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EQUITY RESEARCH IN THE FUNERAL INDUSTRY: INVOCARE VALUATION

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Abstract

This work project “Equity Research in the Funeral Industry – InvoCare Valuation” analyses InvoCare financials to determine a fair value for its stock among the funeral industry. Due to a strong M&A activity over the past years and with the recent investment made through their NBO program, InvoCare was able to become a market leader in the afterlife services in Australia. Over 2020 the firm acquired two competitors in the pet cremations segment, becoming market leader in this segment too. Given the current pandemic crisis, InvoCare’s profit will be impacted in 2020 and 2021, and we estimate that recover to start in 2022, returning to pre-crisis values. Nevertheless, we predict a continuous market growth as the number of deaths is expected to increase in the foreseeable future. This will result in a terminal growth of 0.6%. Our valuation for InvoCare yields a price target of A\$13.44 for FY21, which results in a 19.97% total shareholder return and hence, a BUY recommendation.

Keywords

Equity Research, Funeral Industry, InvoCare, Valuation

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This report is part of the ... report (annexed) and should be read as an integral part of it.

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Intrinsic Valuation

To value InvoCare, we have applied the DCF model, more specifically the Free Cash Flow to the Firm method. As the company plays in one specific sector, and has three different business, across three different geographies, we divided each business unit (funeral services, memorial parks, and pet cremation) for each geography, to better capture its value drivers. For the non-core operations of the firm, we assumed the values of previous periods to remain in the future.

Revenue Forecast

- Funeral Services

The funeral services industry is directly connected with the number of deaths, and as we knew InvoCare's overall case volume and each geography historical revenue contribution by multiplying both inputs we were able to estimate the addressable Australian, New Zealand, and Singaporean case volume until 2019. After computing each country's case volume, we were able to determine their market share for each location.

As a result, the main revenue drivers are the number of deaths and the change in market share. Moreover, prices will be affected by inflation, COVID-19, and the before mention industry drivers. To incorporate the impact of COVID-19 on prices, Australia's GDP growth contraction will be used as the benchmark to reduce its revenue in 2020 and 2021 by multiplying it with a scenario without COVID-19. Therefore, a 7% decrease in 2020 is expected due to the pandemic, and a 3,5% decrease in 2021, in line with our expectations that the market will fully recover only after 2021.

For Australia and as we said previously, to incorporate the death CAGR in the terminal value of the company, we estimate yearly deaths between 2020 and 2025 to grow at a rate of 2,3% YoY, decreasing steadily afterward until reaching its steady state of 1% in 2030. Due to the implementation of the NBO program and the expansion to regional areas via an acquisition process, we assumed the market share would grow in line with the average growth of previous periods, plus additional market share gains in 2020, 2023, and 2026 to reflect the expansion of their network. To estimate inflation, we based our analysis on the IMF's projections. As the available data only goes until 2025, we assumed an inflation rate of 2,5% for the future, using the 2025 inflation rate of 2,4%, and the Reserve Bank of Australia target of 2-3% inflation rate.

Considering New Zealand, we estimate the population to be 5.37 Million in 2023 and 5.7 Million in 2028, as the only available projection made by the New Zealand Government was based in 2016 and we adapted to the 95th percentile as it was the most accurate considering the most recent values that we could compare. With this in mind, we projected the population growth to be constant between periods. To estimate the number of deaths we multiplied the population by the mortality rate projected by the U.N. For New Zealand's revenue projections, a similar rationale to the one deployed in Australia was used regarding market share gain. However, the additional gain is projected to be lower than that of Australia, as the bulk of the investment was made in Australia. Nevertheless, we soften the amount of market share growth coming from previous periods, as it was very unlikely that InvoCare could maintain that high growth over the coming years. The projected inflation rate by IMF is expected to reach 2% in 2024 remaining constant until 2030, as it is in line with the country's historic inflation rate and New Zealand's' Central Bank monetary policy. The impact of COVID-19 on revenue is projected to be higher as the country

adopted stricter measures to fight the pandemic, which could contract the market to a further extent. As a result, revenue is expected to be 8% lower in 2020 and 4% lower in 2021 when compared to a no COVID scenario.

