

# FRESHCO HYPERMARKET DATA INSIGHTS - 2021

## Introduction:

Freshco Hypermarket, situated in HSR, Bangalore, has become a central hub for shoppers seeking a diverse range of products. The introduction of a home delivery service in 2021 marked a strategic move to enhance customer convenience. Leveraging a detailed transaction data sheet, this analysis aims to provide valuable insights into order patterns, completion rates, customer behaviors, and delivery dynamics.

This analysis is divided into four major points, as outlined below, to be presented as follows:

- Order Level Analysis
- Completion Rate Analysis
- Customer Level Analysis
- Delivery Analysis



Order Level Analysis

➤ Order distribution at slot and delivery area level.

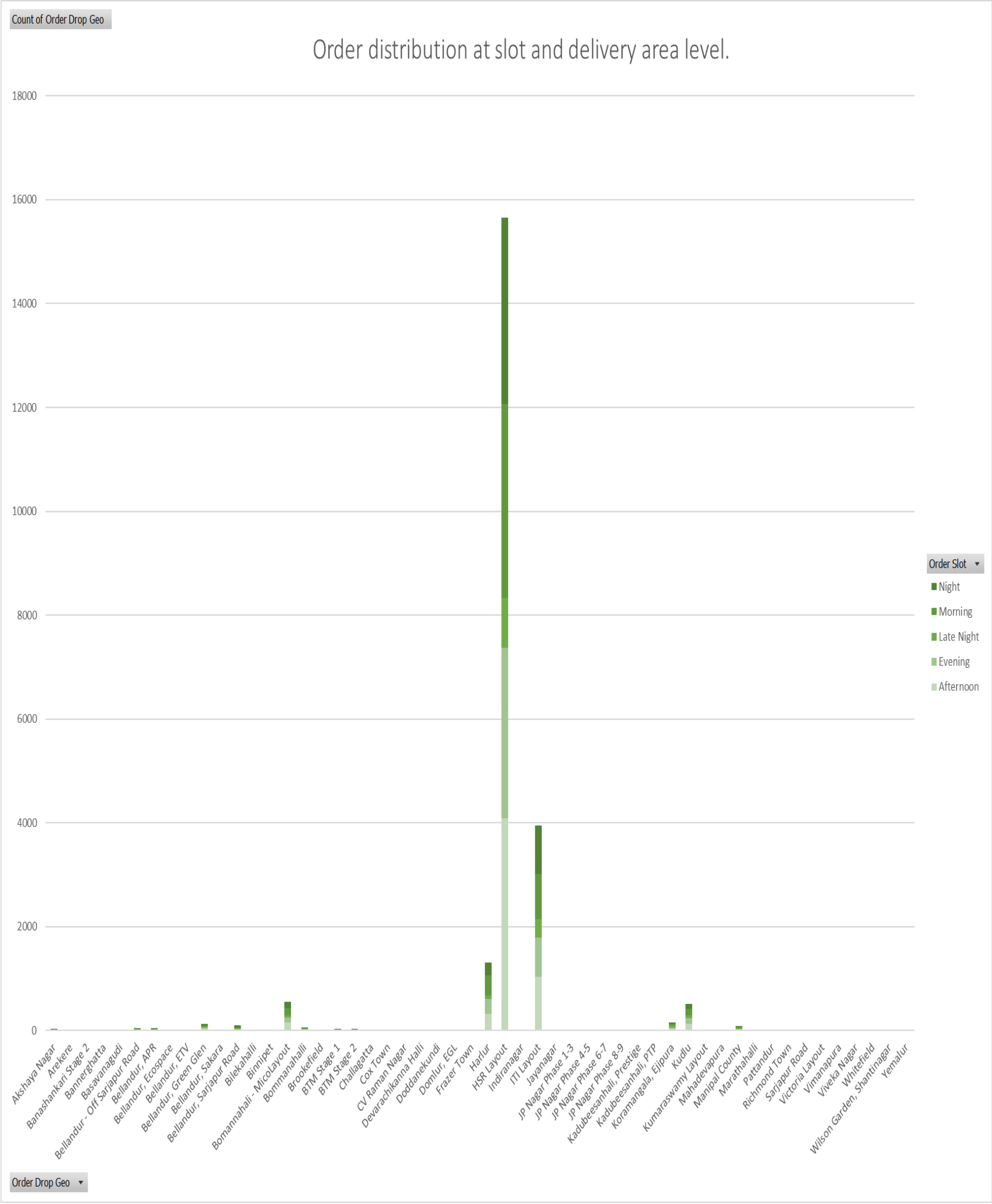
Count of Order Drop Geo	SLOT ▾					
Area ▾	Afternoon	Evening	Late Night	Morning	Night	Grand Total
Akshaya Nagar	3	4	4	6	4	21
Arekere	1	1	2		2	6
Banashankari Stage 2		1			1	2
Bannerghatta		2		1	2	5
Basavanagudi		2			1	3
Bellandur - Off Sarjapur Road	9	11	2	7	15	44
Bellandur, APR	8	14		6	1	29
Bellandur, Ecospace			1			1
Bellandur, ETV				1	1	2
Bellandur, Green Glen	32	27	12	27	36	134
Bellandur, Sakara	7	2	1		1	11
Bellandur, Sarjapur Road	20	13	15	11	39	98
Bilekahalli	2	5	1	2	1	11
Binnipet				1		1
Bomannahali - MicoLayout	151	107	36	132	125	551
Bommanahalli	13	13	6	10	10	52
Brookefield			1			1
BTM Stage 1	11	3	7	3	11	35
BTM Stage 2	6	6	5	7	8	32
Challagatta			1			1
Cox Town				1		1
CV Raman Nagar			1			1
Devarachikanna Halli	1	3	1		3	8
Doddanekundi			1		1	2
Domlur, EGL	3		1	3	1	8
Frazer Town			1			1
Harlur	324	280	73	382	250	1309
HSR Layout	4085	3288	953	3749	3582	15657
Indiranagar	3		2	1	2	8
ITI Layout	1039	757	346	868	936	3946
Jayanagar	1	1		1		3
JP Nagar Phase 1-3		2	1	1	1	5
JP Nagar Phase 4-5	2	1	1	2	1	7
JP Nagar Phase 6-7	3		1	2		6
JP Nagar Phase 8-9		1				1
Kadubeesanhali, Prestige	1		6		2	9
Kadubeesanhali, PTP					1	1
Koramangala, Ejipura	33	30	35	25	37	160
Kudlu	130	108	57	118	105	518
Kumaraswamy Layout	1	1		1	1	4
Mahadevapura				1		1
Manipal County	20	16	13	18	13	80
Marathahalli		1		1	1	3
Pattandur	1					1
Richmond Town	2					2
Sarjapur Road	6	3	1		10	20
Victoria Layout					1	1
Vimanapura	1					1
Viveka Nagar	4	2	1			7
Whitefield		1				1
Wilson Garden, Shantinagar		2			2	4
Yemalur	1	4		1	1	7
Grand Total	5924	4712	1589	5389	5209	22823

Insights:

- 1. HSR Layout and ITI Layout consistently lead in order counts.
- 2. Late-night orders are notable in HSR Layout and ITI Layout.

Observations:

- 1. While HSR Layout dominates, many areas show relatively low order counts.
- 2. Addressing lower-performing areas may require targeted marketing or promotional strategies for all the order slots.



➤ Areas having highest increase in monthly orders (from Jan to Sep) in absolute orders.

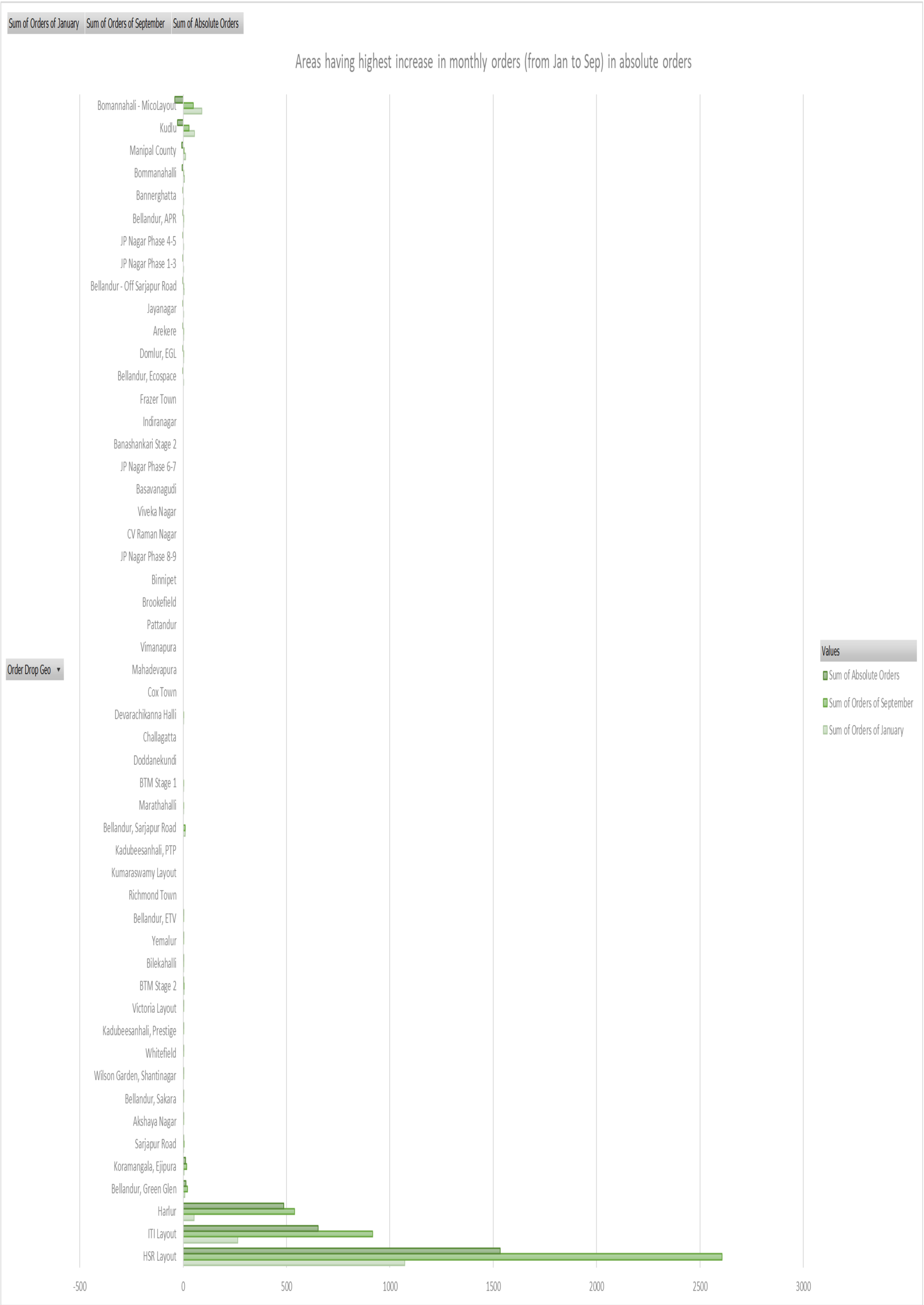
Area	Sum of Orders of January	Sum of Orders of September	Sum of Absolute Orders
HSR Layout	1072	2606	1534
ITI Layout	264	917	653
Harlur	53	539	486
Bellandur, Green Glen	8	22	14
Koramangala, Ejipura	5	17	12
Sarjapur Road	1	4	3
Akshaya Nagar	0	2	2
Bellandur, Sakara	0	2	2
Wilson Garden, Shantinagar	0	2	2
Whitefield	0	1	1
Kadubeesanhalı, Prestige	0	1	1
Victoria Layout	0	1	1
BTM Stage 2	4	5	1
Bilekahallı	2	3	1
Yemalur	0	1	1
Bellandur, ETV	0	1	1
Richmond Town	0	0	0
Kumaraswamy Layout	0	0	0
Kadubeesanhalı, PTP	0	0	0
Bellandur, Sarjapur Road	11	11	0
Marathahallı	1	1	0
BTM Stage 1	3	3	0
Doddanekundi	0	0	0
Challagatta	0	0	0
Devarachikanna Hallı	1	1	0
Cox Town	0	0	0
Mahadevapura	0	0	0
Vimanapura	0	0	0
Pattandur	0	0	0
Brookefield	0	0	0
Binnıpet	0	0	0
JP Nagar Phase 8-9	0	0	0
CV Raman Nagar	0	0	0
Viveka Nagar	0	0	0
Basavanagudi	0	0	0
JP Nagar Phase 6-7	0	0	0
Banashankari Stage 2	0	0	0
Indiranagar	0	0	0
Frazer Town	0	0	0
Bellandur, Ecospace	1	0	-1
Domlur, EGL	2	1	-1
Arekere	2	1	-1
Jayanagar	1	0	-1
Bellandur - Off Sarjapur Road	4	3	-1
JP Nagar Phase 1-3	1	0	-1
JP Nagar Phase 4-5	1	0	-1
Bellandur, APR	3	1	-2
Bannerghatta	2	0	-2
Bommanahallı	7	2	-5
Manipal County	12	5	-7
Kudlu	55	28	-27
Bomannahalı - MicoLayout	90	50	-40
Grand Total	1606	4231	2625

Insights:

- 1. HSR Layout exhibits the highest absolute increase, indicating strong growth.
- 2. ITI Layout and Harlur also show significant growth, with a notable increase in monthly orders.

