

Is Goodwill a Wasting Asset?

The IVSC issues Perspectives Papers from time to time, which focus on pertinent valuation topics and emerging issues. Perspectives Papers serve a number of purposes; they initiate and foster debate on valuation topics as they relate to the International Valuation Standards (IVS); they provide contextual information on a topic from the perspective of the standard setter; and they support the valuation community in their application of IVS through guidance and case studies.

Perspectives Papers are complementary to the IVS and do not replace or supersede the standards. Valuers have a responsibility to read and follow the standards when carrying out valuations.

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Amortisation of Goodwill Revisited

The IVSC has received a number of questions recently from constituents asking whether principles underlying business valuations are compatible with the concept of goodwill amortisation. The IVSC Boards have discussed the topic and concluded that the best way to aid the public discussion is by publishing a three-part article series to explore certain fundamental questions in this area, aiming to inform financial statement preparers, reviewers, and users, and aid the capital market.

Questions the IVSC plan to explore in the three-part article series include:

- Is goodwill a wasting asset with a readily determinable life, or an indefinite lived asset?
- What is the information value of the current goodwill impairment process to financial statement users and does that information value justify the compliance costs borne by preparers?
- Can the current impairment test (as well as acquisition accounting) be improved to increase the information

value for users with little or no incremental cost?

- What are the potential consequences of a change from the current impairment model to goodwill amortisation?

In this, the first of three articles, the IVSC explore whether goodwill is economically a wasting asset, and if so, if the life and implicit decline in value can be reasonably estimated and supported.

Goodwill – A Wasting Asset?

In almost all instances, a business is acquired under a going concern premise. Consistent with this premise, the financial models used to price deals, prepare fairness opinions, obtain board of directors' approval and ultimately determine the prices paid in transactions, almost always reflect a perpetual growth assumption of cash flows. Business combination accounting is the process of allocating the consideration paid for the business to the identifiable assets and liabilities acquired. As most assets are valued using a cash flow model, acquisition accounting relies heavily on

the cash flow model used to price the deal.

Identifiable assets include both tangible assets (e.g., real estate, machinery and equipment, inventory, etc.) and intangible assets (customer contracts/relationships, technology and IP, marketing intangibles, etc.). In a business combination, goodwill represents the residual value of the price paid above the identified tangible and intangible assets of the acquired business. Although goodwill is only recognised as part of a business combination, economic goodwill exists in almost all going concern businesses.¹

The identified tangible and intangible assets, with the exception of certain indefinite lived intangibles, represent the identifiable finite lived assets of the business. The residual amount paid for the business (e.g., the goodwill) must therefore at least represent the going concern (i.e. perpetual growth) portion of the acquired business. If one were to assume goodwill is a finite lived and wasting asset, it would be inconsistent with the premise of going concern inherent in the consideration paid to acquire nearly all businesses.

¹ With the possible exception of businesses that are primarily comprised of tangible assets.

Despite this perspective, the viewpoint exists that goodwill is a wasting asset, and therefore consistent with the matching principle of accounting, should be amortised over its useful life. For example, there is a perspective that goodwill largely represents the synergistic value of an acquisition and that such synergies are realised, or discovered to be impossible to realise, over a discrete and finite period. Under such perspective, the relevant period over which the synergies are realised could be estimated and goodwill amortised to match. Others contend that while goodwill may be an indefinite-lived asset, it requires ongoing investment to maintain its value and indefinite life. But for such investment, goodwill would diminish over time, and amortisation rather than impairment testing appropriately captures such diminution of value.

This article seeks to reconcile these opposing viewpoints through 1) a functional assessment of the nature of goodwill, and 2) an analysis of the assumptions underlying deal models and the implicit assumptions regarding goodwill.

What's in Goodwill?

While goodwill is only recognised as part of a business combination, economic goodwill exists in almost all going concern businesses. As discussed in more detail below, such components may include, among other things, 1) a company's reputation, 2) the infrastructure to create new intangible value such as future technology, and 3) a trained workforce that embodies critical knowledge. In addition to those goodwill components that reside in all going concern businesses, business combinations often create additional value and related goodwill above that which exists prior to the acquisition. Such goodwill components resulting from the acquisition may include, among other things 1) revenue and cost synergies, and 2) either decreased risk and/or increased cash flows arising from combining the asset base of two companies (i.e. assemblage value).

