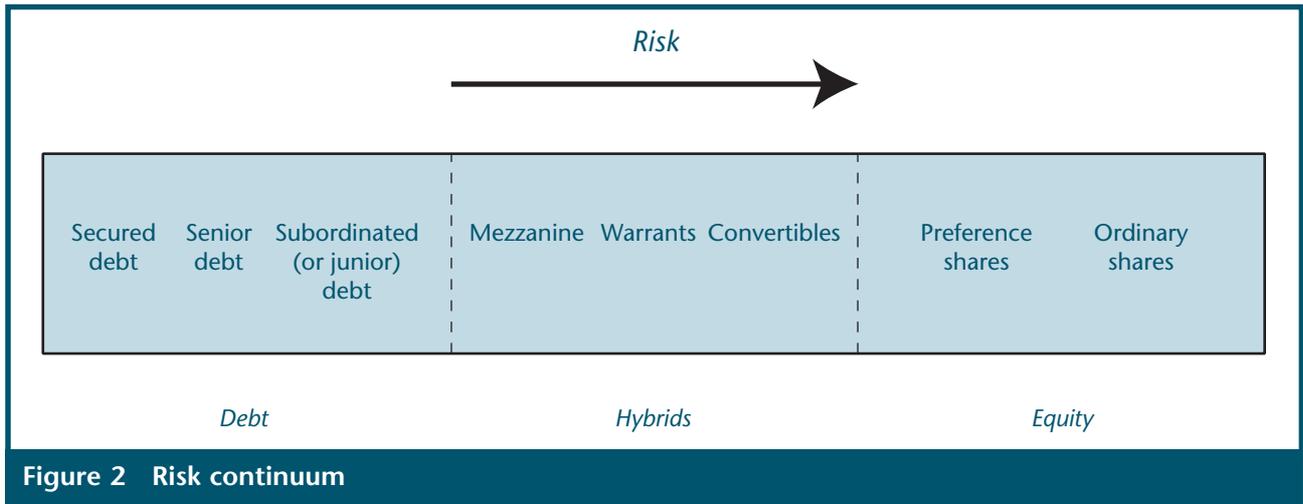


Figure 2 Risk continuum

as and when they are declared by the directors. Most shareholders also expect return through capital appreciation of the share price. Theoretically, ordinary shareholders' returns are unlimited.

Preference shares

Preference shares (preferred shares) are shares which carry defined rights to the profits and distributions of capital of a firm. These rights are usually limited to a specified dividend amount, which must be paid prior to the payment of dividends to ordinary shareholders. Common characteristics of preference shares include the following :

- *A fixed dividend* : This is usually set as a percentage of the nominal or par value of the share. (For example, a preference share with a par value of 100 pence might carry an 8% dividend, or 8 pence payable annually.)
- *Limited voting rights* : Preference shares typically carry no voting rights unless the payment of dividends is in arrears.
- *Priority over ordinary shareholders in a winding-up* : Preference shareholders receive the par value of their shares before ordinary shareholders in a winding-up. Both types of shareholder are subordinate to all debt holders.
- *Permanent capital* : Preference shares are generally a source of permanent capital.

Dividends on preference shares are often cumulative, that is, any arrears in the payment of preference share dividends must be caught up before non-cumulative or ordinary share dividends may be resumed. Non-cumulative shares are the opposite of cumulative shares. If a company misses a

dividend payment on a non-cumulative preference share, it is not required to make up the dividend.

A typical reason for issuing preference shares is that a company needs equity capital, but does not wish to dilute the voting rights of the ordinary shareholders. As many preference shares have the requirement to make a fixed return, as in the case of debt, they are either issued to maintain voting rights, or they carry the right to be converted into equity at a later stage. In many jurisdictions, preference shares are counted as capital for banks and other financial institutions. In these cases, shareholders prefer the financial institution to issue preference shares, as they still provide capital for regulatory purposes, but otherwise have many of the characteristics of debt. Preference shares are often known for accounting purposes as 'non-equity' shares.

Investors in preference shares are looking for the additional return (for the additional risk) when compared with debt, but are not looking for the extra upside of ordinary shares.

