



## Luckin Coffee Research (1/2/20)

**Description:** Luckin Coffee Inc. engages in the retail sale of freshly brewed drinks, and pre-made food and beverage items in the People's Republic of China. The company operates pick-up stores, relax stores, and delivery kitchens under the Luckin brand, as well as Luckin mobile app, Weixin mini-program, and other third-party platforms that cover the customer purchase process. The company was founded in 2017 and is based in Xiamen, China.

**Ticker:** LK

**Price:** \$39.36

**Market Cap:** \$9.46B

**Performance:** +93.1% since IPO on May 17<sup>th</sup>, 2019

**Dividend Yield:** N/A

### Analysis

Luckin Coffee is a company that has been experiencing insane growth since launching in 2017. In fact, CUBE can't really recall another company in recent history that has been able to grow their business this fast in such a short time span. Below you will see many graphs and charts displaying this growth with the first one being the amount of locations LK has created in such a short time frame.

At the beginning of 2019, Luckin Coffee had approximately 2,380 locations in China -- compared to the nearly 3,700 Starbucks stores at that time.

With 2019 now in the books, Luckin has already caught up to Starbucks with both companies listing over 4,000 stores in China.



The above image shows Starbucks store count compared to Luckin as of September. As we know from Luckin Coffee's Q3 report, the exact number was 3,680. With Q4 now in the books and LK's average of 8 new store openings per day (see below), it's safe to assume that LK now has at least 4,400 total locations – surpassing SBUX. The company's target is 4,500 so there is also a possibility that when they report their Q4 results the actual number is even higher than that. The last image on the page shows the early growth trajectory.



	For the three months ended,					
	December 31, 2017	March 31, 2018	June 30, 2018	September 30, 2018	December 31, 2018	March 31, 2019
Number of stores at the beginning of the period	0	9	290	624	1,189	2,073
Number of stores at the end of the period	9	290	624	1,189	2,073	2,370
<b>Net increase in the number of stores</b>	<b>9</b>	<b>281</b>	<b>334</b>	<b>565</b>	<b>884</b>	<b>297</b>

One of the first few thoughts CUBE has when we see this kind of growth is:

1. How is it being financed?
2. What's cash on hand like and is it ultimately sustainable?

Before we even look into anything else, we need to ensure that LK is not ironically growing themselves into nonexistence AKA growing too fast for their own good leading to a potential bankruptcy.

	As of		
	31-Dec-18	30-Sep-19	
	RMB	RMB	US\$
<b>ASSETS</b>			
<b>Current assets:</b>			
Cash and cash equivalents	1,630,983	4,513,899	631,518
Restricted cash	-	21,709	3,037
Short-term investments	130,000	1,030,000	144,102
Receivables from online payment platforms	4,609	11,073	1,549
Accounts receivables	-	11,429	1,599
Inventories	150,015	213,225	29,831
Prepaid expenses and other current assets	365,510	553,171	77,391
Amount due from a related party	147,559	-	-
<b>Total current assets</b>	<b>2,428,676</b>	<b>6,354,506</b>	<b>889,027</b>
<b>Non-current assets:</b>			
Property and equipment, net	904,992	1,238,169	173,226
Restricted cash	-	2,004	280
Other non-current assets	151,408	434,352	60,768
<b>Total non-current assets</b>	<b>1,056,400</b>	<b>1,674,525</b>	<b>234,274</b>
<b>TOTAL ASSETS</b>	<b>3,485,076</b>	<b>8,029,031</b>	<b>1,123,301</b>
<b>LIABILITIES, MEZZANINE EQUITY AND SHAREHOLDERS' (DEFICITS)/ EQUITY</b>			
<b>Current liabilities:</b>			
Short-term bank borrowings	8,000	10,000	1,399
Current portion of long-term borrowing	72,787	226,969	31,754
Capital lease obligation	108,664	29,775	4,166
Accounts and notes payable	176,704	351,627	49,194
Accrued expenses and other liabilities	371,017	864,392	120,932
Amounts due to related parties	24,198	19,306	2,701
Warrant liability	19,520	-	-
<b>Total current liabilities</b>	<b>780,890</b>	<b>1,502,069</b>	<b>210,146</b>
<b>Non-current liabilities:</b>			
Long-term borrowing	226,969	-	-
Deferred revenues	126,469	55,293	7,736
Other non-current liabilities	-	37,717	5,277
<b>Total non-current liabilities</b>	<b>353,438</b>	<b>93,010</b>	<b>13,013</b>
<b>Total liabilities</b>	<b>1,134,328</b>	<b>1,595,079</b>	<b>223,159</b>

