

Research on the Valuation of Under Armour Based on Multiple Valuations Method

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Abstract. As the market competition in the clothing industry is very fierce, most of the market resources are owned by large companies. And Under Armour can occupy a certain market share in the industry, and the reasons are worth analysing. Therefore, this paper chooses Under Armour as the research object. In order to evaluate the enterprise value of Under Armour, this paper adopts the methods of strategic analysis, competitor analysis, and multiple valuations. The analysis results show that, first of all, the competitive advantage of Under Armour lies in innovation and digitization, and enterprises should focus on the development of new products; Secondly, the company's financial data rose after the asset restructuring; Thirdly, the enterprise value of Under Armour is underestimated. In conclusion, the company's stock is worth investing in. The research results can provide empirical evidence for investors to consider investing in the company.

Keywords: Under Armour; Enterprise valuation; Competitor analysis; Multiple valuations.

1. Introduction

Currently, the market competition in the clothing industry is very fierce, and most of the market resources are controlled by large companies that have been established for decades. Under Armour can occupy a certain market share in the industry and has a certain influence in North America, so this paper selects Under Armour as the research object that as an emerging company, the reason is worth analysing. This paper will adopt the method of multiple valuations to evaluate the enterprise of Under Armour. Enterprise valuation is a set of procedures for analysis and evaluation used to estimate a company's unit value at a specific time [1]. It is a value opinion prepared by professional experts, analysts, and appraisers based on the information collected and appropriately utilized by the company under consideration and its operating environment [2]. This paper will conduct a quantitative and qualitative analysis of Under Armour to explore its market value and whether it is worth investing in.

At present, the research on enterprise value is very concern by scholars, Demirakos et al. (2010) studied the research reports of 94 UK-listed international investment companies from 2002 to 2004 to explore the accuracy of different valuation models. The results show that analysts use DCF more frequently, but the P / E ratio model analysis results are more accurate [3]. Imam (2013) discussed the accuracy of valuation models used by European analysts. It is found that the income multiples and discounted cash flow (DCF) valuation models are the two most popular valuation models, and the use of accrual multiple and cash flow-based models can effectively reduce the prediction error [4]. Chullen et al. (2015) analyzed the impact of consistency on the accuracy of enterprise value estimation based on various valuation methods. After analysis, the author knows that the multiple based on the consistent definition has high prediction accuracy in most cases [5]. Serra (2018) studied whether industry multiples in different countries can be widely used when using multiple revaluations. Taking the United States and Brazil as samples, it is found that the industry differences between different countries are desirable in multiple valuations [6]. Lie (2002) evaluated various multiples used to estimate the value of the company. The conclusion is that the estimation results of asset multiples are more accurate than those of sales, and EBITDA multiples usually produce better estimates than EBIT multiples [7]. This result is contrary to that of Liu, whose research shows that the income prediction based on industry multiples is very accurate. In general, the analysis results of the P / E ratio model and EBITDA multiple are more accurate, which is also the reason why this paper selects these two valuation models [8].

The main contributions of this paper include two aspects. Theoretically, it enriches the research literature on Under Armour. In practice, the analysis results of the market value of Under Armour in this paper can provide empirical evidence for investors to decide whether to invest.

The rest of this paper is organized as follows; Section 2 is the strategic analysis of Under Armour. Section 3 is the competitor analysis of Under Armour. Section 4 is the financial indicators analysis of Under Armour. Section 5 is the multiple valuations of Under Armour. And sections 6 and 7 are discussion on the investment value and conclusion.