Hybrids

The term 'hybrid' is used to describe a financial instrument that combines features of both debt and equity. Companies issue hybrids for a range of reasons. For smaller businesses, they are frequently used as part of the mezzanine financing in leveraged buy-outs in situations where the conventional debt capacity has been exhausted, and the ordinary shareholders do not wish to dilute their interests. Larger companies may issue hybrids either as part of a complex tax-based financing, or to manage equity issuance in the future (by requiring conversion).

Convertibles

The most common hybrid in the UK is the convertible bond (sometimes referred to as a convertible debenture). Convertible preference shares are also issued. Convertible bonds are discussed in this section of the article, but most of the principles apply to convertible preference shares as well.

A convertible bond pays interest (preference shares issue dividends) like a straight bond, but in addition, it gives the investor the option to 'convert' the bond into shares of the company at some date in the future. The conversion price is set at the time of issue, and it is typically above the share price at the time of issue (this is the conversion premium, which is typically around 25%). The right to convert the bonds into shares cannot be separated from the bond itself.

In order to exercise the right to purchase the shares, the investor must surrender the convertible bond to the trustee, who will then deliver the specified number of shares to the investor.

The interest rate paid is lower than that on a straight bond issued by the company with the same maturity, because the option to convert has a value for which investors are willing to pay. The coupon rate on the bond and its conversion premium are linked: the higher the conversion premium is, the higher the coupon is.

Issuers are often attracted to convertible bonds because they view them as the issue of deferred equity or equity at a higher price than today. Convertibles typically have a longer maturity than straight bonds issued by the same company, although, if everything goes well and the shares increase in value, the bonds will be converted prior to maturity. There is no immediate dilution of ordinary shareholders when the convertible bond is issued, and its earnings per share are thereby maintained. Prior to conversion, the issuer is permitted to deduct the interest payments on the bond when calculating tax.

For large companies, convertibles may be offered because of the tax deductions available. Other companies may choose to issue convertibles at a stage when they wish to secure low current financing in order to develop the business, but reward the investor with upside potential if the business is successful.

Investors in convertibles are risk-seeking specialists. For quoted issues, there are sophisticated valuation models which allow

investors to price their returns. For unquoted issues, as in buy-outs, the investors are high-yield specialist funds.

Warrants

The other common type of hybrid is the bond with equity warrants. In this case, a fixed-rate bond is issued (again at a sub-market rate), and a set number of warrants accompany each bond. These warrants entitle the holder to purchase a pre-determined number of shares at a predetermined price for a fixed period.

The great difference from convertible bonds is that the warrants are separable from the bond, and they normally are separated. This approach allows different investors to trade in the bond (risk-averse, fixed-rate investors) and the warrants (risk-seeking investors). From the issuer's point of view, the risk is that the bonds have to be repaid but the warrants are not exercised.

Debt

Debt comes in various forms, and it is typically provided by either banks (through a private market) or institutions (through a bond or public market). Different types of debt may have different risk characteristics and therefore cost different amounts. The main differentiating characteristics between types of debt are the following:

- secured or unsecured;
- priority ranking in a liquidation;
- committed or uncommitted (that is, is the lender obliged to lend? – overdrafts are a typical type of uncommitted debt);
- fixed or floating interest rate;
- currency of borrowing.

The types of debt that are described below are normally used in specialist financing situations such as acquisitions, leveraged buy-outs and project financing.

Senior and subordinated debt

Senior debt is a term frequently used in acquisition financing. It is 'senior' as opposed to 'subordinated': subordinated debt ranks behind senior debt in a liquidation (and also behind other lenders). Convertible bonds are frequently subordinated to other lenders. The

characteristics of senior debt depend on the financial strength of the borrower, and they may not differ particularly from the terms for normal debt.

Mezzanine debt

In an acquisition (and frequently in the case of leveraged buy-outs), some lenders lend more than the cashflow of the underlying business would justify. Mezzanine debt fills the gap between the amount provided by conventional debt and equity. In this sense it is an alternative to diluting the equity base.

To enhance the return, lenders are frequently provided with warrants. This mezzanine debt is subordinated to the senior debt, and it also attracts a significantly higher interest rate than the conventional debt.

Interest on mezzanine debt may be 'rolled up' in the early years while the senior debt is being repaid and there is likely to be a prepayment penalty.