Observations:

- 1. Areas like Bellandur, Ecospace, and Domlur, EGL, exhibit a slight decrease in orders.
- 2. Kudlu and Bomannahalı - MicoLayout show a notable decrease in monthly orders.



➤ Delivery charges as a percentage of product amount at slot and month level.

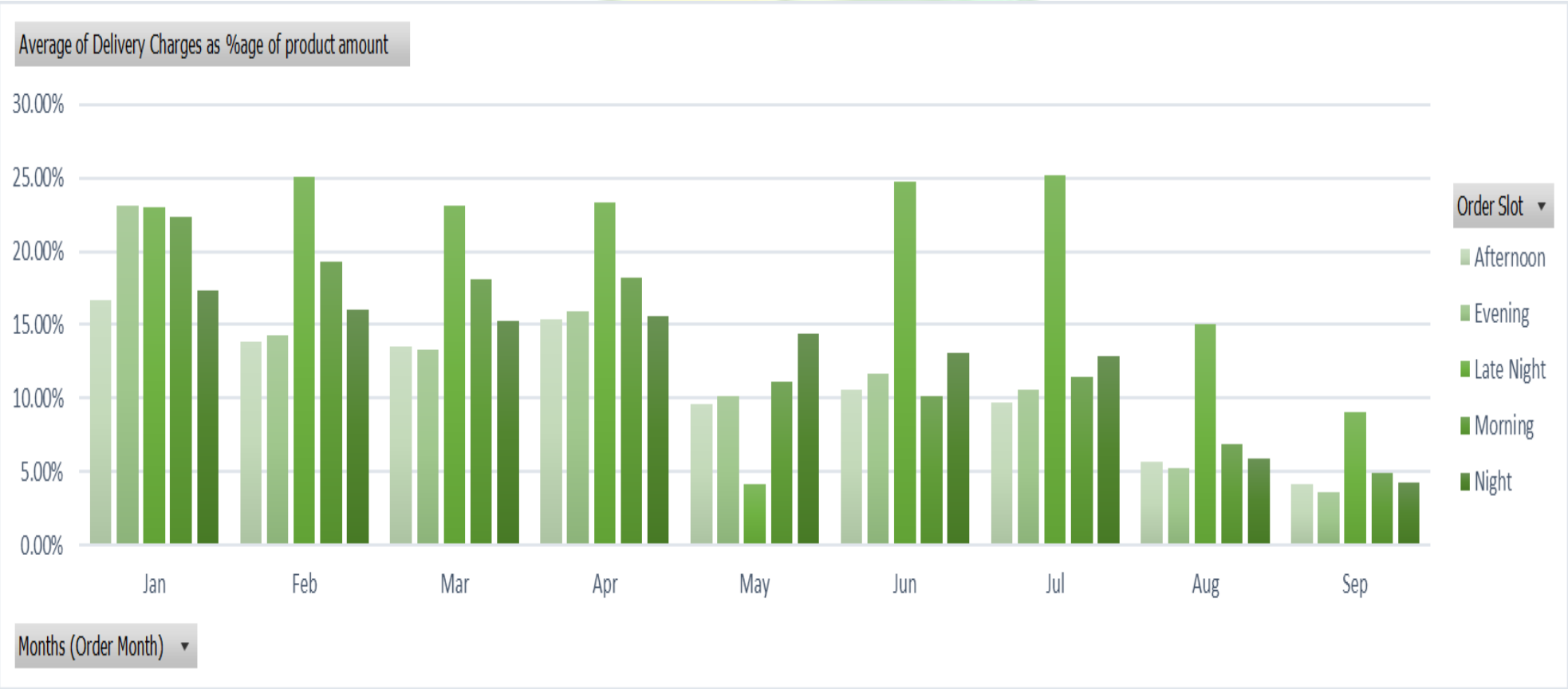
Average of Delivery Charges as %age of product amount	SLOT					
Month	Afternoon	Evening	Late Night	Morning	Night	Grand Total
Jan	16.68%	23.06%	22.96%	22.36%	17.39%	19.89%
Feb	13.82%	14.33%	25.02%	19.27%	16.06%	16.95%
Mar	13.57%	13.31%	23.08%	18.11%	15.25%	16.04%
Apr	15.35%	15.94%	23.32%	18.22%	15.60%	16.68%
May	9.62%	10.11%	4.12%	11.11%	14.44%	11.01%
Jun	10.57%	11.66%	24.77%	10.10%	13.06%	11.67%
Jul	9.68%	10.62%	25.13%	11.42%	12.89%	12.28%
Aug	5.69%	5.29%	15.05%	6.87%	5.87%	6.67%
Sep	4.13%	3.67%	9.05%	4.94%	4.28%	4.66%
Grand Total	10.03%	10.68%	19.72%	11.78%	11.81%	11.66%

Insights:

- 1. Late Night slots consistently have higher delivery charges as a percentage of the product amount.
- 2. August and September show lower percentages across all slots, indicating potentially lower delivery costs or promotions.

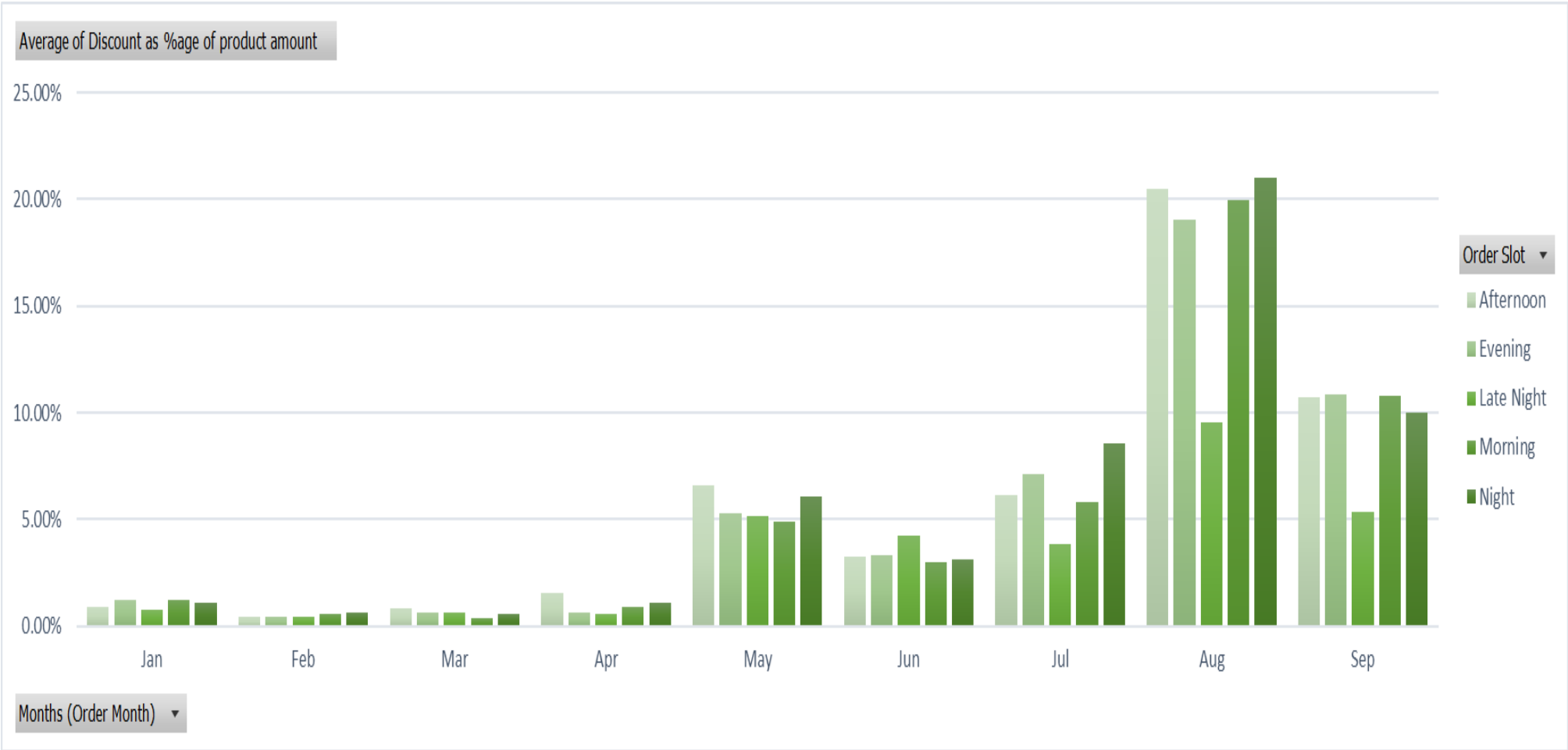
Observations:

- 1. Evening and Late-night slots consistently have higher delivery charges as a percentage of the product amount.
- 2. August and September show lower percentages across all slots, indicating potential promotions or cost adjustments.



➤ Discount as a percentage of product amount at slot and month level.

Average of Discount as %age of product amount	SLOT					
Month	Afternoon	Evening	Late Night	Morning	Night	Grand Total
Jan	0.87%	1.23%	0.77%	1.18%	1.06%	1.04%
Feb	0.42%	0.41%	0.41%	0.59%	0.61%	0.50%
Mar	0.83%	0.61%	0.60%	0.38%	0.54%	0.60%
Apr	1.58%	0.63%	0.57%	0.88%	1.10%	1.05%
May	6.61%	5.30%	5.12%	4.90%	6.08%	5.74%
Jun	3.28%	3.29%	4.21%	2.98%	3.09%	3.20%
Jul	6.11%	7.12%	3.86%	5.83%	8.53%	6.68%
Aug	20.46%	19.04%	9.51%	19.97%	21.02%	19.34%
Sep	10.71%	10.86%	5.32%	10.75%	10.02%	10.21%
Grand Total	6.75%	6.41%	3.40%	6.59%	6.71%	6.40%



Insights:

- 1. August has significantly higher discounts across all slots compared to other months.
- 2. Afternoon and Night slots show higher average discounts.