2. Strategic Analysis of Under Armour

Under armour is headquartered in Baltimore, Maryland. Its main products are brand sportswear, shoes, and accessories. Its sales areas are mainly distributed in North America, Asia Pacific, and Europe. The founder of the company created the brand to create high-performance tight-fitting sportswear that can quickly sweat and keep athletes fresh and light during intense sports. The brand preference survey conducted by Cowen Research Institute for American consumers shows that the first choice of American consumers for sports brands is "cool" [9]. Therefore, the current strategy of Under Armour focuses on product innovation and communication with consumers, such as UA Run, UA ISO chill, the competitor's fleece, and other products, whose clothing revenue UA increased by 33 in 2021. Through innovative technologies such as UA velocity wind, footwear revenue increased by 35%. This innovation helps athletes improve their running speed through lightweight rubber-free shoes. In the face of the situation that has been completely divided by sports brand giants, the strategy of under Armour to enter the market is to create a new product category. The advantage of doing so is to avoid direct competition with big brands and to earn higher profits. Moreover, brands that enter the market segment first often give consumers a deep impression and consolidate their position for the camp step by step. In addition, the company is also committed to promoting digital sales, establishing a communication platform with customers, and applying this technology to the promotion of the fitness business. In addition, Under Armour hopes to maintain its overall strategy in the next few years, continue to focus on the manufacturing and sales of sports and fitness clothing, and actively establish offline stores in other continents to develop secondary markets outside North America.

3. Competitor Analysis Of Under Armour

At present, the main competitors of Under Armour include Levi Strauss & Co. (LEVI), Gildan Activewear (GIL), and Columbia Sportswear (COLM). Their advantages and disadvantages are shown in Table 1. These companies are all part of the "apparel, finished products from fabrics & similar materials" industry. As an emerging company, Under Armour's company size, number of employees, and sales volume are not high compared with these large companies that have operated for decades, which is also its biggest disadvantage. Its revenue is mainly generated by its North American branch, and its international market share is low. Moreover, compared with other companies, its pricing is high, which is easy to lead to customer loss. The advantage of Under Armour lies in its efforts in e-commerce and enterprise digitalization. The company has introduced a large number of young employees to engage in fitness-related applications, such as Endomondo, Mapmyfitness, and Myfitnesspal, to sell and promote products.

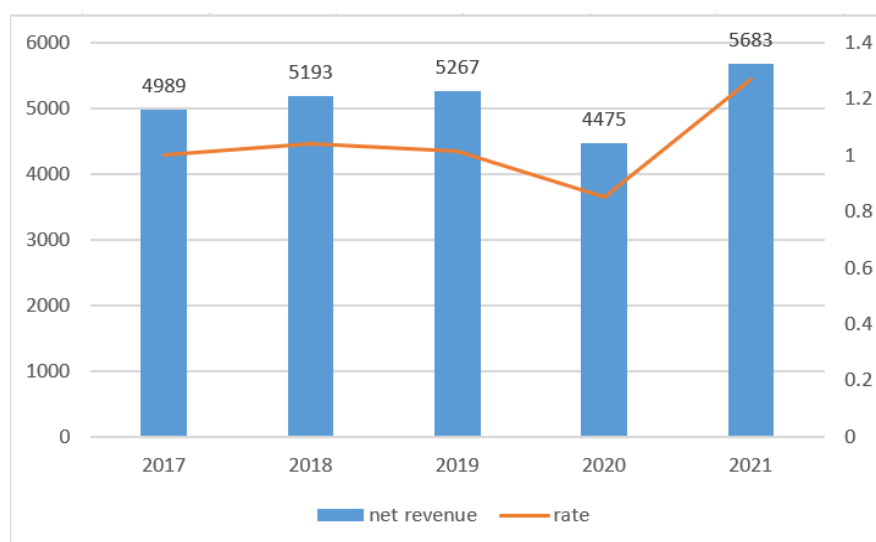
Table 1. Advantages and disadvantages of competitive companies

	Disadvantages	Advantages
UAA	company size and international market share	enterprise digitalization
LEVI	Single brand, only jeans	Large market share
GIL	Only sportswear	Large manufacturing facilities with vertical integration
COLM	Only sportswear	Sales and numbers of employees