High yield bonds

High yield bonds are frequently referred to as junk bonds. A high yield bond, as one might expect, generally carries a high coupon offering the investor a high yield to maturity. It does so because high yield bonds are issued by companies with low credit ratings (BB+ or below as rated by Standard & Poor, or Ba1 by Moody).

The high yield market allows these companies (which are typically fast growing) to access the long-term capital market. In most cases, banks refuse to extend long-term fixed rate loans to non-investment-grade borrowers. When bank credit is available, it is typically offered only on a floating rate basis at punitive interest rates.

Specialist forms of financing

Securitisation

Companies are a mixture of assets financed by some combination of debt and equity. Companies should constantly attempt to minimise the cost of finance, and they will also need to raise further capital. If debt can be raised, then this will limit the amount of equity required, and it *should* increase the returns on the equity.

However, there are limits to the amount of traditional debt that banks (and other lenders) will lend.

Sometimes companies with specific assets will be able to finance those assets by issuing financial instruments that are then tradable. These assets may be

- physical (for example commodities);
- financial (for example credit card receivables);
- of another type, such as mortgage payments secured on loans made by a lender.

In effect, securitisation operates by repaying the debt (and interest) from the cashflows that arise from the assets that have been securitised. The advantage of this is that such assets may then be financed on attractive terms based on the risk of the underlying asset. For example, when the Tussaud's Group was bought out, part of the re-financing involved securitising the income streams from Madame Tussaud's and Alton Towers.

Investors in securitised issues are funds that will look for known cashflows with little risk, and will therefore be prepared to accept a lower return. In many cases, the extra risk is limited by the provision of backstop guarantees from the ultimate borrower.

Leasing

Leasing is a specialised form of asset finance. The lender (the lessor) owns the asset and retains the capital allowances. The user (the lessee) pays lease rentals to the lessor, which are then tax deductible. The attractiveness of leasing for many businesses is very often tax driven. Typical uses of leasing are when the following are the case :

- The lessee is a small business, and it does not wish to use its debt capacity to borrow for specific asset purchases (for example machinery).
- The lessee has no tax capacity, and it cannot make use of the capital allowances.
- The lessee does not wish to take the risk of technical obsolescence some time into using the asset (examples are computer equipment and motor vehicles).
- The asset being financed is very large relative to the size of the lessee's business, and there is a ready secondary market (examples are ships and aircraft).

Conclusions

The specific type of finance to be used varies according to

- the nature of the asset or business to be financed;
- the underlying business risk and how much financial risk can be accepted;
- the desired capital structure and amount of available equity.

This means that many businesses normally just use conventional equity and debt. However, in certain circumstances such as buy-outs, acquisitions and major asset purchases, other types of financing are used, particularly if there is an underlying change in the capital structure with consequent changes in the costs of equity and debt.

The stage in the lifecycle of the business also determines the type of financing used. In the early stages, a higher level of equity is required; at stages of fast development, the use of hybrids may be considered as an alternative to debt. However, mature businesses with predictable cashflows are able to raise more debt, and thus reduce their cost of capital.

The most interesting and complex structures arise during leveraged buy-outs. In these situations, there is almost certainly a mixture of ordinary shares, conventional debt, high yield debt, and warrants. In some cases (as with the Tussaud's Group), part of the financing may be refinanced using securitisation.

However, for any business, there will be a regular need to examine the mix and cost of financing. The objectives will be to maximise the return to shareholders while minimising the cost of external finance and yet ensuring the availability of capital to grow the business. The choice of alternatives is wide, and financial organisations are regularly developing new alternatives. In the end, though, it is all about what degree of risk will be accepted for what return.

Further reading

- **Corporate Financial Management**
Arnold, G (1998) Pitman
A UK-based standard finance textbook that sets out clearly some of the types of financial instrument and the reasons for their use.
- **The Financial Times Guide to Using the Financial Pages**
Vaitilingam, R (1996) Pitman
A bit light on explanations of the instruments, but a very useful guide to how securities (and everything else) are reported in the financial press.
- **Mastering Finance**
(1998) Pitman
A useful collection of Financial Times articles on finance topics written by leading academics.