Surprisingly, LK has been mainly financed by equity as the company only has around \$33M in short-term debt (less than 1 year) due and zero long-term debt. After going back through their F1 filing, CUBE came across this.

	Period from the inception date to December 31, 2017 RMB	For the year ended December 31, 2018 RMB	US\$ (in thousand)
<b>Selected Consolidated Cash Flow Data:</b>			
Net cash used in operating activities	(95,026)	(1,310,694)	(195,297)
Net cash (used in)/generated from investing activities	(72,922)	(1,283,218)	(191,206)
Net cash generated from financing activities	387,219	3,988,402	594,289
Effect of foreign exchange rate changes on cash and cash equivalents	(175)	17,397	2,592
Net increase/(decrease) in cash and cash equivalents	219,096	1,411,887	210,378
Cash and cash equivalents at beginning of the period/year	—	219,096	32,646
Cash and cash equivalents at end of the period/year	219,096	1,630,983	243,024

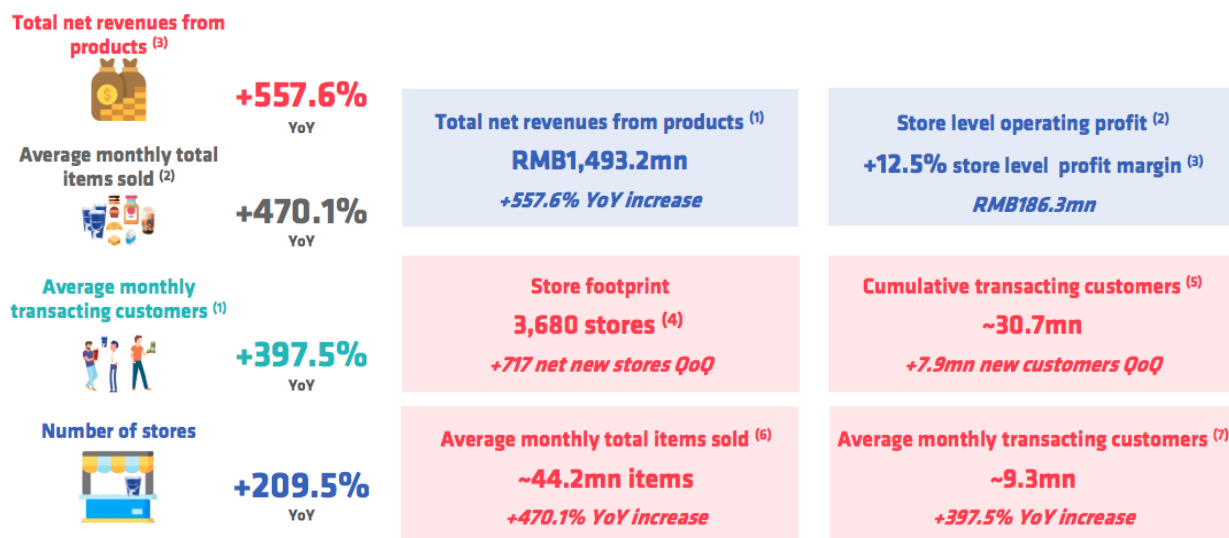
This image shows us that in 2017, the year LK was founded, they raised \$387M in financing predominantly via equity, and another \$594M in 2018. If we fast forward to their 2019 Q3 report, we see where cash now stands.