4. Financial Analysis of Under Armour

4.1 Net revenue

As shown in figure 1, the net revenue of Under Armour in 2019, 2020, and 2021 were \$5267, \$4475, and \$5683 million respectively. Among them, the net revenue in 2020 decreased by 15%, mainly because the wholesale revenue decreased by 25%, the revenue in North America decreased by 19%, the international revenue decreased by 4%, the clothing revenue decreased by 17%, and the footwear revenue decreased by 14%. There are two main reasons for the decline in net revenue in 2020. One is the sharp decline in offline store customers due to the impact of COVID-19, resulting in lower sales. Second, Myfitnesspal, one of its profit sources, was sold in 2020, which also led to a decrease in net revenue. In 2021, the net revenue increased by 27% (up 25 percent current neutral), among which the wholesale revenue, clothing revenue, and footwear revenue have increased to varying degrees. It can be seen that the negative impact on Under Armour 's net revenue in 2020 has decreased in 2021.

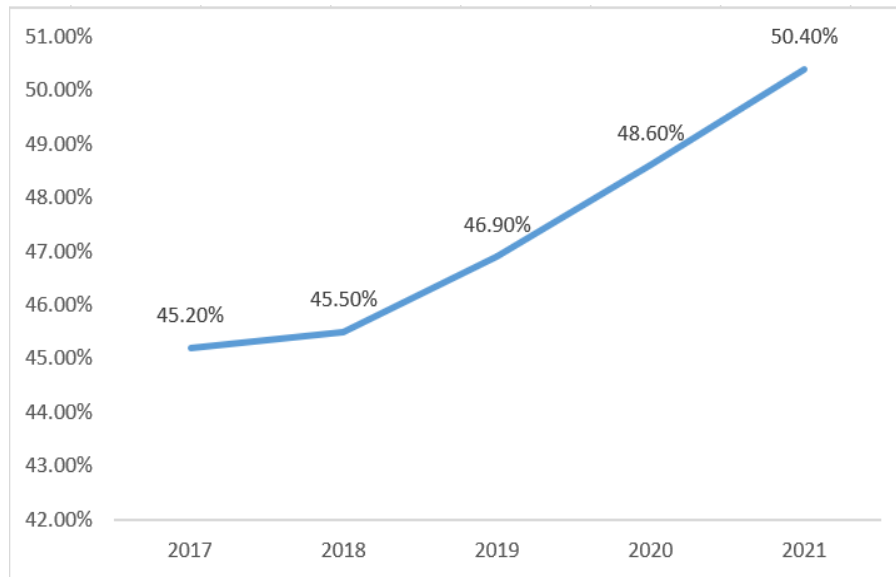


Source: 2021 Annual report of Under Armour

Figure 1. net revenue of Under Armour

4.2 Profit margin

As shown in figure 2, the gross profit margin of Under Armour from 2019 to 2021 is 46.9%, 48.6%, and 50.4% respectively, which is in a stable rising state. The adjusted gross profit margin increased by 170 basis points to 48.6% in 2020, mainly due to channel mix and supply chain initiatives, but partially offset by pricing related to discounts directly to consumers in channels. In 2021, the gross profit margin increased to 50.3%. Excluding the restructuring work of about US \$ 1 million, the adjusted gross profit margin increased by 180 basis points to 50.4%, which benefited from the benefits of pricing and favorable changes in foreign currencies, partially offset by the lack of Myfitnesspal, rising freight rates, and adverse channel combinations.