Although the components of goodwill do not meet the criteria as defined by accounting standard setters for separate recognition as part of acquisition accounting, an analysis of such components is instructive in developing

perspective on whether goodwill is in aggregate a wasting asset.

The following broad components of goodwill are often referenced as generating cash flows beyond the life of the identified tangible and intangible assets.

Going Concern Goodwill:

Reputation (aka, Customer Loyalty) – Although marketing intangibles such as trade names are regularly recognised as a part of acquisition accounting, the general viewpoint is that much of the reputational aspects of a business are not often captured within trade name valuations and thus subsumed into goodwill.² A company's reputation is most often assumed to have an indefinite life as it is expected to generate excess returns into the future consistent with the going concern premise of the business as a whole. However, there are instances in which buyers assign little value to the target's reputation being able to generate excess returns long into the future. While in such cases the reputational component of goodwill may be assumed to be wasting, the initial value assigned to it

would be diminutive in value. As such, the large majority of reputation goodwill could be described as indefinite.

Future Intangible Value – "Future technology" is often cited by preparers and reviewers of financial statements as a component of goodwill. A going concern premise assumes the continuous ability to create ongoing intangible value. Future technology manifests from the in-place assets such as workforce, knowhow, and foundational platform technology that are all leveraged for future ideation and technologies. This ability to continuously create new intangible value is not wasting in nature, but rather a core component that can be leveraged by a company to generate excess margins beyond the life of the identifiable technology assets.

Workforce – The acquisition of an assembled workforce has become increasingly important with the shift toward intangible driven business models. However, accounting standards dictate that the value of an in-place workforce must be subsumed into goodwill. While not separately identified on the balance sheet, assembled workforce is often

² The Business Valuation Board has recently begun a project to analyse methodologies used to value marketing intangibles. Initial observations by the Board are that marketing intangibles are often undervalued through a reluctance to utilise the multi-period excess earnings methodology. The Board's goal is to perform additional research in this area and determine if additional standards are necessary.

valued as part of acquisition accounting as an input for the valuation of intangible assets (e.g., contributory asset change under the excess earnings method) and diagnostic tests (e.g. weighted average return on assets "WARA"). Common practice for valuing assembled workforce for these purposes is a replacement cost method. There is evidence to suggest that this methodology often under values the true nature of an assembled workforce as it fails to account for the knowledge and reputational assets that reside with the workforce. For the portion of the value attributed to avoided costs to recreate, this limited portion of the overall workforce value is reasonably assumed to have a finite life. Ample data and historical evidence are observable to determine the useful life for amortisation purposes. However, there is a certain knowledge base of an organisation passed on through the workforce and over time that is indefinite in nature.³ As such, a large portion of goodwill that can be attributed to workforce would be best classified as indefinite.

Goodwill Created by the Acquisition:

Synergies – Synergies of combining two standalone businesses can manifest in numerous ways; however, the two most common are 1) the ability of an enterprise to realise economies of scale in its cost structure and as a result recognise higher operating margins, and 2) through the ability to generate incremental revenues of either the target's products or those of the buyer's business. Synergies are typically assumed to phase-in over a certain period of the discrete forecast, after which the synergies are capitalised in the perpetuity calculation through either a higher margin (costs synergies) and/or absolute higher revenue and income (revenue synergies). Therefore, synergies are implicitly assumed to exist indefinitely. This component of goodwill would meet the definition of indefinite, rather than wasting in nature.