When analyzing Singapore, we used the resident population and the mortality rate to forecast the country's revenue, since it was the most accurate data available. As the available population projections were only for 2025 and 2030, we used the implicit CAGR on these values to estimate the population. For the number of deaths, we used the U.N. projections on the mortality rate for the country. As in the previous geographies, due to the NBO program, in 2020, we used the increase in market share of 2018, as we considered the 2019 market share growth an outlier, plus an additional increase in the market share growth in 2020, 2023, and 2026 using the same reason as before, but with the additional increase being the lowest from the three locations, as only marginal investments have been made in this geography. The inflation projected by the IMF reaches 1,5% in 2025 and considering past values and the target of the Monetary Authority of Singapore on an inflation rate just under 2%, we assumed it to remain 1,5% for the future. We assumed a 7% decrease in 2020 due to the COVID-19 crisis impact in Singapore and a 3,5% decrease in 2021 compared to what would be a normal scenario.

- **Memorial Parks**

The memorial parks segment is only available in Australia and New Zealand and has two different sub-segments: burials and cremations. The reason for the division is because we believe there is going to be a shift from burials to cremations and the price of both services is very different, as explained before. Regarding the case volume, we used the same rationale as in the funeral services segment, thus we assumed it to be split between Australia and New Zealand according to the revenues per geography in that specific business segment. As so, in Australia, we used as main drivers, the increase in the price of burials, the shift from burials to cremations, and inflation.

According to a 2005 study made by the Legislative Council of the New South Wales Parliament, burial prices grew from A\$3.465 in 2005 to A\$5.439 in 2015. Considering our assumptions, we estimate burial prices to be, in 2030, A\$ 10.101.

For cremation prices we used the same rationale, from a price of A\$776 in 2005 (as per the NSW Parliament study) to A\$1.001 in 2015, a growth explained mainly by inflation. For the forecasted period, cremation prices are projected to increase in line with inflation if no disruptive event occurs resulting in an abnormal price increase.

In New Zealand, a different approach was used. As this geography contribution for this segment is marginal and has been historically stable, less than 3% of the firm's revenues, we projected it to maintain a similar trend, contributing 2,1% of the segment revenues in the foreseen future. Regarding the shift from burials to cremations, burial prices evolution, and inflation rate, a similar approach to the one deployed in Australia was performed. However, we then represented the total revenue based on the revenue per location. As we knew the average revenue per location, we applied it to the upcoming periods and then computed the number of locations (rounded) based on the estimated total revenue, being the revenue per location our driver in the end.

- **Pet Cremations**

The pet cremation is a segment the firm entered in 2018 in Australia only, with acquisitions and greenfields in New South Wales. In 2020, it acquired two new businesses and extended its presence beyond this state, becoming the market leader in pet afterlife services in Australia. As

value drivers of this segment, we considered the growth in market share and the number of pets cremated in the operating states. Until 2021, we based our analysis exclusively in New South Wales, adding the remaining four afterward. We started by forecasting each state population. For the NSW population, we had state government estimates, while in Victoria we did an average of their proportion in the Australian population as it seemed constant. For Western Australia, South Australia, and Queensland 2019 values were used as a benchmark given the yearly relative decrease of the state population. Then we found the number of pets in the operating regions by multiplying the addressable population by the proportion of pet ownership, a value that resulted from a weighted average between the five regions to consider the relevance of each one. As InvoCare's business model focus on dogs and cats, the percentage contribution of these two segments over the pet population was multiplied by the number of overall pets determining InvoCare's addressable pet market. Considering that not all pet owners can provide or afford a pet cremation, we multiplied it by the expected pet cremation rate, yielding the number of pets cremated. Due to the rising animals' rights, cremation rates are expected to be 6% in 2020, increasing onwards 0,2% per year onwards. The market share is expected to be almost 22% in 2030, mostly due to the acquisition of the two largest pet cremation companies in Australia, which will add 66.000 new cases, increasing the market share by 17,3% in 2021. Moreover, via synergy gains, InvoCare's market is projected to grow yearly 20 bps, which translates into revenue growth of 6%.

Expenses

InvoCare and the funeral service industry are already in a mature stage therefore we expect key expense captions to remain stable as a percentage of revenues in the future. There was no segmentation between the different business units and geographies as the company did not provide any differentiation between them and historically those captions have shown to be constant. Moreover, due to the current situation, the half-year report helped us to understand how the company's expenses have been reacting to the pandemic crisis, thus, we used that report to benchmark our analysis.

From the six core expenses items, we believe three of them will be significantly impacted by the new strategic, operational, and commercial plan launched by InvoCare at the beginning of 2017. Those captions are Finish goods, consumables, and funerals disbursement, Technological expenses, and Advertising and Public relations.