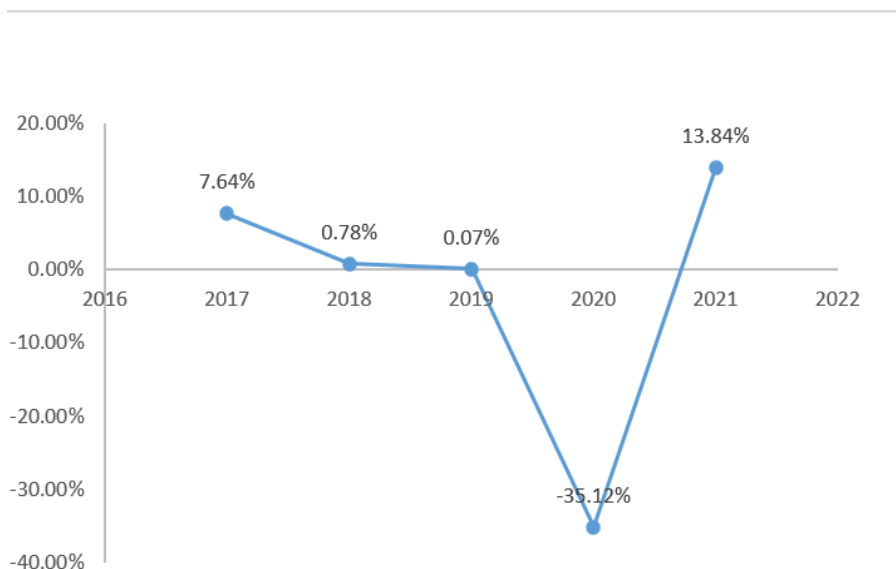


Source: 2021 Annual report of Under Armour

Figure 2. Profit margin of Under Armour

4.3 Return on Equity (ROE)

As shown in Figure 3, the return on equity of Under Armour from 2019 to 2021 is 0.07%, - 35.12%, and 13.84% respectively. Among them, the roe in 2020 is negative because the company is in a loss state 2020. In 2020, Under Armour announced a restructuring plan of US \$550 million to the US \$600 million, aimed at rebalancing its cost base to improve profitability and cash flow. From the change of its roe, although the company was in a loss state in 2020, its return on equity increased significantly in 2021, which was the highest in recent years, indicating that the restructuring plan of Under Armour was very successful.



Source: 2021 Annual report of Under Armour

Figure 3. ROE of Under Armour

5. Multiple Valuations of Under Armour

This paper will use multiple valuation methods to evaluate whether the market value of under Armour is overestimated or underestimated. Among them, the P/E ratio is used to analyze its stock price, and the EV/EBITDA ratio is used to analyze its enterprise value. According to the data on

Yahoo Finance, its stock price in December 2021 was \$21.19, EPS was 0.455, and enterprise value was \$4.13billion. The specific calculation results are shown in Table 2.

Table 2. results of multiple valuations

	UAA	LEVI	GIL	COLM	NIKE	Average
P/E	16.94	11.53	8.06	13.51	28.78	15.764
EV/EBITDA	7.74	9.24	6.95	7.71	25.39	11.406

This paper selects the data of Under Armour and its competitors as the sample data for calculating the industry average. These companies belong to the industry of apparel, finished products from fabrics & similar materials. The average P/E ratio of the industry is 15.764, while the EPS of Under Armour is 0.46. Therefore, the calculated stock price is $15.764 \times 0.45 = \$7.10$, which is lower than the stock price in December 2021. Therefore, the analysis result based on the P/E ratio is that the stock price of Under Armour is overvalued. Similarly, the calculated industry average EV/EBITDA ratio is 11.406, while Under Armour is 7.74, lower than the average. Due to its low EV/EBITDA ratio, its enterprise value should be undervalued.

In general, the results of the two analysis methods are opposite. However, compared with the P/E ratio, the result of the EV/EBITDA ratio analysis is more accurate. This is because it is not affected by different capital structures, and the restructuring of Under Armour in 2020 will not affect the analysis results. In addition, excluding the impact of non-cash costs such as depreciation and amortization, it can more accurately reflect the value of the company [10]. Therefore, this paper believes that the market value of Under Armour is undervalued.

6. Discussion on The Investment Value of Under Armour

This paper believes that from the perspective of investors, the stock of Under Armour is worth buying and has investment value. First of all, from the perspective of the company itself, the asset restructuring plan implemented in 2020 has been completed in the transitional quarter ending in March 2022. It can be seen from the historical data of the company that all financial indicators of Under Armour are on the rise, which has development potential. In addition, although the current market share of Under Armour is not high, it is committed to building a digital platform for communicating with customers, thus opening up emerging markets such as fitness. Compared with companies such as Levi, its innovation makes it more competitive in the industry in the future. Moreover, through the multiple valuation analysis of the company's data, this paper believes that its company value is underestimated, and its gross profit margin and net revenue are on the rise. Therefore, the stock of Under Armour is worth buying by investors.

