<u>Article 3; using MWACC™ to measure and incentivise</u>

Corporate finance is most relevant to firms in two areas;

1. Project and investment appraisal; the familiar "static" discounted cash flow.
2. Balance sheet management; targeting a desired debt to equity ratio in order to minimise WACC under the trade-off theory.

But wouldn't it be great if a third item could be added to the list; that of management performance measurement and reward. We all know the old adage;

"you get what you measure and reward".

If we could directly measure value creation, then this is what we would get! However the value drivers in corporate finance are risk and future cash; both notoriously difficult to measure.

Well read on…the rest of this article explains how this can be easily achieved within the existing reporting framework of every firm.

<u>The current state of play</u>

Performance measurement and reward are currently centred around p&l reporting. While the sophistication in measurement may have moved on slightly over the course of many years, they remain firmly book based, reflecting historic cost and accruals based accounting and reporting. There are of course techniques out there such as Economic Value Add (EVA) that attempt to take reported book numbers and adjust these to derive a value created metric for a period. However, there are disadvantages; EVA for instance can involve a large number of adjustments, sometimes arbitrary in nature and risking miring management and finance teams in a sea of adjustments. Taken to the extreme more complex incentive arrangements, such as phantom share options schemes for example, can literally paralyse an organisation.

So, does the firm leave it to the equity markets to decide if value has been created or not? Clearly metrics such as improving profits, revenue and cash flows are all indicators value creation, but what are the risks being undertaken to achieve these, how much capital has been deployed to deliver these, and how does this performance compare to the market's assessment of the value the firm ***<u>should be</u>*** creating from its strategic position? To answer this in article one I introduced the concept of MWACC™

MWACC™ is the hurdle rate the firm must achieve on its investments in order to justify its current value. However, to take things to the next level, that of creating a process against which management can be measured and rewarded, a little manipulation of the reported data is required. The key principles to get to this stage are to;

1. accept the principal of working with incremental results,

2. understand the investment horizon of the business.

<u>Why working with incremental results is the key</u>

In order to take out a lot of the "noise" around reported numbers and to focus on the direct effect management decisions have had on the business only incremental results count. Current levels of profit and cash flow made from past investment decisions is a "sunk" item in corporate finance parlance. For many firms a substantial element of their value comes from the market's assessment of its future not its past. And of course if you want to measure and reward performance over a period measure what has changed over the period. Other advantages of thinking in terms of incremental changes are that the effects of inflation haven't taken hold and the distortions of accruals based accounting adjustments such as depreciation, amortisation and impairment are minimal.

The effect of working in incremental results is that you only are only focusing on what management is directly responsible for over the period being measured without distortion from inflationary effects and accounting practices. In addition, it is incredibly straightforward; few if any adjustments are required to the reported numbers.

<u>But what precisely should you be measuring?</u>

There is an inescapable fact that one of the fundamental assumptions we are taught about corporate finance, that of there being no restraints on capital, is actually not the case at all in the real world. Firms tend to generate their own capital or borrow capital. In this capital constrained world the hurdle rate for the internal investment decision is always different from the rate of return external investors required *as long as these investors perceive some kind of strategic value in the firm*. This is the MWACC™ hurdle rate, the return required when the firm invests capital internally or acquires new businesses. THE FIRM SHOULD MEASURE THE INCREMENTAL RETURN AGAINST MWACC™. Figure 1 illustrates the two ways in which the firm should be using MWACC; prospectively for its pay-out decision and retrospectively for measuring management performance.