	For the three months ended September 30,			For the nine months ended September 30,		
	2018	2019		2018	2019	
	RMB	RMB	US\$	RMB	RMB	US\$
Net cash used in operating activities	(719,647)	(122,799)	(17,180)	(1,039,248)	(1,125,671)	(157,487)
Net cash (used in)/provided by investing activities	(1,297,174)	682,663	95,508	(1,609,786)	(1,605,672)	(224,642)
Net cash provided by/(used in) financing activities	1,066,846	(159,710)	(22,344)	2,558,819	5,491,826	768,335
Effect of foreign exchange rate changes on cash and cash equivalents	9,608	124,994	17,487	18,885	122,433	17,129
Net (decrease)/increase in cash and cash equivalents	(940,367)	525,148	73,471	(71,330)	2,882,916	403,335
Cash and cash equivalents at beginning of the period	1,088,133	3,988,751	558,047	219,096	1,630,983	228,183
Cash and cash equivalents at end of the period	147,766	4,513,899	631,518	147,766	4,513,899	631,518

LK had \$631M in cash & cash equivalents on hand at the end of Q3. Throughout the year the company has burned \$157M in operating activities and approximately \$225M on investing activities. The funds from financing activities to the amount of \$768M came primarily from their IPO in which they raised \$657M and the other \$158.8M from the issuance of Series B-1 convertible redeemable preferred shares in April (all before fees).

Put simply, LK is currently not in danger of bankruptcy and the company has actually done a fantastic job managing their debt to ensure they don't face interest and maturity payments that could squeeze the business. With that being said, if the company is unable to turn a profit in 2020, or at least slowdown the cash flow bleed, they will most likely need to either tap into debt financing or issue a secondary offering – especially if they plan on keeping up this level of store openings.

Now that we've covered that crucial topic, let's dive into the growth of the business itself and how the metrics are trending.

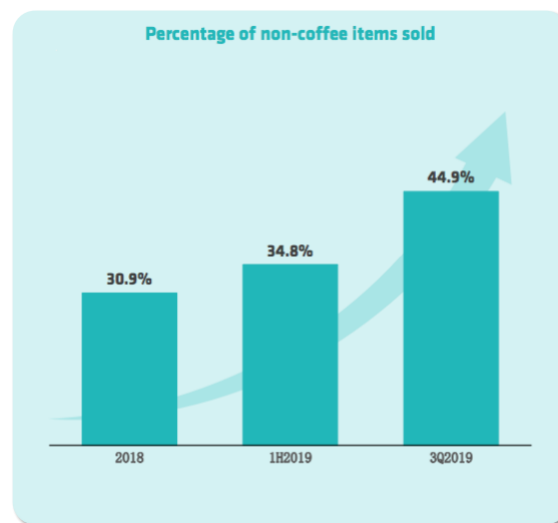


As we can see, LK is seeing a tremendous increase in business. One thing CUBE is a bit disappointed in right now is the fact that LK does not report comparable sales. As you know, we are short Shake Shack because even though growth is solid, it does not come from older stores built, it only comes from new ones. What I was hoping we could ensure is that LK is experiencing growth from shops built in 2017 and 2018 so we know for a fact that when the opening of new stores eventually slows down, the growth of old ones will keep the business chugging along. Another thing we have to keep in mind is that LK is doing some serious advertising, discounting, and rewards to build up demand and drive traffic in hopes that customers return. All of this has obviously been working in their favor as we can see revenues are up 557% Y/Y and new stores are up 209%. If this were a 1:1 ratio, CUBE would surely be concerned but that hasn't been the case.