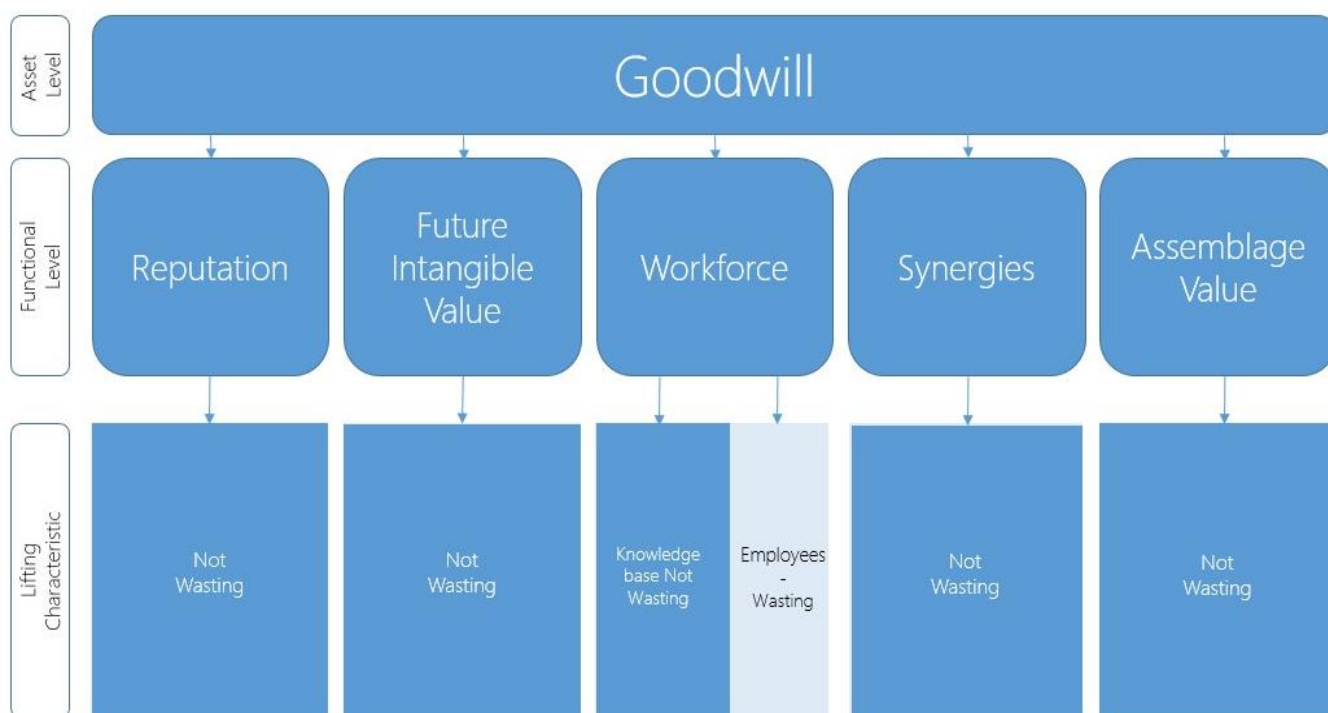
Assemblage Value – Assemblage value is the concept that a collection of assets is worth more than the sum of the individual asset values. The concept also applies in

³ The Business Valuation Board is planning to conduct research on assembled workforce valuation practices to help reconcile differences between the cost to recreate method and market indication of value from asset acquisitions that include the knowledge based assets of the employee base.

the context of business combinations, as the target company (i.e., a collection of assets) may be worth more as part of a larger enterprise. The assemblage value may represent either a risk reduction of being part of a larger enterprise or incremental cash flow generation resulting from the combination of businesses. Similar to synergies, such benefits are typically capitalised in the perpetuity calculation (either lower discount rate or higher margins) and thus implicitly assumed to exist indefinitely. As such, all goodwill that can be attributed to

assemblage value would be best classified as indefinite.

Summary – The below chart outlines the observations on the components of goodwill. While reputation and workforce may in some instances contain a small finite lived component, evidence suggests that the large majority of each of these goodwill components are indefinite in nature. In aggregate, based on a functional analysis of goodwill, the reasonable conclusion is that substantially all of goodwill is indefinite in nature.