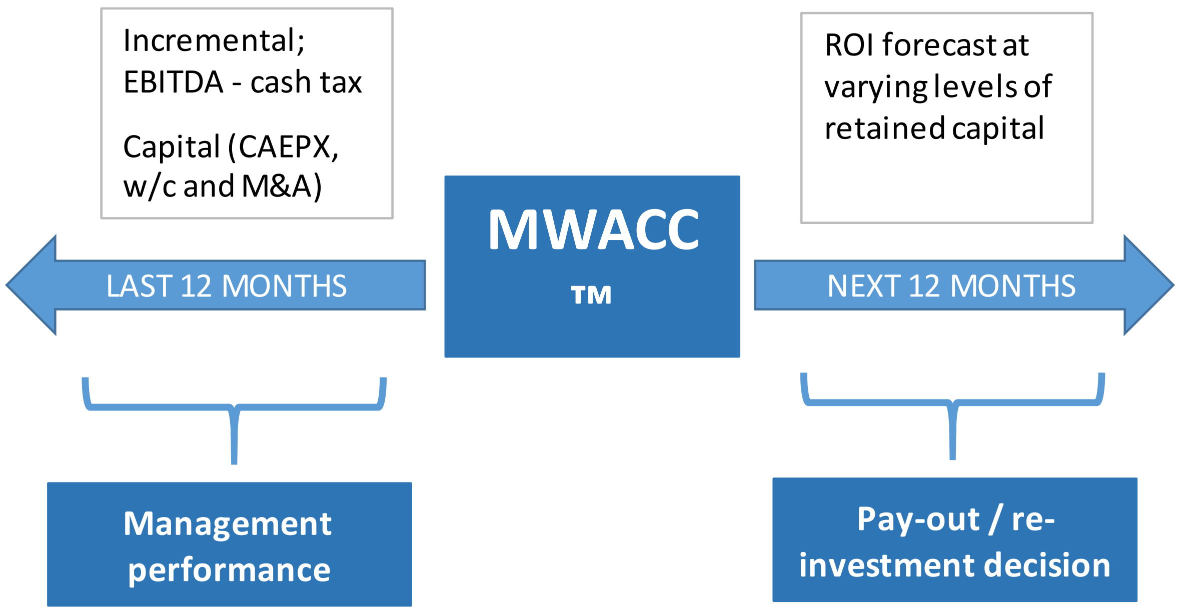

Figure 1; MWACC™ should be used to determine management performance (looking back) and the pay-out/re-investment decision (looking forwards).

Linking book numbers to value

A very common and widely understood book based performance target such as ROCE can be easily derived from a value based measure such as internal rate of return (IRR). An IRR equal to the true hurdle rate, MWACC™, can be converted using simple maths into a target incremental ROCE result. Figure 2 below shows how to perform this magic trick. The first step is to back-solve the amount of cash profit after tax (effectively EBITDA less cash tax) that generates the IRR equal to MWACC™. This cash profit number can be worked through to provide a reported ROCE target. Hey presto, you now have a book based target, universally understood and reported upon, that is truly aligned to increasing the value of the firm.

FROM VALUE BASED RETURN (IRR)

MWACC	12.5%
Capital invested	(100)
First year return	21.15
Inflation	2.0%

Solve for cash profit after tax which gives an IRR equal to MWACC hurdle rate
Calculate depreciation charge on notional 100 capital investment
Calculate tax on profits (assuming depreciation proxy for capital allowance)
Calcualte PBIT and therefore NOPAT (net operating profit after tax)
Calcualte ROCE (return on capital employed) from NOPAT and average capital

TO BOOK RETURN ON CAPITAL EMPLOYED

IRR	12.5%
Marginal tax rate	25.0%

Year	*Cash profit after tax*	*Depn*	*Tax*	*PBIT*	*NOPAT*	*Period end capital*	*average capital*	*ROCE*
0	(100.0)							
1	21.2	(14.3)	(2.3)	9.2	6.9	85.7	92.9	**7.4%**
2	21.6	(14.3)	(2.4)	9.7	7.3	71.4	78.6	9.3%
3	22.0	(14.3)	(2.6)	10.3	7.7	57.1	64.3	12.0%
4	22.4	(14.3)	(2.7)	10.9	8.2	42.9	50.0	16.3%
5	22.9	(14.3)	(2.9)	11.5	8.6	28.6	35.7	24.1%
6	23.4	(14.3)	(3.0)	12.1	9.1	14.3	21.4	42.3%
7	23.8	(14.3)	(3.2)	12.7	9.5	0.0	7.1	133.5%

From value based target (IRR) to book based target; incremental (first year) ROCE

Fig 2 shows that the incremental ROCE of this firm, i.e. the change in NOPAT over the capital invested in the year, should be at least 7.4% for management to have created sufficient value in the period from the investment decisions it has made.

Target setting

The beauty of being able translate value creation into a book based KPI is that you have on offer a range of KPIs and can select those most appropriate to your business. For instance, you could use the following targets; revenue, PBIT, margin, cash conversion or capital allocation. I am sure readers can think of many others, but the point is you have a starting point based on value creation and the KPIs flow from this. P&L based KPI's set from a foundation of value creation have true purpose.

Yes, it is true that these KPIs will change as MWACC™ changes (it is partially a market based measure). Investors will be sending the firm's management messages about the amount of capital it should retain and invest, and the returns it should be making on this investment. Using MWACC™ allows management to read these messages and set internal performance targets as appropriate to meet the required response.

Three further points to make are;

1. By looking at total capital used management must focus on all aspects, including working capital and under-performing assets.

2. The IRR profile can accommodate different timings of expected cash flows.

3. The progression of the KPIs used over several years will show a picture of true management performance over time.

Conclusions

In the first article of this series I introduced MWACC™ and described how this is the link between a firm's strategic position and its valuation. MWACC™ is the cost of capital internally within the firm; the hurdle rate it must charge its businesses in order to justify the firm's valuation. In the second article we looked at the pay-out decision and how it may be far more important for firm valuation than is commonly thought. In fact, more important than the trade-off theory as it concentrates management completely on value creation, investment opportunities and strategy rather than a "quick fix" from gearing. In this article we have developed a framework for embedding value creation into readily available and widely understood KPIs and this has applications for measuring and incentivising management performance.