Observations:

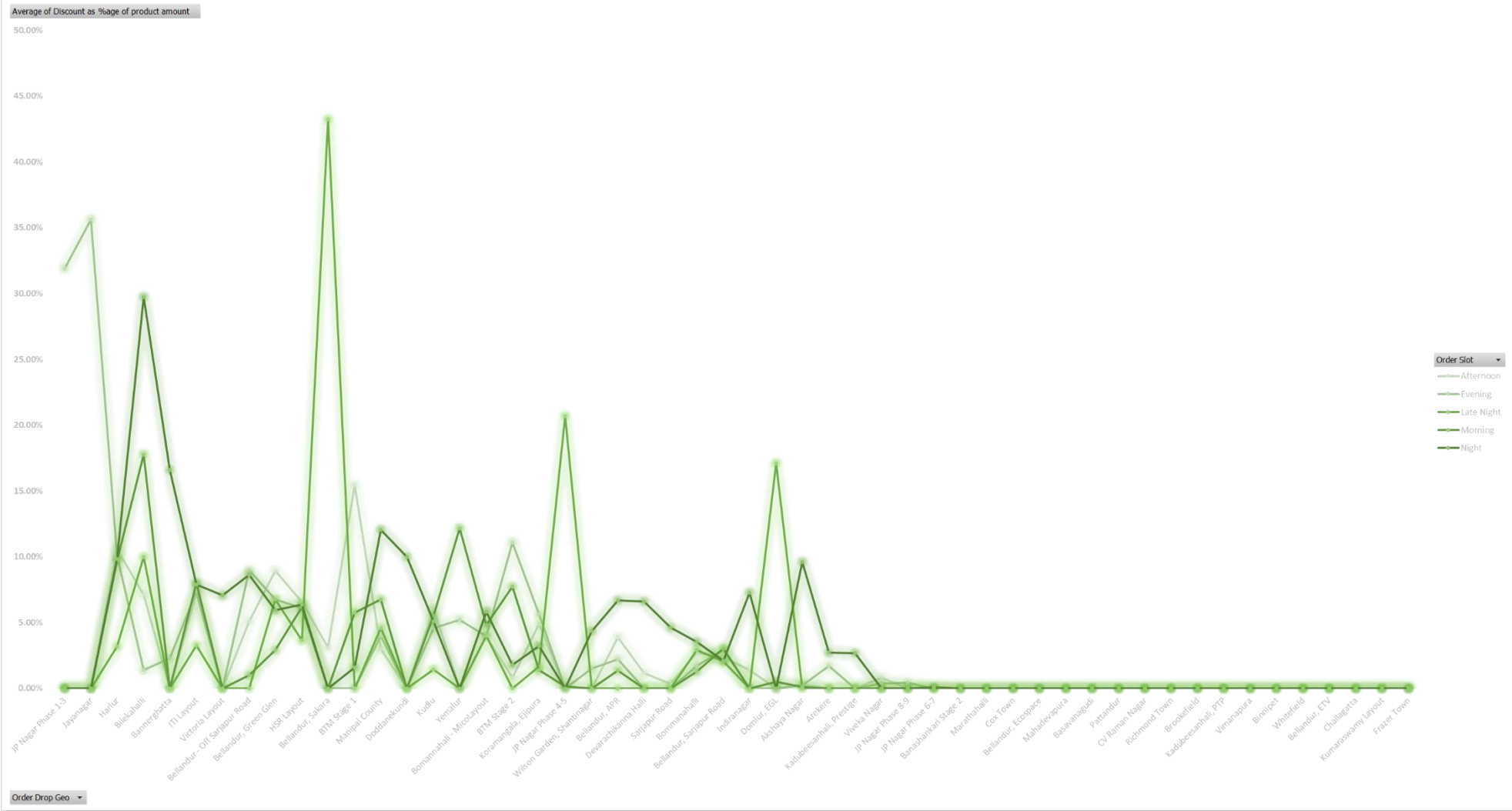
- 1. August has notably higher discounts in all slots.



## ➤ Discount as a percentage of product amount at drop area and slot level.

Average of Discount as %age of product amount	SLOT ▾					
Drop Area ▾	Afternoon	Evening	Late Night	Morning	Night	Grand Total
JP Nagar Phase 1-3		31.94%	0.00%	0.00%	0.00%	12.77%
Jayanagar	0.00%	35.61%		0.00%		11.87%
Harlur	10.58%	10.06%	3.19%	9.72%	9.83%	9.66%
Bilekahalli	7.11%	1.40%	10.00%	17.76%	29.73%	8.77%
Bannerghatta		2.30%		0.00%	16.61%	7.56%
ITI Layout	7.20%	7.39%	3.27%	7.99%	7.89%	7.23%
Victoria Layout					7.07%	7.07%
Bellandur - Off Sarjapur Road	5.10%	9.00%	0.00%	0.99%	8.62%	6.39%
Bellandur, Green Glen	8.94%	6.75%	6.77%	2.92%	5.93%	6.28%
HSR Layout	6.57%	6.10%	3.64%	6.18%	6.38%	6.15%
Bellandur, Sakara	3.12%	0.00%	43.23%		0.00%	5.92%
BTM Stage 1	15.43%	0.00%	0.00%	5.75%	1.58%	5.84%
Manipal County	2.97%	4.00%	4.58%	6.76%	12.03%	5.76%
Doddanekundi			0.00%		10.00%	5.00%
Kudlu	6.01%	4.58%	1.44%	5.51%	5.07%	4.90%
Yemalur	0.00%	5.19%		12.18%	0.00%	4.71%
Bomannahali - MicoLayout	3.96%	3.96%	3.99%	4.83%	5.84%	4.60%
BTM Stage 2	0.80%	11.09%	0.00%	7.72%	1.77%	4.36%
Koramangala, Ejipura	4.91%	5.64%	1.68%	1.39%	3.24%	3.40%
JP Nagar Phase 4-5	0.00%	0.00%	20.67%	0.16%	0.00%	3.00%
Wilson Garden, Shantinagar		1.49%			4.35%	2.92%
Bellandur, APR	3.89%	2.21%		1.34%	6.67%	2.65%
Devarachikanna Halli	1.16%	0.00%	0.00%		6.59%	2.62%
Sarjapur Road	0.35%	0.00%	0.00%		4.62%	2.41%
Bommanahalli	2.73%	1.72%	2.92%	1.28%	3.55%	2.38%
Bellandur, Sarjapur Road	2.35%	2.96%	2.07%	3.04%	2.09%	2.36%
Indiranagar	1.39%		0.00%	0.00%	7.25%	2.33%
Domlur, EGL	0.00%		17.09%	0.51%	0.00%	2.33%
Akshaya Nagar	0.31%	0.23%	0.00%	0.11%	9.61%	1.95%
Arekere	0.00%	1.69%	0.00%		2.71%	1.19%
Kadubeesanahali, Prestige	0.00%		0.00%		2.67%	0.59%
Viveka Nagar	0.82%	0.38%	0.00%			0.58%
JP Nagar Phase 8-9		0.41%				0.41%
JP Nagar Phase 6-7	0.00%		0.00%	0.13%		0.04%
Banashankari Stage 2		0.00%			0.00%	0.00%
Marathahalli		0.00%		0.00%	0.00%	0.00%
Cox Town				0.00%		0.00%
Bellandur, Ecospace			0.00%			0.00%
Mahadevapura				0.00%		0.00%
Basavanagudi		0.00%			0.00%	0.00%
Pattandur	0.00%					0.00%
CV Raman Nagar			0.00%			0.00%
Richmond Town	0.00%					0.00%
Brookefield			0.00%			0.00%
Kadubeesanahali, PTP					0.00%	0.00%
Vimanapura	0.00%					0.00%
Binnipet				0.00%		0.00%
Whitefield		0.00%				0.00%
Bellandur, ETV				0.00%	0.00%	0.00%
Challagatta			0.00%			0.00%
Kumaraswamy Layout	0.00%	0.00%		0.00%	0.00%	0.00%
Frazer Town			0.00%			0.00%
<b>Grand Total</b>	<b>6.75%</b>	<b>6.41%</b>	<b>3.40%</b>	<b>6.59%</b>	<b>6.71%</b>	<b>6.40%</b>





Insights:

- 1. Jayanagar and JP Nagar Phase 1-3 show high average discounts, particularly during the Evening slot.
- 2. Harlur exhibits consistent discounts across various time slots.
- 3. Night slots tend to have higher average discounts.

Observations:

- 1. Jayanagar and JP Nagar Phase 1-3 consistently show high discounts, especially during the Evening slot.
- 2. Bilekahalli and Harlur demonstrate varying discounts across different time slots.
- 3. Night slots consistently exhibit higher average discounts across various drop areas.

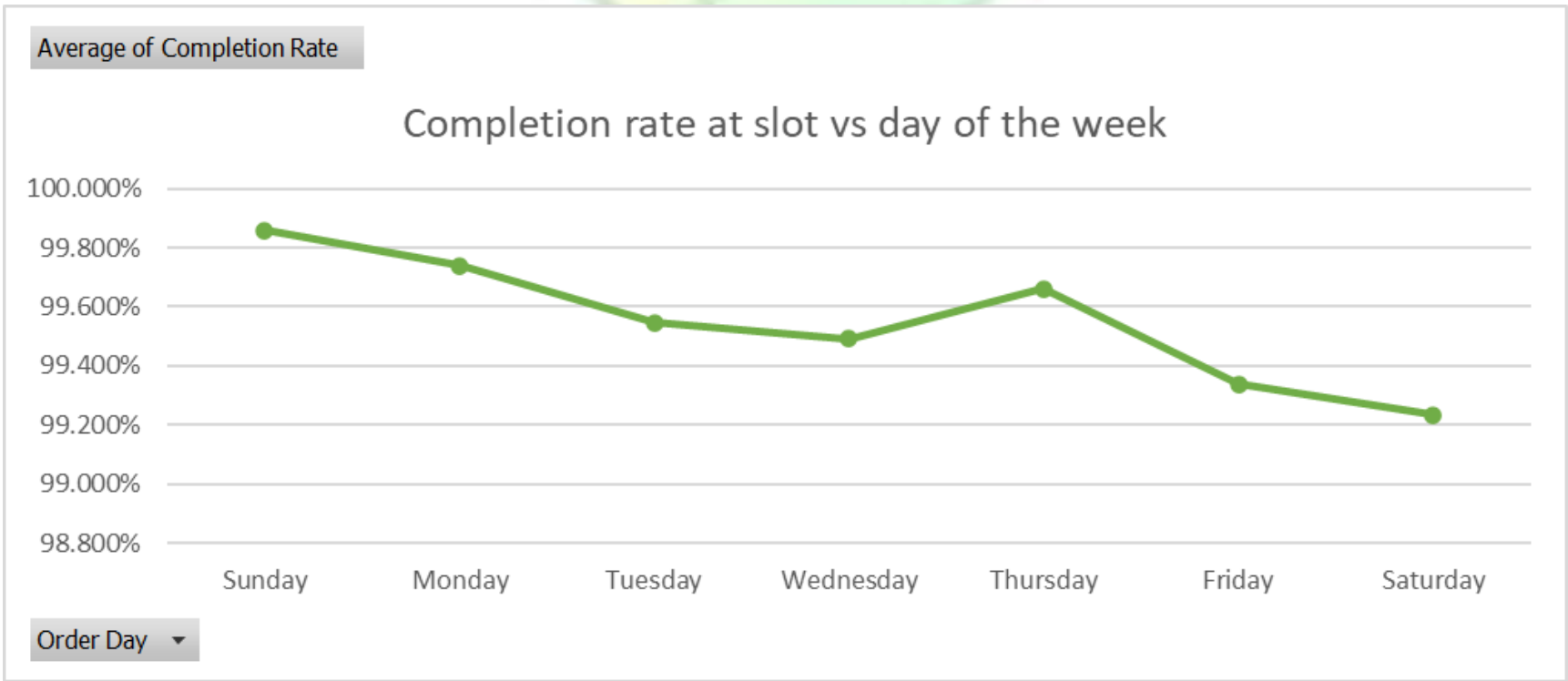
## Completion Rate Analysis

➤ Completion rate at slot vs day of the week (**Sunday to Saturday**) level.

**Trend in the data:** The completion rate is highest on Sundays and decreases as the week progresses, reaching its lowest on Saturdays.