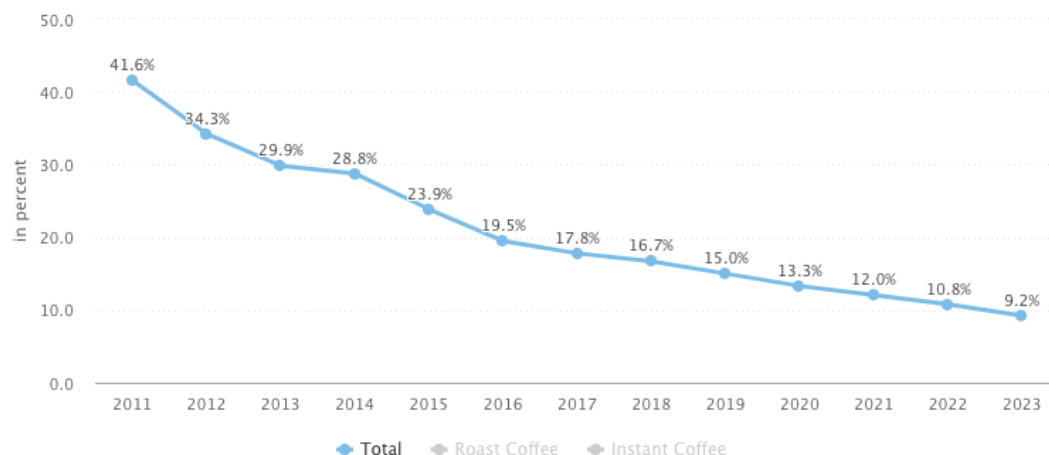
Based on the F1 filing, it also seems a lot of the new stores that are being built are more pick up locations rather than your traditional Starbucks location. This is something that needs to be stressed greatly as many people like to compare the two but they aren't 100% identical. When it comes to coffee, not all places are built alike as they offer different

experiences for different demographics. At the end of Q1, 91.3% of LK's locations were identified as "pick-up stores located in areas with high demand for coffee, such as office buildings, commercial areas and university campuses. This enables us to expand rapidly with low rental and decoration costs and stay close to our target customers. Our focus on technologies has enabled us to operate efficiently, grow rapidly while maintaining quality control."

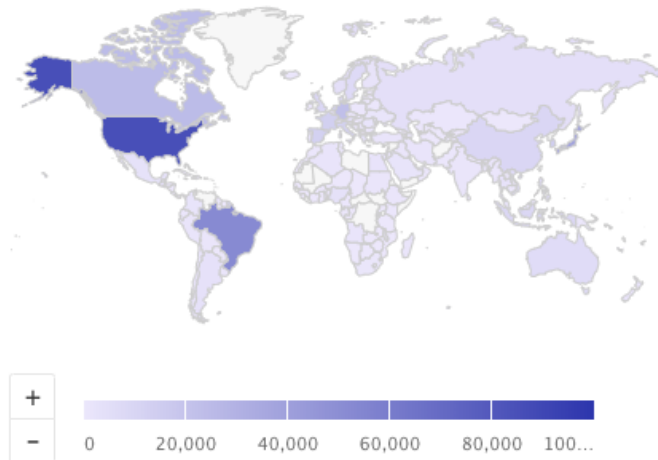
Secondly, LK is not a pure coffee shop. Their other products have actually been surging like that of bubble tea, juices, nuts, containers, etc. These non-coffee items now make up about 45% of revenues – much higher than CUBE first anticipated.



If we look at the entire country of China, coffee growth still has considerable room to grow. Statistics show that revenue in the coffee segment for China only amounts to US\$9.3B in 2020 and the market is expected to grow annually by 10.7% (CAGR 2020-2023).