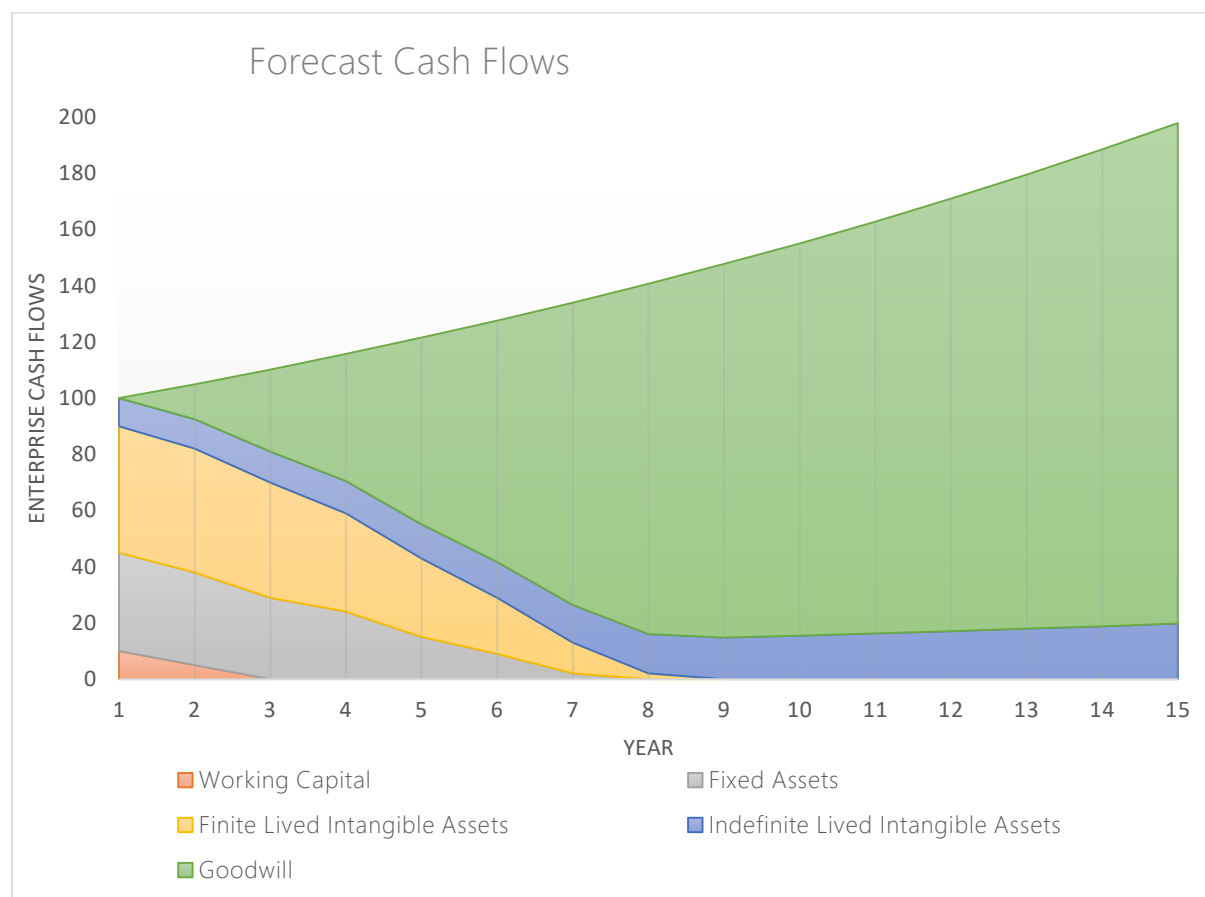
The Modeling Perspective

As already discussed, business combination accounting is the process through which to identify and record the identifiable assets and liabilities of the business. Goodwill represents price paid less the identified tangible and intangible assets of the acquired business.

The identified tangible and intangible assets, with the exception of certain indefinite lived marketing intangibles, represent the identifiable finite lived assets of the business. Therefore, the residual amount paid for the business (e.g., the goodwill) must therefore represent the going concern portion of the acquired business. The graph below presents this concept by apportioning the cash flows of the acquired company to the acquired assets starting at the acquisition date and continuing into perpetuity. In the periods

just subsequent to the acquisition, the cash flows can be apportioned to all of the acquired assets, but are disproportionately weighted towards those assets with the shortest life and those that are expected to generate near-term cash flows. Over time, cash flow apportionment shifts toward the longer lived intangible and tangible assets. Finally, after the long-lived assets are fully depreciated and amortised, cash flows are apportioned to indefinite lived brands and goodwill.