Total Order Placed	22823
Completion Flag - YES	22721
Completion Flag - NO	102
Completion Rate	99.553%

Order Day	Average of Completion Rate
Sunday	99.858%
Monday	99.740%
Tuesday	99.547%
Wednesday	99.493%
Thursday	99.662%
Friday	99.339%
Saturday	99.235%
Grand Total	99.553%



**Insights:**

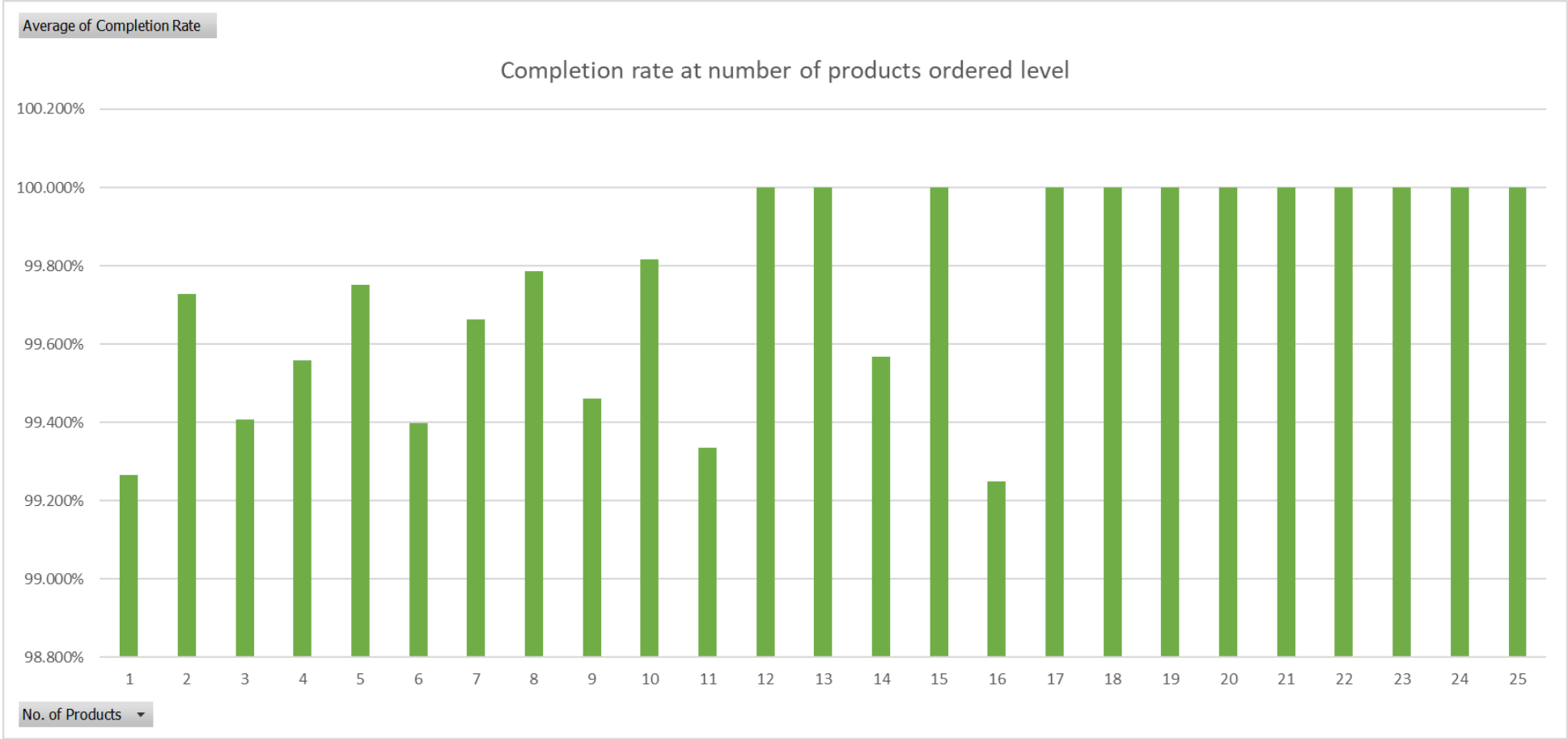
- 1. Completion rates are highest on Sundays and gradually decrease throughout the week.
- 2. Saturdays exhibit the lowest completion rate among the weekdays.
- 3. The overall grand total completion rate is 99.553%.

**Observation:** Completion rates follow a weekly pattern:

- Peak on Sundays.
- Decline through the week, hitting the lowest on Saturdays.
- Mondays have consistently high rates, while Fridays and Saturdays pose challenges.

➤ Completion rate at number of products ordered level.

No. of Products Ordered	Average of Completion Rate
1	99.266%
2	99.728%
3	99.408%
4	99.557%
5	99.752%
6	99.397%
7	99.662%
8	99.785%
9	99.461%
10	99.817%
11	99.335%
12	100.000%
13	100.000%
14	99.567%
15	100.000%
16	99.248%
17	100.000%
18	100.000%
19	100.000%
20	100.000%
21	100.000%
22	100.000%
23	100.000%
24	100.000%
25	100.000%
Grand Total	99.553%

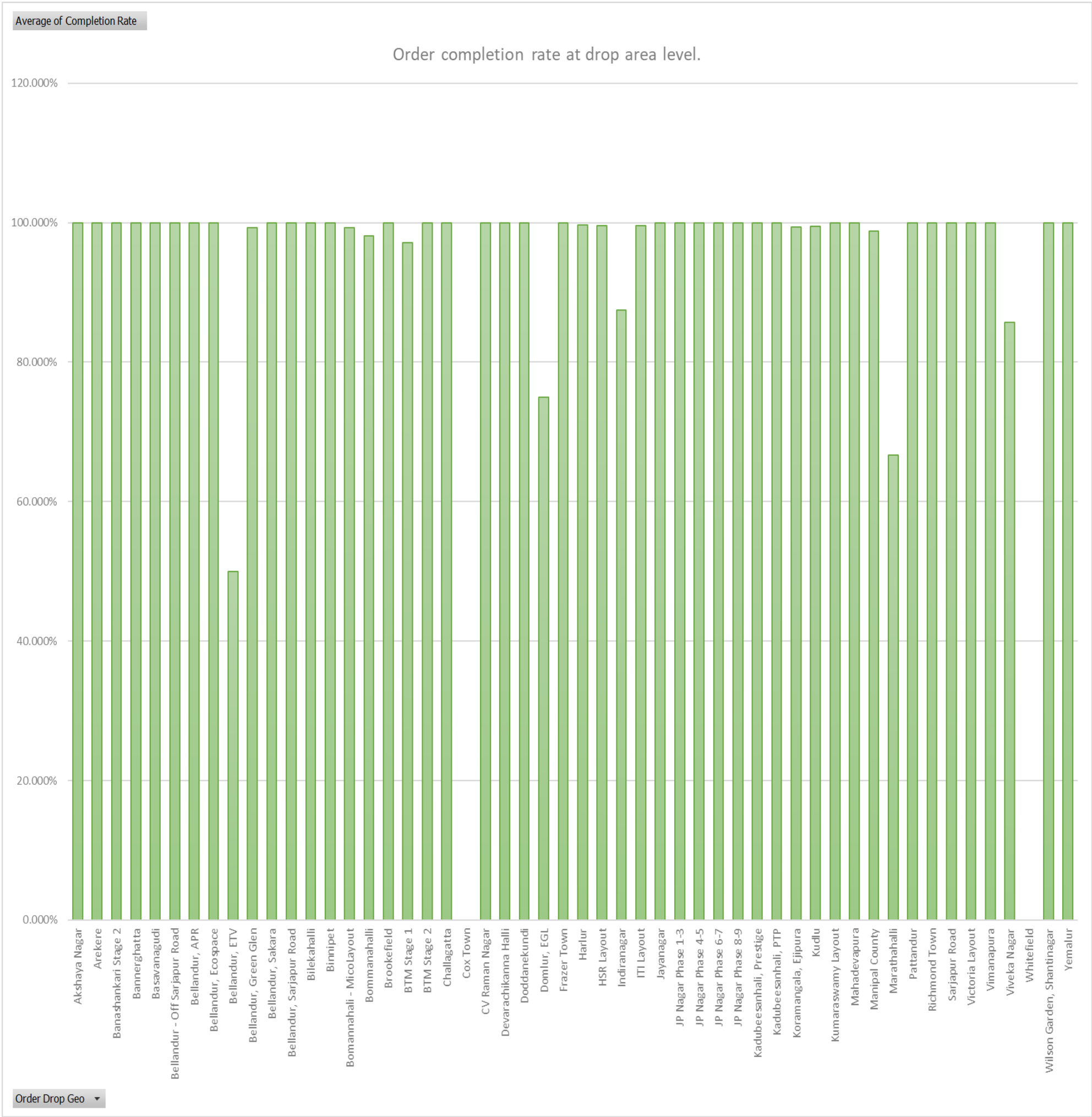


**Observations:**

1. Completion rates are consistently high across all levels of the number of products ordered.
2. Orders with 12, 13, 15, 17, 18, 19, 20, 21, 22, 23, 24, and 25 products have a perfect completion rate of 100%.
3. The overall grand total completion rate is 99.553%.

➤ Completion rate at drop area level.

Area	Average of Completion Rate
Whitefield	0.000%
Cox Town	0.000%
Bellandur, ETV	50.000%
Marathahalli	66.667%
Domlur, EGL	75.000%
Viveka Nagar	85.714%
Indiranagar	87.500%
BTM Stage 1	97.143%
Bommanahalli	98.077%
Manipal County	98.750%
Bellandur, Green Glen	99.254%
Bomannahali - MicoLayout	99.274%
Koramangala, Ejipura	99.375%
Kudlu	99.421%
ITI Layout	99.595%
HSR Layout	99.604%
Harlur	99.694%
Frazer Town	100.000%
JP Nagar Phase 8-9	100.000%
Kadubeesanhali, Prestige	100.000%
Challagatta	100.000%
Kadubeesanhali, PTP	100.000%
CV Raman Nagar	100.000%
Bilekahalli	100.000%
Doddanekundi	100.000%
Binnipet	100.000%
Akshaya Nagar	100.000%
Kumaraswamy Layout	100.000%
Banashankari Stage 2	100.000%
Mahadevapura	100.000%
Bellandur, Sarjapur Road	100.000%
Bannerghatta	100.000%
JP Nagar Phase 1-3	100.000%
Basavanagudi	100.000%
JP Nagar Phase 6-7	100.000%
Pattandur	100.000%
Bellandur, APR	100.000%
Richmond Town	100.000%
Bellandur, Ecospace	100.000%
Sarjapur Road	100.000%
Bellandur, Sakara	100.000%
Victoria Layout	100.000%
JP Nagar Phase 4-5	100.000%
Vimanapura	100.000%
Devarachikanna Halli	100.000%
Brookefield	100.000%
Jayanagar	100.000%
Bellandur - Off Sarjapur Road	100.000%
Arekere	100.000%
Wilson Garden, Shantinagar	100.000%
BTM Stage 2	100.000%
Yemalur	100.000%
Grand Total	99.553%



Insights:

- 1. Several areas demonstrate outstanding completion rates, achieving a perfect score of 100%.
- 2. Consistent performance across diverse areas suggests a well-optimized delivery process.

Observation:

- 1. Drop areas such as Whitefield and Cox Town have a 0% completion rate, indicating challenges in completing orders in these areas.
- 2. Some areas, including Marathahalli, Domlur, EGL, and Viveka Nagar, exhibit relatively higher completion rates, showing efficient order fulfilment.
- 3. A majority of areas, including HSR Layout, Harlur, and Bellandur, have completion rates exceeding 99%, reflecting effective order handling.


➤ Analysis on the pattern observed in the completion rate.

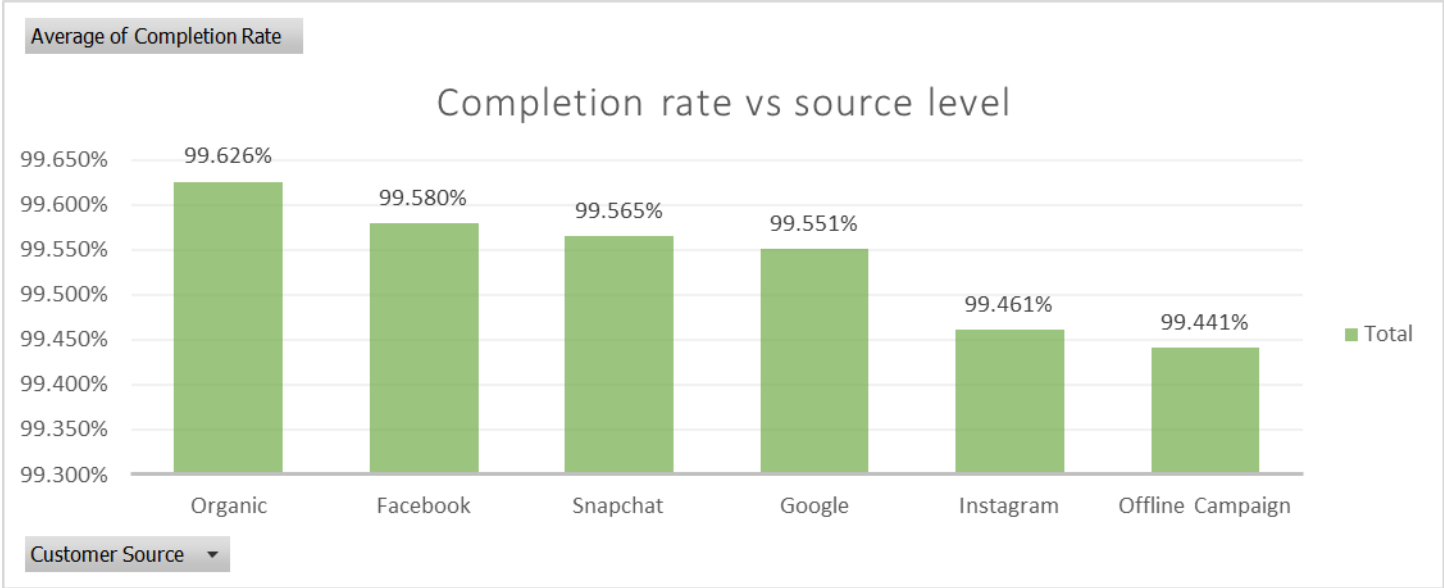
- 1. **Successful Delivery Rate:** Almost all orders, around 99.553%, got delivered successfully.
- 2. **Completion Rate by Day:** We noticed a trend – Sundays have the best completion rates, while Saturdays see the lowest
- 3. **Low Completion Rate in Some Areas:** In 7 out of 52 areas, less than 90% of orders get completed.
- 4. **Cancellation Rate for Small Orders:** Orders with less than 10 items have more cancellations.
- 5. **Overall Cancellation Rate:** Only about 0.447 % of all orders ended up getting cancelled.