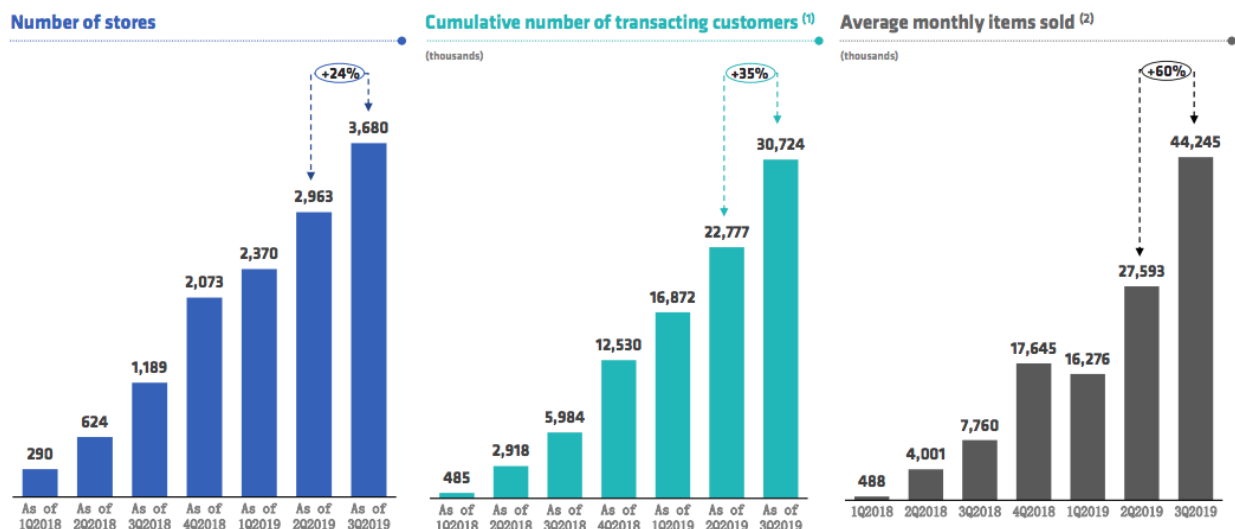
In comparison to the United States and Brazil, China has a long way to go. Coffee sales in the United States, for example, are expected to come in at \$85.1B in 2020 – nearly 10.5x that of China.



Top 5	
United States	US\$85,135m
Brazil	US\$51,930m
Japan	US\$38,429m
Canada	US\$24,488m
Germany	US\$22,469m
China	US\$9,307m

The point here is that overall growth of coffee in China should serve as a huge tailwind for LK and this is obviously why the company is focused on growing so quickly and also why it's virtually number one of SBUX's priority list.

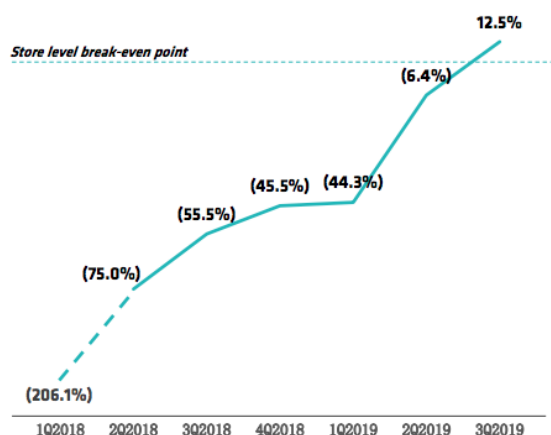
Switching back to the company's financials, we see more data on store growth, transactions, and average monthly items sold. One area CUBE likes a lot is that transactions and monthly items are outpacing store openings which is vital because this tells us that customers are returning and also adding more to their checkout.



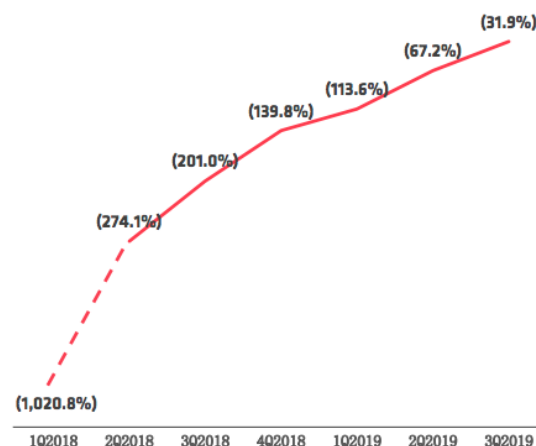


Now that the company is a solid two years into their growth story, they are starting witness solid benefits of scale. Below, we see that margins are improving drastically. This is something Wall Street and many analysts have been worried about since LK's IPO. Please keep in mind that store level profit margins are positive and total business margins are not because LK is spending a considerable amount of money on selling, general, and admin.