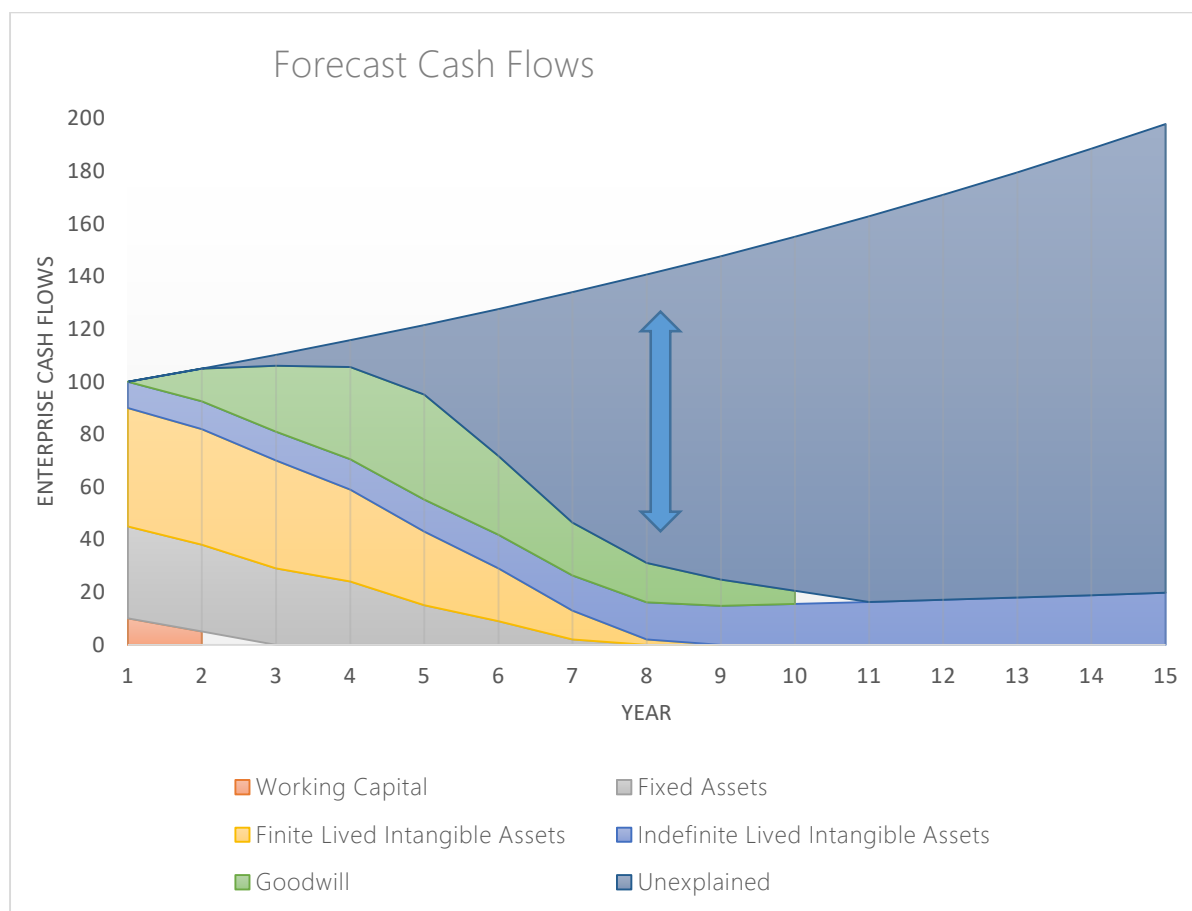
The first graph presents this concept assuming goodwill is not a wasting asset. The cash flows attributable to each asset are shown cumulatively above the asset displayed below it. The graph demonstrates that the long term and perpetual cash flows are largely driven by assets that don't exist at the time of the acquisition (i.e. goodwill).



Graph 1

The next graph presents this concept assuming goodwill is a wasting asset. However, because goodwill is assumed to be a wasting asset, there is a large portion of the cash flows that are as a

consequence unexplained and not attributable to any assets. The following section explores this disconnect by analysing how deals are priced and specific assumptions within deal models.