➤ Completion rate at source level.

Customer Source 	Average of Completion Rate
Organic	99.626%
Facebook	99.580%
Snapchat	99.565%
Google	99.551%
Instagram	99.461%
Offline Campaign	99.441%
Grand Total	99.553%




**Observations:**

- 1. Completion rates are consistently high across all customer sources.
- 2. The average completion rate is slightly higher for customers sourced organically compared to other channels.

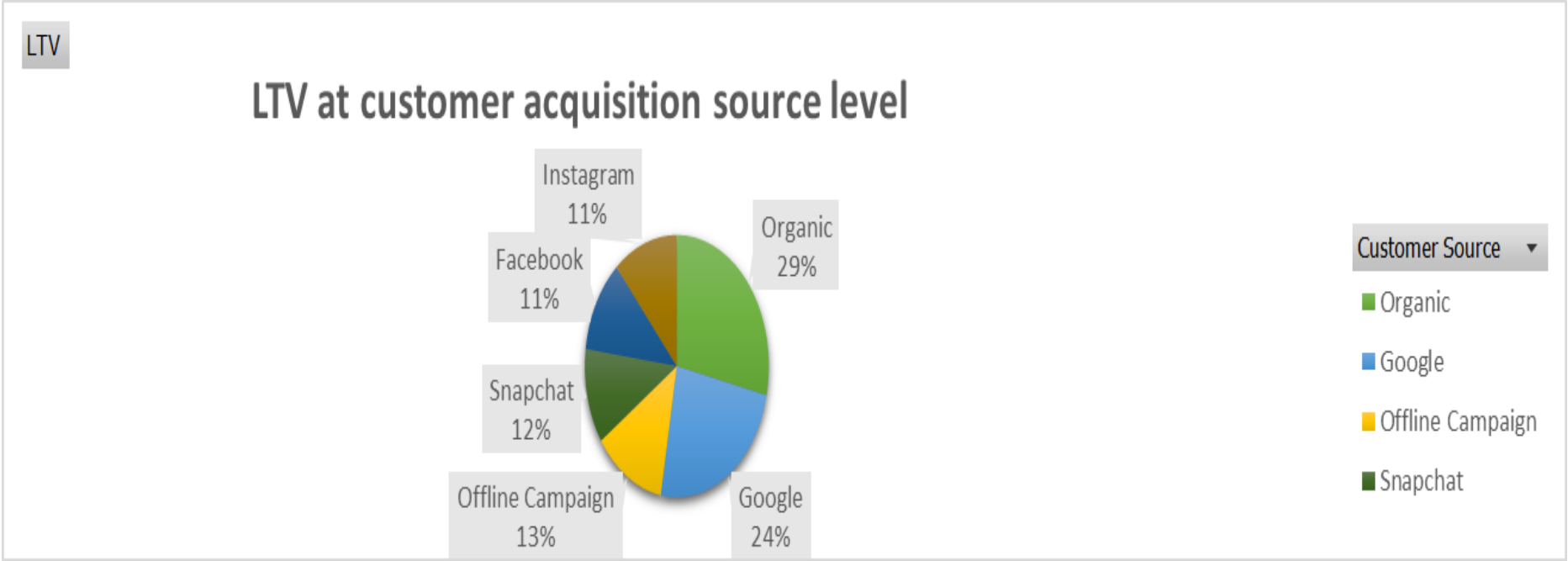
➤ LTV for every customer.

- LTV for each customer is calculated in Excel, and the detailed calculations are provided in the attached Excel file.
- Please refer to the file for a comprehensive view.
- As a quick reference, the top 10 customers based on LTV are listed below.

User ID 	LTV
APQ2413449	62,277
ZQB198457	53,913
XXV119663	44,898
FDO1013281	43,059
LQK77449	42,527
WDE1131845	39,625
GDF423244	39,338
VBS2518354	38,974
WWC812033	38,691
AFB1613116	38,123

➤ Aggregated LTV at customer acquisition source level

Customer Source	LTV
Organic	22,87,431
Google	19,39,010
Offline Campaign	10,08,411
Snapchat	9,36,767
Facebook	9,21,851
Instagram	9,11,379
Grand Total	80,04,849

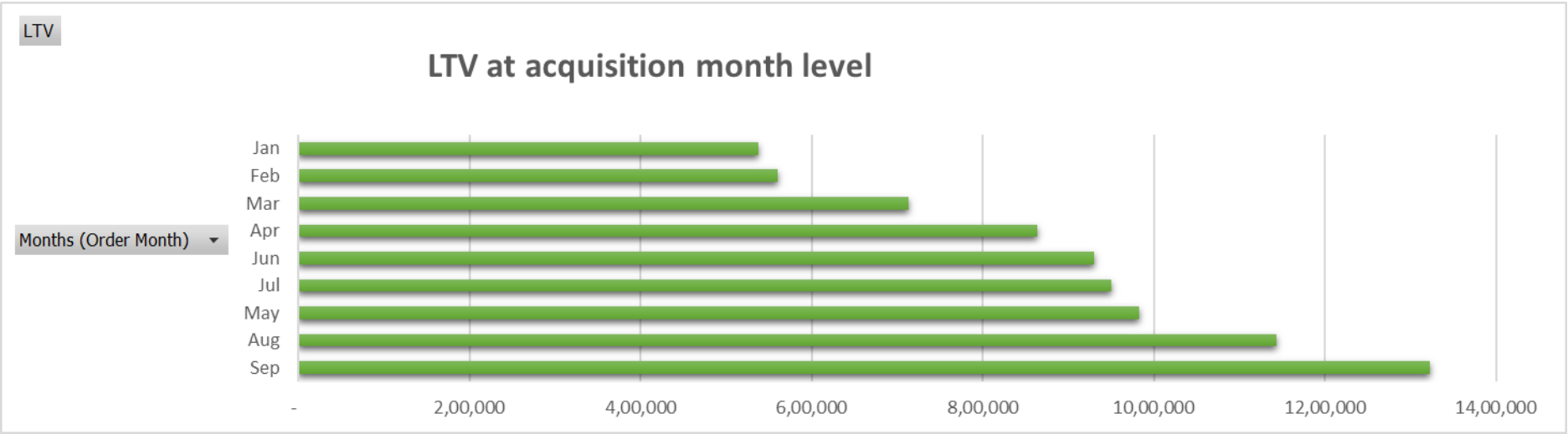


**Observations:**

1. The highest aggregated LTV is observed from the "Organic" customer acquisition source, contributing significantly to the total.
2. "Google" and "Offline Campaign" also make substantial contributions to the overall aggregated LTV.
3. "Facebook," "Instagram," and "Snapchat" show comparatively lower but still significant LTV figures.

➤ Aggregated LTV at acquisition month level.

Month	LTV
Sep	13,22,471
Aug	11,43,759
May	9,83,096
Jul	9,50,147
Jun	9,30,572
Apr	8,64,243
Mar	7,13,119
Feb	5,59,899
Jan	5,37,543
Grand Total	80,04,849



Insights:

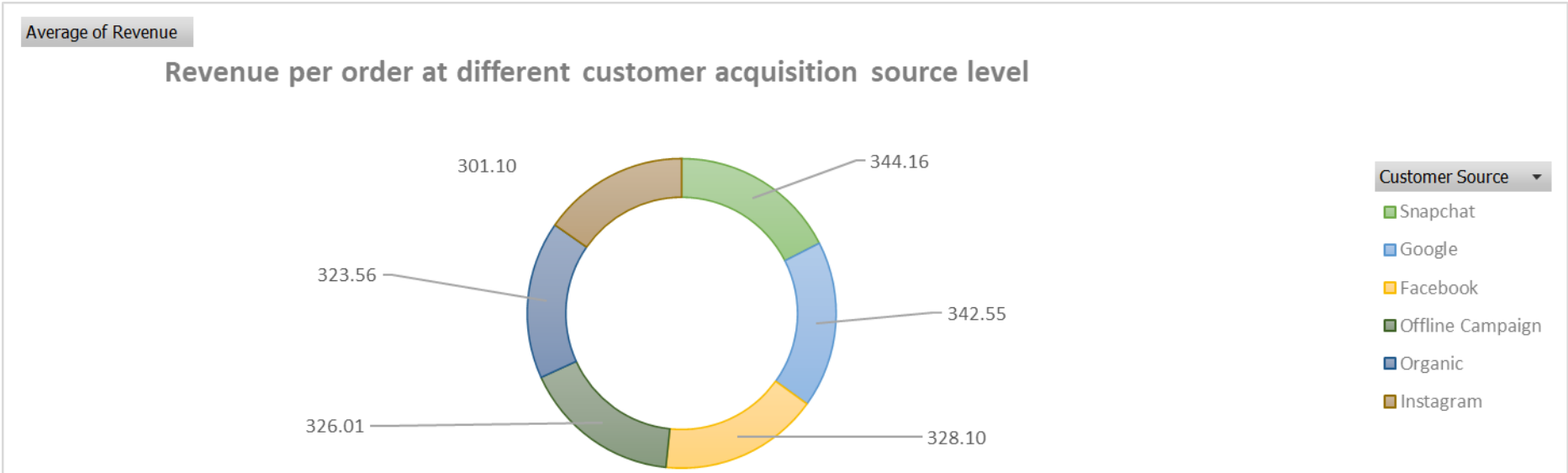
- Seasonal Variation:** The LTV gradually increases from January to September, suggesting potential seasonality or varying customer behaviour.
- Significant Growth:** Notable growth in LTV is observed from May onwards, with August and September contributing significantly to the overall aggregated LTV.

Observations:

- The months of May to September exhibit higher LTV, indicating potential effectiveness of marketing strategies during this period.
- Consider implementing targeted retention strategies during months with high LTV, such as August and September, to maximize customer value.