Store level profit margin <sup>(1)</sup>



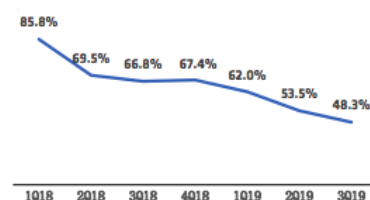
Non-GAAP net profit margin <sup>(2)</sup>



Cost of materials now make up 48.3% of revenues vs. 85.8% back in Q1 2018, store rentals and operating costs now make up 32% vs. 184.2%, depreciation stands at only 7.3% vs. 36.1%, sales & marketing makes up 36.2% vs. 420%, general and admin makes up 16% vs. 301%, and other expenses make up 1.4% vs. 85.6%.

Operating expenses as a percentage of net revenues from products

Cost of materials <sup>(1)</sup>



Store rental & other operating costs <sup>(1)</sup>

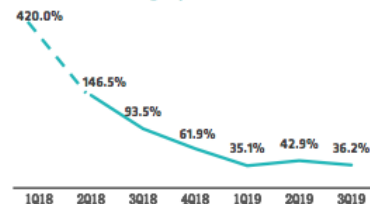


Depreciation expenses <sup>(1)</sup>

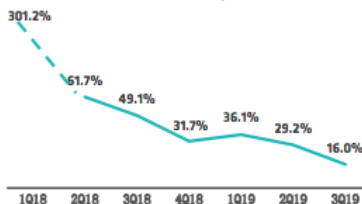


Operating expenses as a percentage of total net revenues

Sales and marketing expenses <sup>(2)</sup>



General and administrative expenses <sup>(2)</sup>



Store preopening and other expenses <sup>(2)</sup>







Furthermore, LK's current blended beverage average selling price (ASP) is only RMB 11.2 due to promotional coupons and vouchers. This is about 35% less than management's view of longer-run sustainable ASP at the RMB 16-17 range. In other words, LK is not just getting their costs down dramatically from RMB28 per cup to RMB 9.7, there's also significant upside to earn more revenue per customer.

To put it in easy-to-read way, here are some highlights from the Q3 report:

- Total net revenues from products in the quarter were RMB1,493.2 million (US\$208.9 million), representing an increase of 557.6% from RMB227.1 million in the same quarter of 2018.
- Average monthly total items sold in the quarter were 44.2 million, representing an increase of 470.1% from 7.8 million in the third quarter of 2018.
- Cumulative number of transacting customers increased to 30.7 million, representing an increase of 413.4% from 6.0 million as of the end of the third quarter of 2018.
- During the third quarter of 2019, the Company acquired 7.9 million new transacting customers.
- Average monthly transacting customers in the quarter were 9.3 million, representing an increase of 397.5% from 1.9 million in the third quarter of 2018.