Graph 2

Analysis of Deal Model Mechanics

An analysis of how deals are priced and specific assumptions within deal models further supports the proposition that goodwill is not a wasting asset.

Two common beliefs exist for why goodwill is assumed to be a wasting asset

- 1) Synergies are realised only over a discrete period, and
- 2) Goodwill requires ongoing maintenance costs.

Synergies

The financial models used to price deals, prepare fairness opinions, obtain board of directors' approval and ultimately the prices paid in transactions, almost always reflect a perpetual growth assumption of cash flows in which the accretive margin expansion resulting from the acquisition and incremental revenues (i.e., synergies) are included in the terminal value calculation. Therefore, the goodwill associated with synergies is also assumed

to exist into perpetuity and thus would suggest that such goodwill is better characterised as an indefinite lived asset rather than a wasting asset.⁴ Adjusting deal models to assume the accretive margin expansion is only in a discrete period would, assuming no adjustment to the purchase price, lower the internal rate of return (IRR) implied from the transaction. The exclusion of the synergistic margin expansion from the terminal value calculations has the potential to have a large negative impact

on the IRR. In many situations, the downward adjustment to the IRR drives the result below a reasonable range that would be supported by a corroborative weighted average cost of capital calculation (WACC). In other words, the rate of return expected to be achieved by most transactions would be lower than the required rate of return for the enterprise. See the base case table below, as well as a revised scenario to exclude synergies in the terminal value.

Table 1. Example – Base Case:⁵

<i>Base Assumption</i>		2019	2020	2021	2022	2023	Terminal
7%	Revenue	100.0	107.0	113.4	119.1	123.9	
50%	Cost of Goods Sold	49.9	53.4	56.6	59.5	61.8	
	Gross Profit	50.1	53.6	56.8	59.6	62.0	
20%	SG&A ⁶	20.0	19.8	19.3	18.5	17.3	
	EBITDA	30.1	33.8	37.5	41.2	44.7	
11%	Depreciation and Amortisation	11.0	11.8	12.5	13.1	13.6	
	EBIT	19.1	22.0	25.0	28.1	31.0	32.0 ⁷
24%	Taxes	4.6	5.3	6.0	6.7	7.5	7.7
	After Tax Income/Cash Flow	14.5	16.7	19.0	21.3	23.6	24.3
	Terminal						347.2
10.0%	Discounted Cash Flows	13.8	14.5	15.0	15.3	15.4	226.1
Fair Value		300.0					

⁴ Synergistic value is also captured in the valuation of certain identified tangible and intangible assets.

⁵ All amounts and assumptions are for demonstration purposes only and do not reflect actual deal model data. Cash flow adjustments for

working capital and capital expenditures have been excluded for simplicity.

⁶ SG&A costs decline as a percent of revenue over the discrete period to reflect the phase-in of cost synergies.

⁷ Terminal EBIT grown at 3% LTGR.

Table 2. Example – No Cost Synergies in Terminal:

<i>Base Assumption</i>		2019	2020	2021	2022	2023	Terminal
7%	Revenue	100.0	107.0	113.4	119.1	123.9	127.6
50%	Cost of Goods Sold	49.9	53.4	56.6	59.5	61.8	63.7
	Gross Profit	50.1	53.6	56.8	59.6	62.0	63.9
20%	SG&A	20.0	19.8	19.3	18.5	17.3	25.5
	EBITDA	30.1	33.8	37.5	41.2	44.7	38.4
11%	Depreciation and Amortisation	11.0	11.8	12.5	13.1	13.6	14.0
	EBIT	19.1	22.0	25.0	28.1	31.0	24.3
24%	Taxes	4.6	5.3	6.0	6.7	7.5	5.8
	After Tax Income/Cash Flow	14.5	16.7	19.0	21.3	23.6	18.5
	Terminal						325.4
8.7%	Discounted Cash Flows	13.9	14.8	15.4	15.9	16.2	223.7
Fair Value		300.0					

The adjusted scenario lowers the deal IRR from 10.0% to 8.7%. Alternatively, holding the discount rate constant at 10% would reduce the value of the business from 300 million to 246 million, implying that the buyer overpaid for the business by 22% in this scenario. Therefore, if one were to assume the synergistic portion of goodwill was a wasting asset realised only over the discrete period, it would imply that either 1) market participants systematically overpay for businesses, or 2) that the capital asset pricing model (CAPM) systematically overestimates the cost of equity and resulting WACC. While the example sensitivity looks at only cost synergies, exclusion of revenue synergies from the terminal period would only exacerbate the disconnect.