Finished goods, consumables, and funeral disbursements will see a reduction to 24,6% of sales for 2020 and 2021, returning to pre-crisis values in 2022. From then onwards, and due to the expected realization of synergies from the NBO program, which will translate into a more efficient and cost-saving infrastructure, we project this percentage will gradually reduce every year being roughly 24% of sales in 2030.

Since the launch of the NBO Program, a new type of expense has been recognized, Technological expenses. The expenses related to this caption have been increasing in line with the renovation and digitalization of the funeral's homes as InvoCare tries to adjust its product range to customers' demands. Tech expenses are projected to be 2,5% of sales and constant in the foreseeable future as most of the NBO sites will have been renovated.

Lastly, advertising and public relation expenses are projected to be 4,4% for the following 10 years, being 100bps higher when compared to 2019. The percentage increase comes from a

stronger marketing strategy led by InvoCare aiming to make its national brands more relevant and known within regional areas. Likewise, as mentioned before, InvoCare has moved to a new business segment, pet cremations, therefore, to become a reference provider and increase market visibility of its brands across the surrounding communities' greater expenditure is projected.

The other core captions are only expected to change throughout 2020 and 2021, as they were affected directly by the new situation, returning to pre-COVID levels afterward. The occupancy and facilities expenses will rise in 2020 and 2021 to 4,8% due to the new shop fronts, shared services rentals, and COVID-19 safety and hygiene protocol, as explained in the half-year report. The other expenses have increased in the 2020 half-year compared to 2019, so we projected them to be 3,5% of sales in 2020 and 2021, and become 2,5% thereafter, following the cost-saving strategy of the NBO program.

Capital Expenditure

The rebranding and repositing of the InvoCare location network, under the NBO program, increased substantially the capital expenditure done in the last four years and it is expected to continue at a lower rate until 2024, the end of the NBO program. By 2020, A\$144 M of the projected A\$200 M of net Capex will have been invested across 171 locations. In the next five years, a further 46 locations are planned to be renovated which translates into an investment of A\$46 M. Alongside the NBO Program, InvoCare will intensify the acquisition of regional locations to address new market dynamics identified by the company. The low market presence within regional areas accompanied by the exodus of a key demographic segment, baby boomer, via the tree and sea changer movement forced InvoCare to extend its M&A Activity outside metropolitan areas. As a result, since 2018 an investment pipeline started to be developed and it is projected intensification of the same in the following 6 years. From 2020 until 2025, business combinations, expansion Capex, will total A\$81 M corresponding to 2,5% of yearly revenues. After this period and by 2030, InvoCare's overall capital expenditure will converge to its historical value, of 5,38% of revenues.

ROIC and FCFF Evolution

From 2016 until 2019, the return on invested capital (ROIC) decreased by almost 400bps to 12,55%. The lower ROIC was expected due to the closure and renovation of funeral homes, under the NBO Program, which diverted the case volume to unrenovated locations unable to fulfill customer preferences with the available product range. In 2020 and 2021, the location network renovation would be almost complete and encouraging results were foreseen. The positive outlook was stopped as the COVID-19 pandemic contracted the world economy, affecting mainly industries which core business depends on hosting large events such as the funeral services. The restrictive measures imposed by governments limited InvoCare's ability to provide the full scope of value-added services to its customers. As a result, ROIC and ROIC in 2020 are projected to be -31,15% and 1,30%, respectively. The underperforming locations are not the only factor for the poor results as a new accounting standard implemented in 2019 has significantly increased the invested capital, mainly driven by the right to use assets by more than A\$144 M, leading to an artificial decrease of the ROIC in 2020. In 2021, a 600bp improvement of the ROIC is expected however, the impact of the pandemic will still be evident as the average ROIC in these two years will be around 4,3%. After the projected COVID-19 period (2020-2021), the incorporation of the

sea and tree changers movement and Network & Brand Optimization program within the business model is expected to deliver sustainable growth and consistent results. Therefore, ROIC is forecast to stabilize at 11,29% in 2030. Both metrics on Invested Capital, ROIC and RONIC; will during the forecasted period present values well above the WACC yielding investors a return higher than the opportunity cost of capital. Alongside the positive outlook of the ROIC and RONIC, InvoCare's FCFFs are expected to increase in line with an elder population and higher case volume, generating an FCFF of A\$96.760 M by 2030.