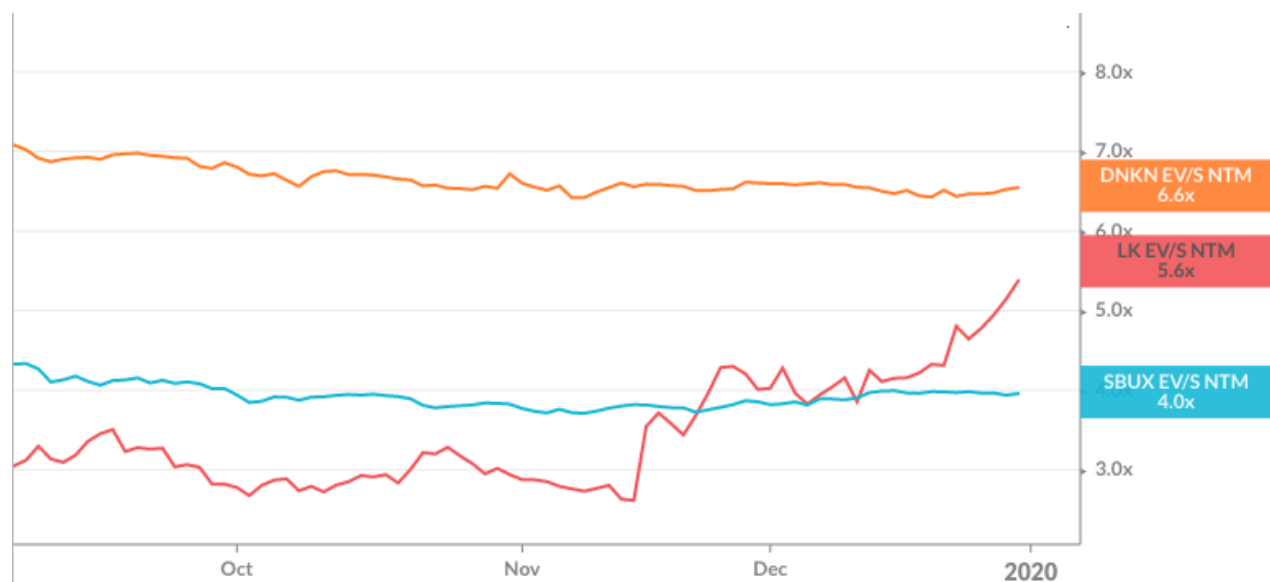
- Total number of stores at the end of the quarter were 3,680 stores, representing an increase of 209.5% from 1,189 stores at the end of the third quarter of 2018.
- Average total net revenues from products per store in the quarter were RMB449.6 thousand (US\$62.9 thousand), representing an increase of 79.5% from RMB250.5 thousand in the same quarter of 2018.
- Store level operating profit in the quarter was RMB186.3 million (US\$26.1 million), or 12.5% of net revenues from products, compared to a loss of RMB126.0 million in the third quarter of 2018.

The next question we must ask now is whether LK is worth the \$9.5B the market is valuing them at? At the current yearly revenue run rate, LK would generate about \$850M in revenues in 2020 assuming the company goes from a 557% growth rate to 0%. With this virtually impossible scenario, LK trades at 11.3x sales.

In Q4, LK said they expect to generate RMB 2.1B – 2.2B in sales which is equivalent to \$301M-316M. There is a solid probability LK beats those numbers but assuming they meet guidance and we use that figure as a yearly run rate the company would post \$1.22B at the midpoint in 2020. This implies a price to sales value of 7.8x.

Analysts are expecting growth of 165%, according to Koyfin, with revenues coming in at \$1.93B. At this level, LK trades at 4.9x sales. If we use EV (enterprise value = market cap - cash + debt) the numbers favor LK even more as the company does not have a lot of debt on its balance sheet.

Below is an image comparing LK to Starbucks (SBUX) and Dunkin Brands Group (DNKN) on a 2020 EV/Sales ratio. Using this metric, LK is actually cheaper than DNKN. Obviously, we cannot forget that DNKN and SBUX actually generate a profit but we also have to keep in mind the fact that they are also not growing anywhere near the level LK is.



All in all, LK is actually a very intriguing investment. The company also has plans to expand beyond China and the unique business model puts LK in a very solid position to grow rapidly given the relatively low cost of opening up their “pick up stores” at a brisk pace. If the company can continue to grow revenues while expanding margins so cash flow bleed isn’t as bad to avoid any potential dilution, there is room for considerable upside from their \$9.5B market cap. CUBE has held off investing in LK simply because margins were nowhere near what they are now and also because of how much weight we already have in China in the CUBEfolio. LK is for sure on CUBE’s watchlist and, in the event of a pullback, we may look to sell off some other China holdings and replace them with LK to keep the allocation in China at the same level.

## Technical Analysis



LK has been on a tear since it reported its Q3 numbers and right now shares have hit overbought on RSI and W%R and almost on the MFI. Given the fact that LK had no problem breaking past the R1 resistance level of \$36.32, it looks like it has its eyes set on the R2 level of \$42.49. CUBE expects the stock to make its way to the R2 followed by a short-term pullback after attempting to take out that level as the upper Bollinger band is being pushed very hard right now. The bullish flag formation played out in textbook fashion and now it's all about whether the R2 level will be a cap on the stock in the near term. If not, and LK blasts by it, there is no saying where it can go as all resistance levels would be broken.