Maintenance Costs

The second argument for why Goodwill is a wasting asset says that goodwill is only an indefinite lived asset when the appropriate investments are made to maintain and/or grow the value of the asset over time. But for such expenditures, it's reasonable to expect that certain portions of goodwill will decline in value over a period of time and not exist into perpetuity. In fact, disclosures from goodwill impairments often cite a lack of investment as the rationale for the degradation in value of the goodwill asset.

However, the costs to maintain goodwill are included in the financial models used to price deals.⁸ Therefore, for those components of goodwill that require ongoing maintenance, the costs are reflected in the model used to price the transaction and ultimately calculate the residual amount of goodwill implicit in the transaction. In other words, the calculated goodwill amount is already net of such costs.

If one were to assume the maintenance costs of goodwill are not already included in the deal model, and thus goodwill would be a wasting asset but for those costs, inclusion of the amortisation of goodwill in the deal model forecast would have a negative impact on the IRR.⁹ Again, this would result in an IRR below a reasonable range that would be supported by a corroborative WACC calculation.

Table 3. Example – Inclusion of Amortisation Costs:

Base Assumption		2019	2020	2021	2022	2023	Terminal
7%	Revenue	100.0	107.0	113.4	119.1	123.9	
50%	Cost of Goods Sold	49.9	53.4	56.6	59.5	61.8	
	Gross Profit	50.1	53.6	56.8	59.6	62.0	
20%	SG&A	20.0	19.8	19.3	18.5	17.3	
	EBITDA	30.1	33.8	37.5	41.2	44.7	
11%	Depreciation and Amortisation ¹⁰	29.0	29.8	30.5	31.1	31.6	
	EBIT	1.1	4.0	7.0	10.1	13.0	32.0
24%	Taxes	0.3	1.0	1.7	2.4	3.1	7.7
	After Tax Income/Cash Flow	0.8	3.0	5.3	7.7	9.9	24.3
	Terminal						410.9
8.9%	Discounted Cash Flows	0.8	2.7	4.3	5.7	6.8	279.8
	Fair Value	300.0					

⁸ For example, the costs to maintain a target's reputation are included as marketing and advertising expenses. Workforce related goodwill is maintained by various costs associated with employee retention, training, and acquisition. And the ability to generate new technology is supported by basic R&D.

⁹ While amortisation is a non-cash expense which would not impact the cash flows of the business, it

has been included only to show the disconnect that would result between deal economics and resulting financial reporting assuming goodwill was amortised.

¹⁰ Amortisation is assumed to be equal to 30% of the purchase price and amortise over the first 5 years.

The adjusted scenario lowers the deal IRR from 10.0% to 8.9%. Alternatively, holding the discount rate constant at 10% would reduce the value of the business from 300 million to 246 million, implying that the buyer overpaid for the business by 22% in this scenario. Therefore, similar to the observations regarding synergies above,

the assumption that goodwill requires maintenance costs not already included in the deal model forecast, would imply that market participants are systematically overpaying for businesses, or that the CAPM is systematically overestimating the cost of equity.