➤ **Average Revenue**(Product amount after discount) per order at different customer acquisition source level

Customer Source	Average of Revenue
Snapchat	344.16
Google	342.55
Facebook	328.10
Offline Campaign	326.01
Organic	323.56
Instagram	301.10



**Insights:**

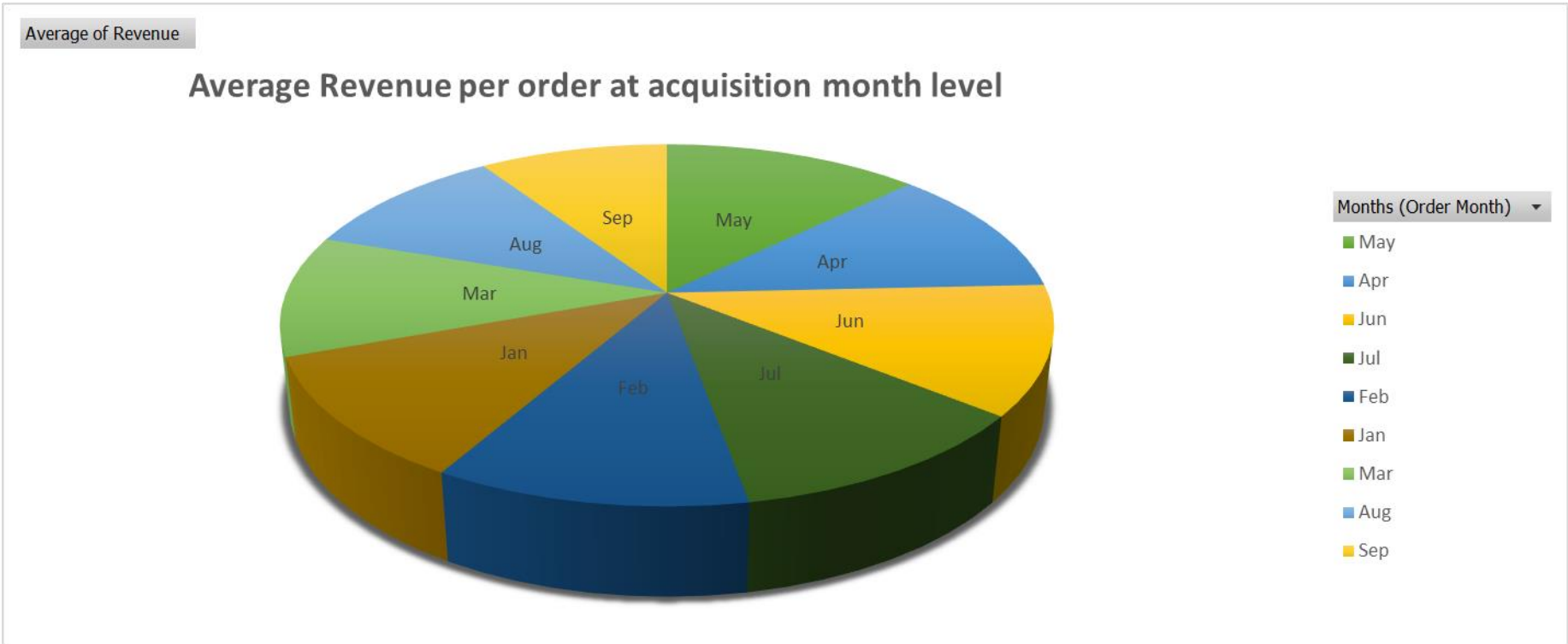
- 1. Uniformity in Revenue: The average revenue per order is relatively consistent across different customer acquisition sources.
- 2. Comparable Performance: Facebook, Offline Campaign, and Organic show similar average revenue figures.

**Observations:**

- 1. There is minimal variation in average revenue per order among different customer acquisition sources, suggesting a balanced performance.

➤ **Average Revenue(Product amount after discount) per order at acquisition month level**

Month	Average of Revenue
May	380.52
Apr	346.09
Jun	344.65
Jul	340.04
Feb	334.48
Jan	331.30
Mar	324.18
Aug	311.84
Sep	280.20
Average Revenue	328.38



**Insights:**

- 1. Seasonal Variations: The average revenue per order exhibits fluctuations throughout the months.
- 2. Peak in May: May shows the highest average revenue, indicating potential factors influencing customer spending during that period.

**Observations:**

- 1. Monthly Dynamics: Revenue patterns vary, suggesting the need to analyse external factors influencing customer behaviour each month.
- 2. May Spike: A notable spike in average revenue in May warrants investigation into promotions, events, or seasonal trends contributing to increased spending.

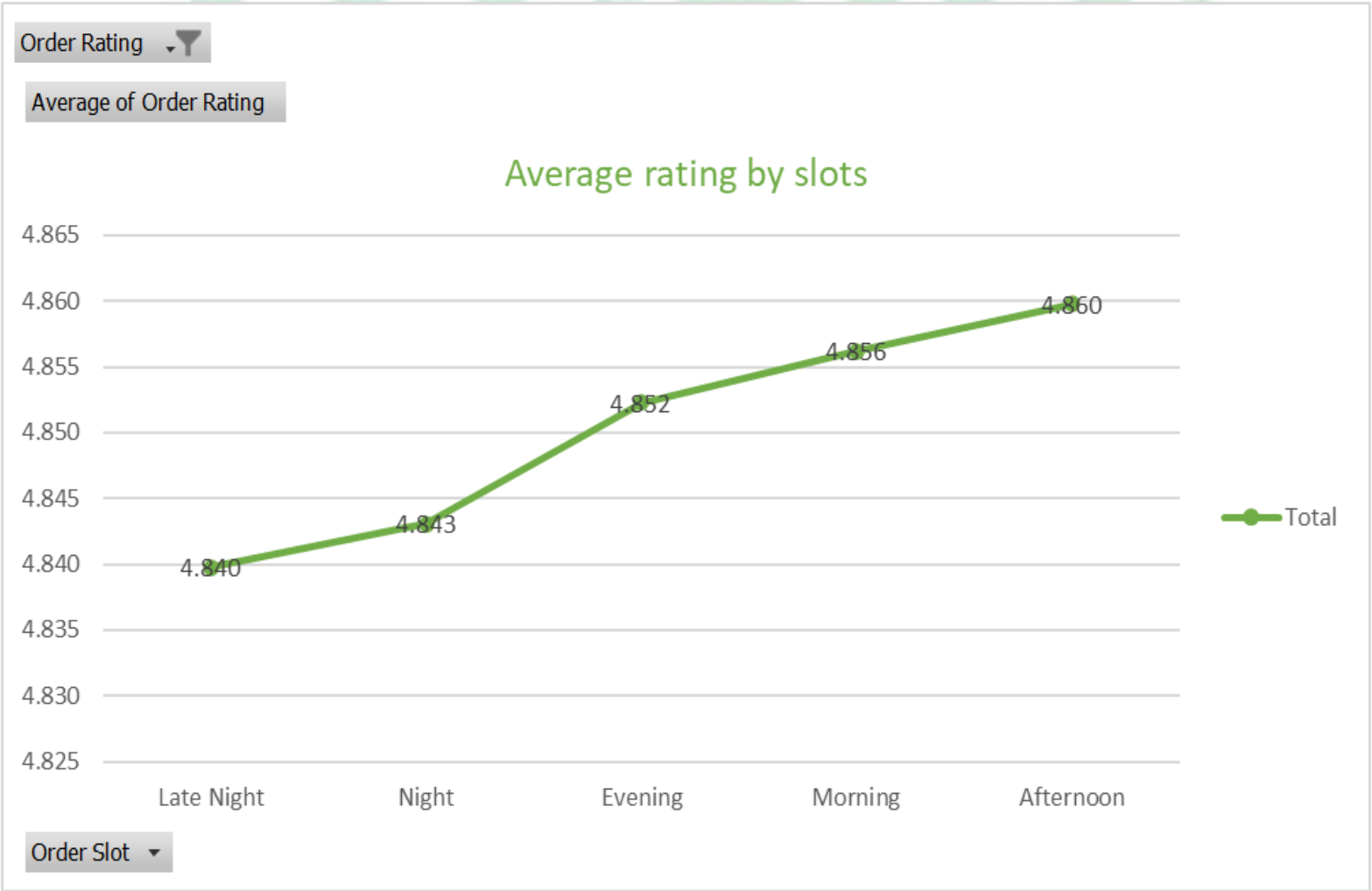
➤ Pattern in order rating across slots, number of items placed, delivery charges, discount.

➤ Note for below tables data: Customers who have not rated are not considered for the evaluation of average rating

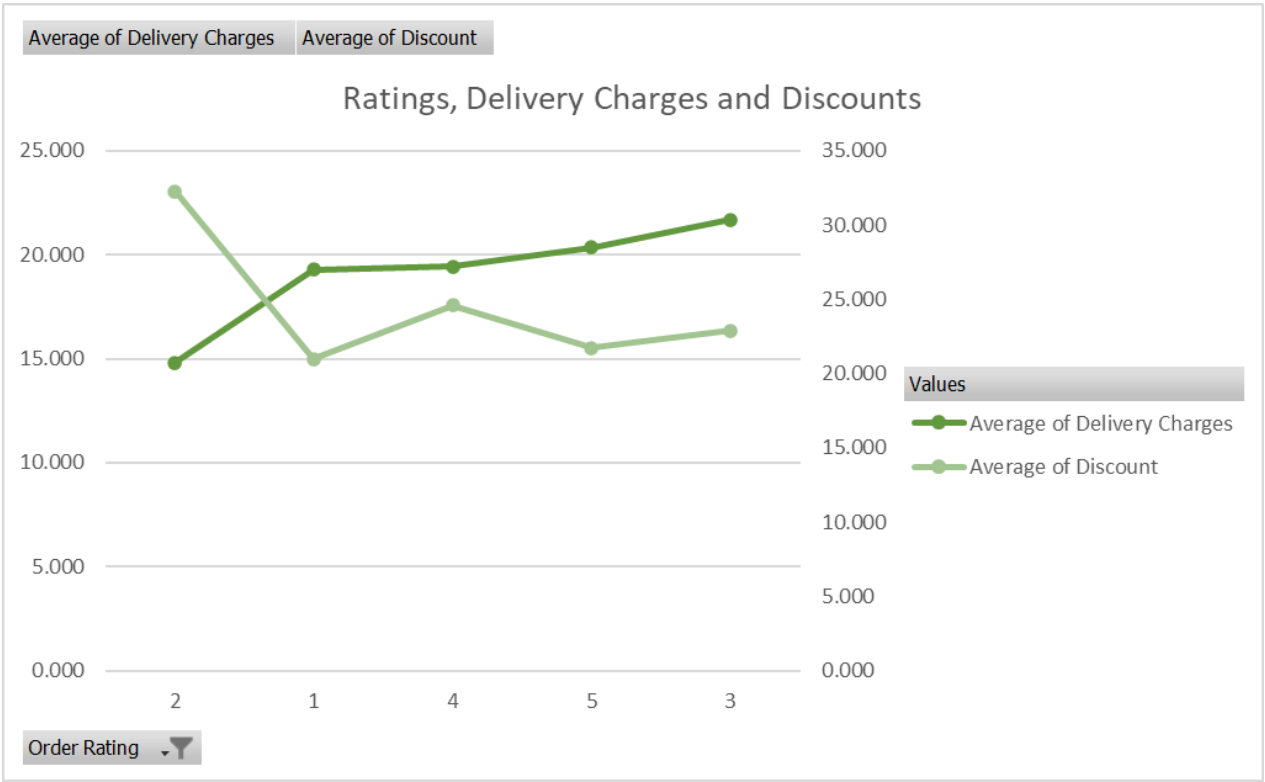
Order Rating	(Multiple Items)
Average rating by slots	
SLOT	Average of Order Rating
Late Night	4.840
Night	4.843
Evening	4.852
Morning	4.856
Afternoon	4.860
Grand Total	4.852

Ratings, Delivery Charges and Discounts		
Ratings	Average of Delivery Charges	Average of Discount
2	14.795	32.260
1	19.292	20.994
4	19.425	24.571
5	20.345	21.720
3	21.673	22.883

Order Rating	(Multiple Items)
No of Products vs Average Rating	
Row Labels	Average of Order Rating
21	4.625
16	4.729
20	4.783
14	4.790
17	4.805
15	4.805
11	4.808
9	4.827
12	4.829
8	4.836
1	4.842
6	4.843
19	4.857
4	4.859
2	4.860
5	4.862
10	4.863
7	4.868
3	4.873
13	4.878
18	4.907
23	5.000
22	5.000
24	5.000
Grand Total	4.852







Insights:

1. Slot-wise Average Rating:

- Morning and Afternoon slots tend to have slightly higher average ratings.
- Late Night has the lowest average rating among the slots.

2. Delivery Charges and Discounts:

- Higher average ratings generally correspond with lower delivery charges and discounts.

Observations:

1. Slot Preferences:

- Customers might have specific expectations or experiences during certain slots, influencing their ratings.

2. Optimal Pricing Strategy:

- Lowering delivery charges and offering reasonable discounts could positively impact customer satisfaction, as reflected in higher ratings.

## Delivery Analysis

➤ Calculate average overall delivery time at month and delivery area level.