7. Conclusion

Through the quantitative and qualitative analysis of Under Armour in this paper, there are 3 conclusions. Firstly, compared with competing companies, Under Armour's greatest advantage lies in its product innovation and company digitization. Secondly, according to the company's data, it can be seen that the operating conditions of Under Armour are gradually improving in the past two years. Thirdly, the market value of the company is estimated, and it has a lot of room for development.

There are several implications in this paper. Firstly, the research conclusion of this paper provides an effective basis for investors to invest in the stocks of Under Armour. Secondly, For Under Armour, in order to maintain its current competitiveness in the market, the most important thing is to adhere to the company's strategy of innovative product categories, such as fitness products, and ensure the company's digital process, strengthen communication and feedback with customers, so as to effectively increase the company's value.

However, there are some potential limitations in this paper. This paper only uses P / E and EBITDA models for valuation analysis, and neglects other valuation methods, such as EBIT or DCF valuation models. If the research methods in this paper are compared with other valuation methods, the conclusions should be more reliable. Therefore, the research methods in this paper need to be further improved and studied.

References

- [1] Fogg, S.L. 1984, "Basic business appraisal", *Journal of Accountancy*, [Online], vol. 158, no. 3, pp. 157 - 157.
- [2] Cornell, B. 1993. *Corporate valuation: Tools for effective appraisal and decision making*. Business One Irwin.
- [3] Demirakos, E.G., Strong, N.C. & Walker, M. 2010, "Does Valuation Model Choice Affect Target Price Accuracy?", *The European accounting review*, vol. 19, no. 1, pp. 35-72. DOI: <https://doi.org/10.1080/09638180902990630>.
- [4] Imam, S., Chan, J. & Shah, S.Z.A. 2013, "Equity valuation models and target price accuracy in Europe: Evidence from equity reports", *International review of financial analysis*, vol. 28, pp. 9-19. DOI: <https://doi.org/10.1016/j.irfa.2013.02.008>.
- [5] Chullen, A., Kaltenbrunner, H. & Schwetzler, B. 2015, "Does consistency improve accuracy in multiple—based valuation?", *Zeitschrift für Betriebswirtschaft*, vol. 85, no. 6, pp. 635-662. DOI: <https://doi.org/10.1007/s11573 - 015 - 0768 - 2>.
- [6] Serra, R.G. & Fávero, L. P. L. 2018, "Multiples' Valuation: The Selection of Cross-Border Comparable Firms", *Emerging markets finance & trade*, vol. 54, no. 9, pp. 1973-1992. DOI: <https://doi.org/10.1080/1540496x.2017.1336084>.
- [7] Lie, E. & Lie, H. J. 2002, "Multiples Used to Estimate Corporate Value", *Financial analysts journal*, vol. 58, no. 2, pp. 44 - 54. DOI: <https://doi.org/10.2469/faj.v58.n2.2522>.
- [8] Liu, J., Nissim, D. & Thomas, J. 2007, "Is Cash Flow King in Valuations?", *Financial analysts journal*, vol. 63, no. 2, pp. 56 - 68. DOI: <https://doi.org/10.2469/faj.v63.n2.4522>.
- [9] Jaworek, M., Karaszewski, W. & Kuczmaraska, M. 2021, "Source of success of the most valuable sportswear brands in the world", *Journal of Physical Education and Sport*, vol. 21, pp. 1050 - 1056.
- [10] Pätäri, E. & Leivo, T. 2017, "A CLOSER LOOK AT VALUE PREMIUM: LITERATURE REVIEW AND SYNTHESIS", *Journal of economic surveys*, vol. 31, no. 1, pp. 79 - 168. DOI: <https://doi.org/10.1111/joes.12133>.