Cost of Capital

To discount the cash flows generated by the core operations, the cost of capital has been computed. The cost of equity was derived from the CAPM model. As our forecasted period was until 2030, the 10-year Australian government bond, rated AAA by S&P, priced at 0,98% YTM was used as the risk-free rate. Additionally, the proposed market risk premium, based on analyst research, Aswath Damodaran (NYU Stern), is 5,23%. To compute InvoCare's beta the ASX-200 was considered the best proxy of the market portfolio as its shareholder base is largely composed of Australian investors. To derive the cost of equity, we had to analyze InvoCare's peers. InvoCare's peer group was selected based upon the similarity of business models, geographic proximity, and market capitalization. The selected companies were Dignity, Carriage Service Incorporated, Service Corporation International, Propel Funeral Partners, and Fu Shou Yuan. From these Service Corporation may be considered an outlier as its' market cap is almost 3x InvoCare's. However, InvoCare was born as a spin-off of the SCI's Australian operations. For the levered beta, a five-year period of InvoCare's and its peers' weekly returns were regressed against ASX-200. Since companies have different capital structures, we had to unlevered the betas to account for it and the tax rate. Afterward, the median of its competitors' unlevered beta was computed to get the industry's beta which was re-leveraged with the 2030's target capital structure, being the debt to equity 120,2%, yielding a levered beta of 0,998. The cost of equity, computed via the CAPM model, is 6,20%. For the cost of debt, the best available proxy is the effective average interest rate, provided in the 2019 annual report, since InvoCare does not hold any outstanding public debt and intends to keep raising capital, debt, with private institutions. Thus, the cost of debt was set at 3,94%. Using its peers as a benchmark, the cost of debt computed as the average of $YTM - PD \times LGD$ would have been 2,96%. Moreover, a 4,32% WACC was computed.

Multiple Valuation

To complement the fundamental analyses, a multiples valuation was performed. As mentioned before, the peer group consists of Dignity, Carriage Service Incorporated, Service Corporation International, Propel Funeral Partners, and Fu Shou Yuan. For the relative valuation, four equity and two enterprise multiples were used: Price-to-Book, Forward-looking Price-to-Earnings, Historic Price-to-Book, Five-Year Price-to-Book, Enterprise-to-EBITDA, and Five-Year Enterprise-to-EBITDA, which incorporate the past, present and future market and analyst's expectations as well as structural changes that have been more prevalent in the industry during the last decade that InvoCare is still adjusting to.

Sensitivity Analysis

A sensitivity analysis was performed with respect to InvoCare's levered beta and the terminal growth rate as both DCF inputs are crucial valuation components. The leveraged beta was

chosen since through the process of determining the Funeral Industry asset beta, 3 of the 5 comparable do not operate on the Asia-Pacific geography. However, as we regress their excess return against the ASX-200, Australian market Index, we are comparing economies defined by despair fundamentals. As a result, it might not yield the true companies' beta. Since this input is crucial to determine the cost of equity and, subsequently, the WACC, a delta of 20bp was assumed to test the sensitivity and valuation impact. Since the funeral industry is not either countercyclical or procyclical its beta should be close to 1. Considering the DCF terminal growth rate and a positive 20bps beta increment, the price/share would be A\$11,04.

For the terminal growth rate, a 40bps delta was assumed, but with a different rationale. The base case scenario, reflected on the DCF model, considers the impact of COVID-19 until 2021 and perpetual growth of 0,6%. Nevertheless, because of the uncertainty caused by the pandemic, it is important to consider a bearish and bullish scenario. Under a bullish perspective, the impact of COVID would be limited to 2020. Therefore, the distancing measures that restricted InvoCare's ability to host large gatherings, affecting its operational and financial performance, would be minimized, leading to a faster recovery and higher growth. The bearish scenario is less likely to occur as Australia, New Zealand and Singapore were among the few countries to properly contain the pandemic. Nevertheless, despite their outperformance, a third wave or new virus stripe may force governments to imposed strict lockdowns affecting InvoCare's main business segment, funeral services, hindering its growth outlook. To understand the impact of each scenario, probabilities were attributed concerning their likelihood of occurring with the base, bullish, and bearish cases probabilities being 70%, 20%, and 10%, respectively, yielding a share price of A\$13,13.

Final Recommendation

InvoCare's strategic acquisitions of operations across the regional market, reorganization, and digitalization of its infrastructure will allow for a higher case volume to be addressed, projected to grow in the next 10 years at a CAGR of 3,33%. Therefore, strong sales are forecasted for InvoCare's and the funeral industry, as the number of deaths is also expected to increase exponentially as the population becomes older and the bigger demographic segment. Hence, our analysis yields a target price of A\$12,95 for December 2021, translating into a 16,71% shareholder return when compared to a share price of A\$11,45, and a dividend of A\$0,41 per share. The final recommendation is to "BUY".