Average of Overall Delivery Time(in mins)	Month									
delivery area	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Grand Total
Mahadevapura					146.67					146.67
Brookefield							91.23			91.23
Vimanapura					75.47					75.47
Pattandur								71.20		71.20
CV Raman Nagar						63.95				63.95
Richmond Town					63.39					63.39
JP Nagar Phase 8-9						59.48				59.48
Domlur, EGL	37.42			43.60	97.26				35.17	59.05
Basavanagudi					57.82					57.82
Kumaraswamy Layout		53.63			58.43		57.55			57.01
Indiranagar				68.94	54.59	37.87	42.58			56.64
Jayanagar	56.08						53.03	53.97		54.36
Akshaya Nagar			54.93	49.20	62.20	50.32		104.62	36.64	54.26
Bannerghatta	52.85		40.18		60.65			57.13		52.73
JP Nagar Phase 4-5	37.77	56.18		45.48	55.93			52.70		51.42
JP Nagar Phase 6-7		49.12	32.38		53.78	44.97				47.97
Binnipet							46.50			46.50
JP Nagar Phase 1-3	32.82		59.63	38.65	57.42			41.32		45.97
Bellandur, Sakara			49.80	62.45	71.29	25.88	28.20	36.09	21.17	44.98
Frazer Town			44.82							44.82
Viveka Nagar				32.43	56.12	26.43	40.42			44.61
Bellandur, APR	49.51	42.08	43.56	52.73	34.45	40.34	45.68	46.63	41.53	44.24
Devarachikanna Halli	25.55	42.91	47.05	65.74		26.85			36.92	44.21
Kadubeesanhali, PTP					42.57					42.57
Victoria Layout									42.32	42.32
Kadubeesanhali, Prestige		35.82	27.53		63.52		47.13		21.02	42.26
Arekere	28.28			51.98	56.03	53.18			33.80	41.93
Marathahalli	32.62				49.78					41.20
Challagatta								41.13		41.13
Bommanahalli	32.06	24.96	33.75	40.80	64.17	29.67	35.92	39.32	23.28	40.64
Doddanekundi							38.62	42.13		40.38
Banashankari Stage 2						24.95	54.37			39.66
Wilson Garden, Shantinagar			37.63		33.63				43.60	39.62
Sarjapur Road	41.22			23.88	61.41	28.06	32.84		27.96	39.45
Manipal County	34.78	30.77	35.15	43.26	62.41	34.93	43.14	37.18	37.97	39.22
Bilekahalli	37.06		53.57		43.99		49.33	24.22	28.06	38.43
Bellandur - Off Sarjapur Road	35.29	15.27	35.95	40.92	51.62	29.98	32.16	28.08	30.48	36.67
Koramangala, Ejipura	26.75	25.61	26.24	44.73	54.42	30.91	28.26	27.71	22.81	36.51
Yemalur		33.73		37.35		27.30	42.38	39.01	34.70	36.21
BTM Stage 2	28.93	26.07	27.70	29.56	48.53	25.40	40.82	38.66	33.68	34.85
BTM Stage 1	30.04	31.30	36.68	36.18	39.92	26.00	45.43	31.18	23.46	34.40
Kudlu	29.37	29.03	30.79	37.73	55.26	29.99	29.23	32.16	25.38	34.35
Bellandur, Sarjapur Road	31.80	28.47	32.27	35.97	63.77	26.60	30.11	26.02	27.13	33.12
Bomannahali - MicoLayout	30.18	31.89	29.60	33.31	59.28	33.99	28.24	29.80	24.79	32.93
Harlur	30.42	26.50	27.12	33.84	60.12	27.71	26.61	34.90	29.53	31.88
Bellandur, Green Glen	28.43	27.85	32.18	35.76	50.92	27.13	26.62	31.07	25.20	31.42
Bellandur, ETV									29.62	29.62
ITI Layout	22.21	18.62	20.48	26.93	44.54	23.29	20.01	21.57	19.01	23.30
HSR Layout	19.85	17.71	18.66	26.49	42.07	21.29	18.24	20.39	17.39	22.48
Bellandur, Ecospace	21.32									21.32
Grand Total	22.10	19.39	20.37	27.93	44.56	22.91	19.83	22.70	19.66	24.26

Insights:

1. Month-wise Analysis:

- Highest average delivery time are observed in March.
- September has the lowest average delivery time.

2. Delivery Area Comparison:

- Significant variation in delivery times across different areas.
- Some areas consistently experience longer delivery times.

Observations:

1. Monthly Trends:

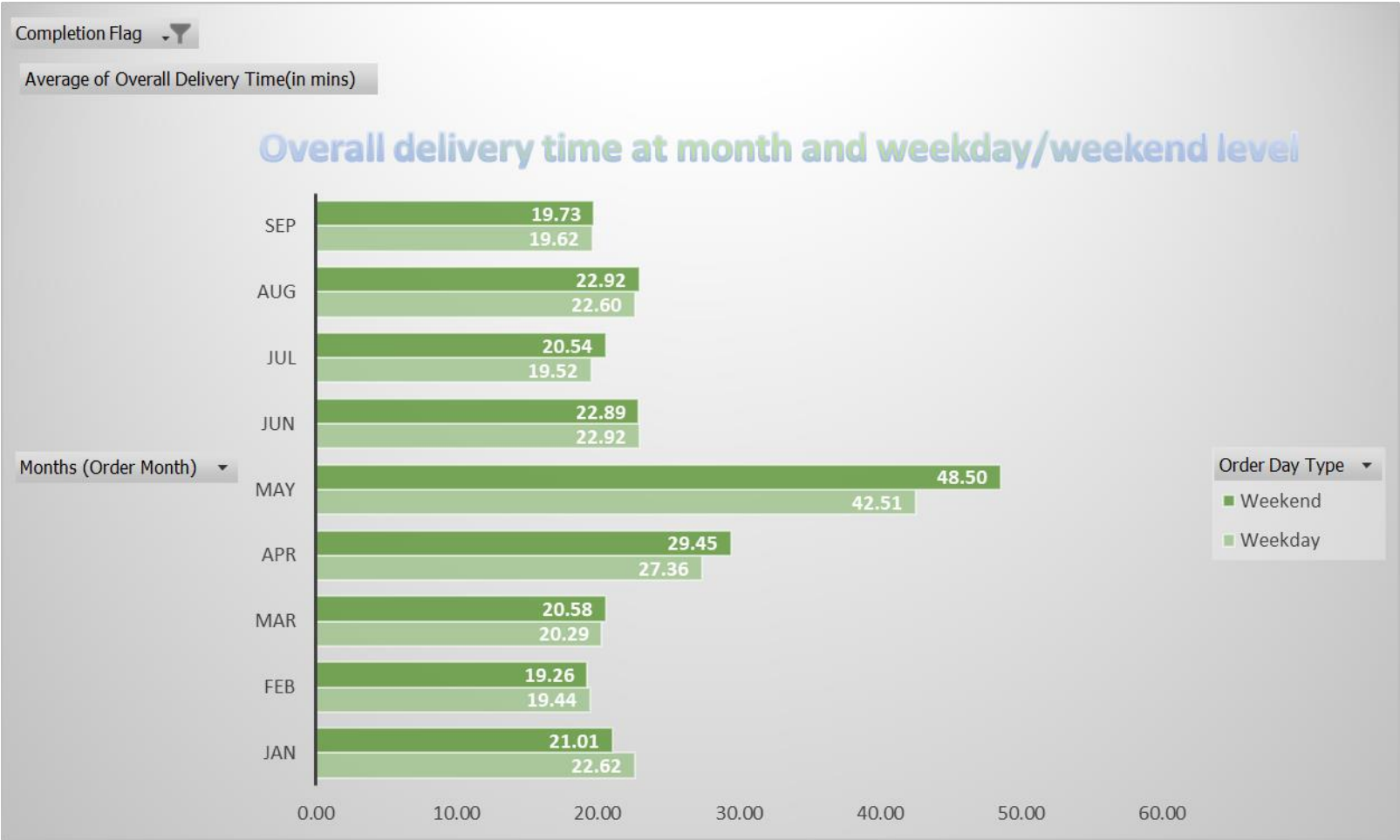
- Seasonal or demand-related factors may contribute to variations in delivery times.

2. Area-specific Challenges:

- Understanding factors influencing delivery times in specific areas can lead to targeted improvements.

➤ Average overall delivery time at month and weekday/weekend level

Completion Flag	YES		
Average of Overall	Order Day Type		
Month	Weekday	Weekend	Grand Total
Jan	22.62	21.01	22.10
Feb	19.44	19.26	19.39
Mar	20.29	20.58	20.37
Apr	27.36	29.45	27.93
May	42.51	48.50	44.56
Jun	22.92	22.89	22.91
Jul	19.52	20.54	19.83
Aug	22.60	22.92	22.70
Sep	19.62	19.73	19.66
Grand Total	23.82	25.26	24.26



Insights:

1. Month-wise Analysis:

- May has the highest average delivery time.
- September records the lowest average delivery time, reflecting improved efficiency.

2. Weekday vs. Weekend:

- Generally, weekdays have shorter delivery times compared to weekends across all months.

Observations:

1. Month-specific Challenges:

- May stands out with significantly higher delivery times.
- September shows positive results, indicating potential improvements in operational efficiency.

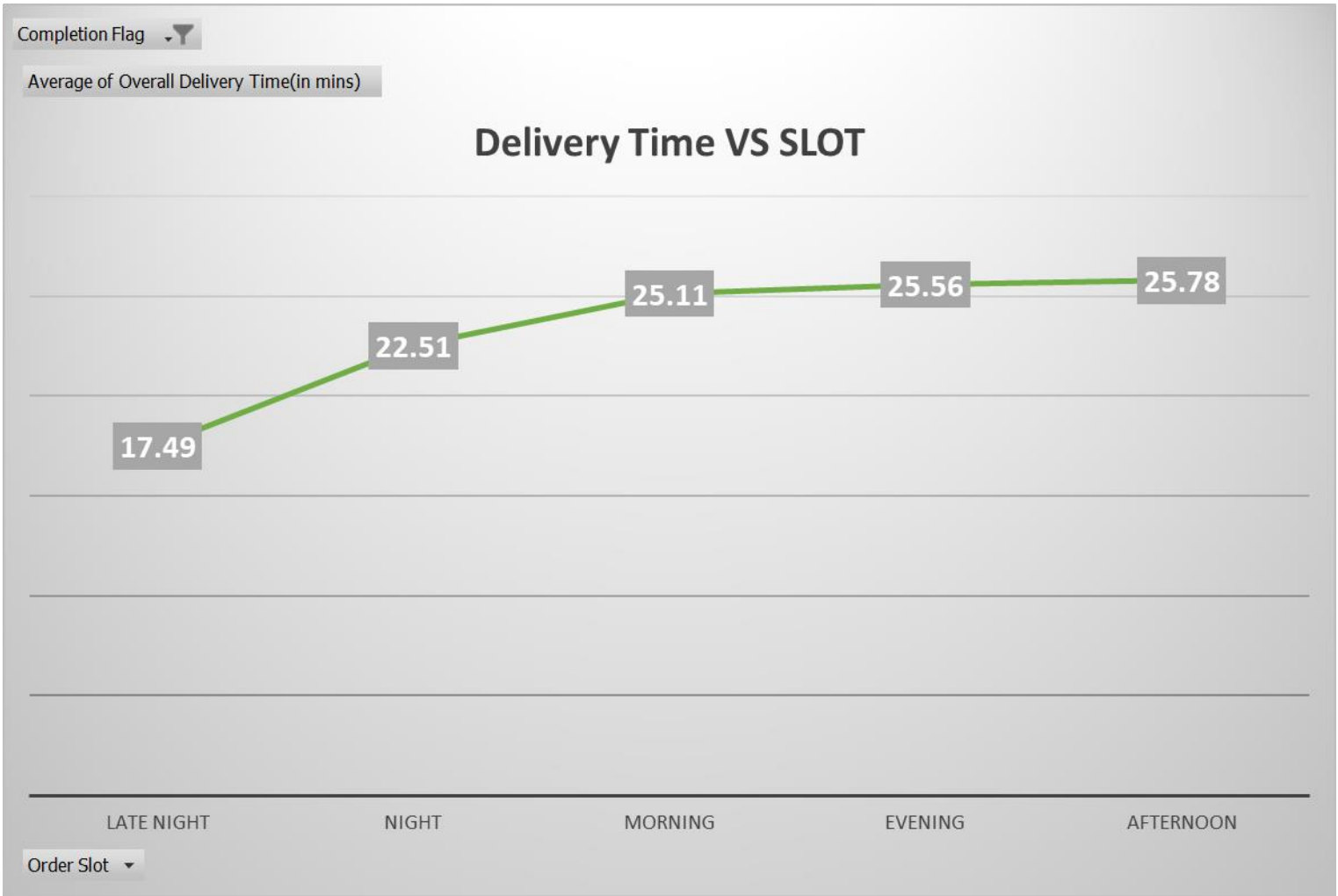
2. Weekday/Weekend Dynamics:

- Consistent longer delivery times on weekends highlight a pattern that could be due to increased demand or operational considerations.