Table 4. Example – Exclusion of Cost Synergies in Terminal and Inclusion of Maintenance Costs:

<i>Base Assumption</i>		2019	2020	2021	2022	2023	Terminal
<i>7%</i>	Revenue	100.0	107.0	113.4	119.1	123.9	127.6
<i>50%</i>	Cost of Goods Sold	49.9	53.4	56.6	59.5	61.8	63.7
	Gross Profit	50.1	53.6	56.8	59.6	62.0	63.9
<i>25%</i>	SG&A	25.0	25.1	25.0	24.4	23.5	31.9
	EBITDA	25.1	28.4	31.8	35.2	38.5	32.0
<i>11%</i>	Depreciation and Amortisation	11.0	11.8	12.5	13.1	13.6	14.0
	EBIT	14.1	16.7	19.4	22.1	24.9	17.9
<i>24%</i>	Taxes	3.4	4.0	4.6	5.3	6.0	4.3
	After Tax Income/Cash Flow	10.7	12.7	14.7	16.8	18.9	13.6
	Terminal						326.3
<i>7.2%</i>	Discounted Cash Flows	10.3	11.4	12.4	13.2	13.8	238.9
	Fair Value	300.0					

The scenario in which both the amortisation costs are included and cost synergies are removed from the terminal value, lowers the deal IRR from 10.0% to 7.7%. Alternatively, holding the discount rate constant at 10% would reduce the value of the business from 300 million to 192 million, implying that the buyer overpaid for the business by 56% in this scenario.

Useful Life for Amortisation

Based on the above considerations, evidence supports the idea that goodwill is not a wasting asset. Notwithstanding the conclusions above, if one were to assume goodwill was a wasting asset, then the question becomes over what finite period one should amortise the asset. Below we consider three views as to

the period over which goodwill could, if assumed to be finite, be amortised over. As noted above, a certain viewpoint exists that goodwill associated with synergies is realised over the discrete forecast period and thus could be amortised over that life. This perspective is not consistent with the financial models used to price deals and ultimately the prices paid in transactions.

Another suggestion made by proponents of amortisation is to use the life of the longest definite lived asset. There appears to be no analytical support for this methodology. Moreover, as customer relationships often represent the longest lived intangible asset, goodwill life would often be set to this life. However, as noted above, none of the components of goodwill that give rise to the excess earnings (future intangible value, synergies, reputation, assemblage, and workforce) are closely related to customer relationships. Alternatively, customer relationships are a derivative of the components of goodwill.

The final option considered is the rule of thumb in which intangible asset useful lives are calculated when substantially all of the discounted cash flows are realised (typically assumed to be between 90% and 95%). Given the common acceptance

of this methodology in practice, there is some precedent to apply the methodology for goodwill if one were to assume it was a wasting asset. As noted by the tables above, isolating cash flows attributable to goodwill could be done within current business combination models. However, this methodology fails to recognise that the pattern of economic benefit of goodwill is back loaded as shown in the graphs above. As such, any approach that assumes a linear pattern of decay is not consistent with deal economics.

In addition to identifying an analytical approach, some proponents of goodwill amortisation suggest an arbitrary life to be used for all acquisitions. Such a methodology is not consistent with the economics of goodwill outlined throughout this article and does not account for differences between companies and industries.

Conclusions:

Is goodwill a wasting asset with a readily determinable life, or an indefinite lived asset that is best tested through regular impairment assessments? The evidence set out here indicates that goodwill is not a wasting asset. This conclusion is

supported by both a functional analysis of the components of goodwill and consideration of how businesses are valued and priced for transactions. Finally, it should be noted that this conclusion is supported by empirical evidence. Almost all impairments represent large irregular charges resulting from a discrete event or short series of discrete events, rather than smaller regular impairment charges that consistently occur over time. Additionally, if goodwill largely diminishes over time, then you might expect a preponderance of goodwill impairments for all companies across all industries? In reality, of the total goodwill recognised in business combinations, only a small percentage has been impaired.¹¹

With this question considered, the next article in the series will seek to explore the information value of the current goodwill impairment test.

The IVSC would be interested to hear your feedback on the subject discussed in this paper. Specifically, in relation to the following questions:

1. Do you believe that goodwill is a wasting asset that should be amortised for financial reporting purposes? If yes, why do you think this is?
2. Can you identify any additional components of goodwill not mentioned in this article?
3. Can you identify any other proposed methodologies for determining the life of goodwill not cited in this article?

The IVSC will continue to consider the topics in this article, and feedback outside our formal consultations is always welcome. You can share your thoughts with the Board, or contribute to the discussion through the [IVSC LinkedIn group page](#).

You can contact the authors through the IVSC Business Valuation Board:
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¹¹ This topic will be addressed in detail in Article 2.