➤ **Average overall delivery time at slot level.**

Completion Flag	YES
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Slot	Average of Overall Delivery Time(in mins)
Late Night	17.49
Night	22.51
Morning	25.11
Evening	25.56
Afternoon	25.78
Grand Total	24.26



**Insights:**

- Late Night has the shortest average delivery time, indicating efficient service during this slot.
- Afternoon records the longest average delivery time.

**Observations:**

- Efficient Late-Night Deliveries:** Late Night deliveries exhibit high efficiency, suggesting streamlined operations during this less congested time.
- Afternoon Challenges:**
  - Afternoon deliveries face challenges, possibly due to increased demand or operational bottlenecks.

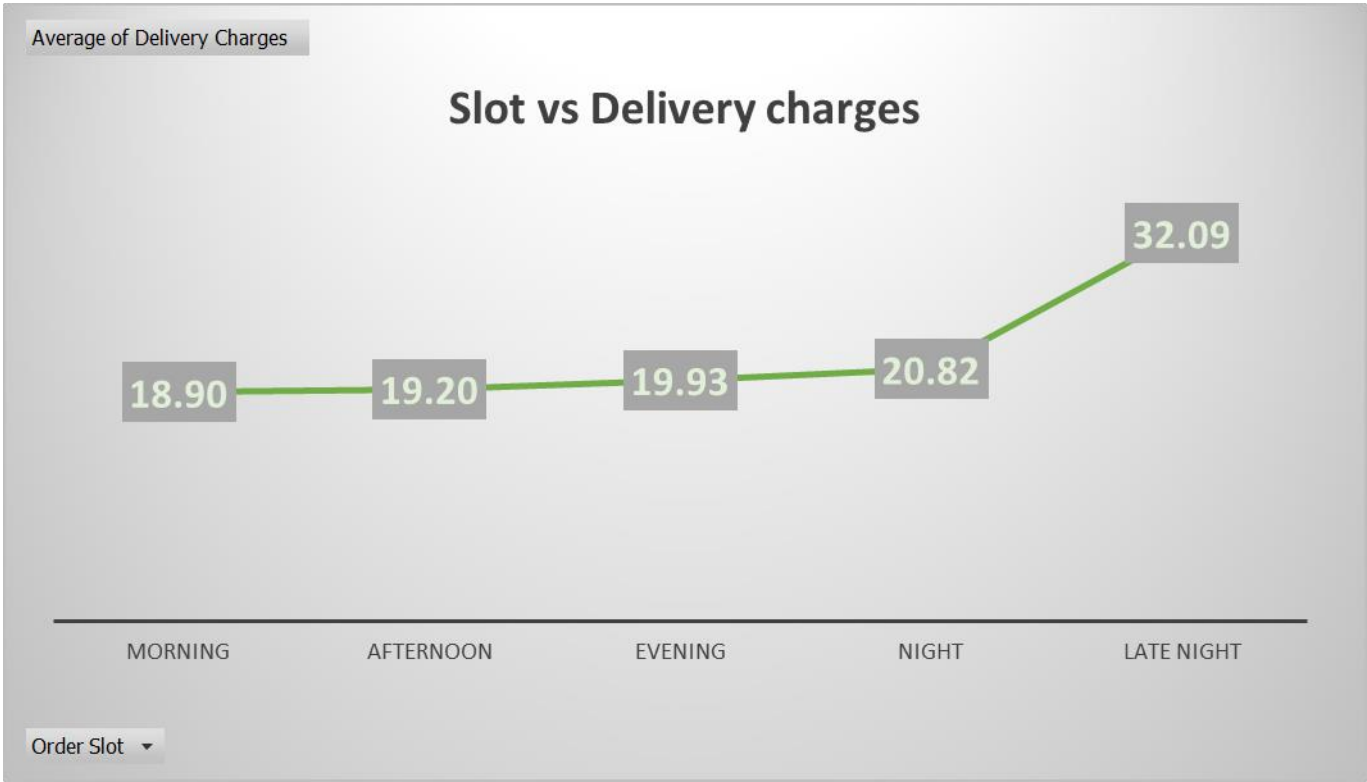
➤ Pattern in delivery charges with slot or delivery area.

Completion Flag	YES
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Area	Average of Delivery Charges
Brookefield	332.00
CV Raman Nagar	287.00
Frazer Town	259.00
Vimanapura	210.00
Doddanekundi	198.50
Mahadevapura	195.00
Pattandur	180.00
Marathahalli	175.00
Challagatta	172.00
Basavanagudi	155.00
Kumaraswamy Layout	146.25
Banashankari Stage 2	145.00
Indiranagar	142.00
Domlur, EGL	135.33
JP Nagar Phase 8-9	130.00
Arekere	127.00
JP Nagar Phase 6-7	126.50
Kadubeesanhali, Prestige	122.11
Kadubeesanhali, PTP	120.00
Akshaya Nagar	119.29
JP Nagar Phase 4-5	117.57
Bannerghatta	111.00
JP Nagar Phase 1-3	105.80
Bellandur, APR	102.41
Devarachikanna Halli	95.75
Wilson Garden, Shantinagar	95.00
Viveka Nagar	85.83
Richmond Town	82.50
Yemalur	77.86
Bilekahalli	77.18
Victoria Layout	75.00
BTM Stage 1	73.09
Bellandur, Sakara	70.27
Bellandur, Sarjapur Road	69.55
Sarjapur Road	69.05
Jayanagar	66.67
Manipal County	58.94
BTM Stage 2	55.88
Bellandur - Off Sarjapur Road	53.48
Bommanahalli	51.80
Koramangala, Ejipura	50.28
Bellandur, Ecospace	39.00
Bomannahali - MicoLayout	38.76
Bellandur, Green Glen	36.19
Kudlu	32.41
Harlur	20.45
HSR Layout	18.20
ITI Layout	16.66
Bellandur, ETV	0.00
Binnipet	0.00
Grand Total	20.64

SLOT	Average of Delivery Charges
Morning	18.90
Afternoon	19.20
Evening	19.93
Night	20.82
Late Night	32.09
Grand Total	20.55





**Insights:**

**1. Slot-wise Delivery Charges:**

- Late Night has the highest average delivery charges, possibly due to lower demand during this slot.
- Morning and Afternoon slots have relatively lower delivery charges.

**2. Delivery Area-wise Analysis:**

- Brookefield, CV Raman Nagar, and Frazer Town exhibit higher-than-average delivery charges.
- Areas like HSR Layout, ITI Layout, and Bellandur, ETV have lower-than-average delivery charges.

**Observations:**

**1. Slot-specific Pricing:**

- Late Night delivery charges may be higher, potentially reflecting increased operational costs during off-peak hours.

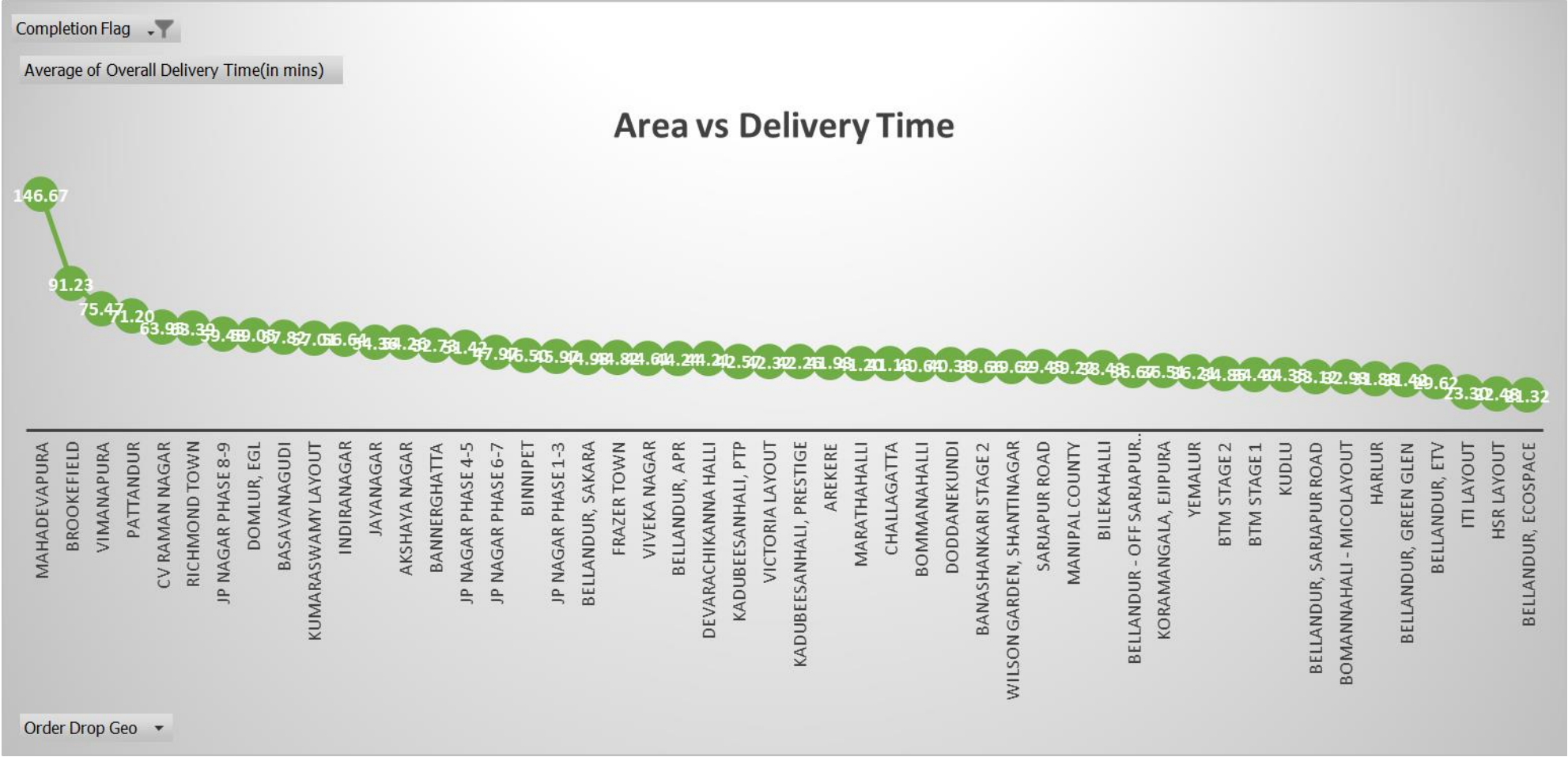
**2. Varied Area Dynamics:**

- Delivery charges vary across areas, indicating potential factors such as distance, demand, or operational considerations.
- Brookefield, CV Raman Nagar, and Frazer Town might have unique factors influencing higher charges.



➤ Pattern in delivery time and delivery area.

Area	Average of Overall Delivery Time(in mins)
Mahadevapura	146.67
Brookefield	91.23
Vimanapura	75.47
Pattandur	71.20
CV Raman Nagar	63.95
Richmond Town	63.39
JP Nagar Phase 8-9	59.48
Domlur, EGL	59.05
Basavanagudi	57.82
Kumaraswamy Layout	57.01
Indiranagar	56.64
Jayanagar	54.36
Akshaya Nagar	54.26
Bannerghatta	52.73
JP Nagar Phase 4-5	51.42
JP Nagar Phase 6-7	47.97
Binnipet	46.50
JP Nagar Phase 1-3	45.97
Bellandur, Sakara	44.98
Frazer Town	44.82
Viveka Nagar	44.61
Bellandur, APR	44.24
Devarachikanna Halli	44.21
Kadubeesanhali, PTP	42.57
Victoria Layout	42.32
Kadubeesanhali, Prestige	42.26
Arekere	41.93
Marathahalli	41.20
Challagatta	41.13
Bommanahalli	40.64
Doddanekundi	40.38
Banashankari Stage 2	39.66
Wilson Garden, Shantinagar	39.62
Sarjapur Road	39.45
Manipal County	39.22
Bilekahalli	38.43
Bellandur - Off Sarjapur Road	36.67
Koramangala, Ejipura	36.51
Yemalur	36.21
BTM Stage 2	34.85
BTM Stage 1	34.40
Kudlu	34.35
Bellandur, Sarjapur Road	33.12
Bomannahali - MicoLayout	32.93
Harlur	31.88
Bellandur, Green Glen	31.42
Bellandur, ETV	29.62
ITI Layout	23.30
HSR Layout	22.48
Bellandur, Ecospace	21.32
Grand Total	24.26



Insights:

1. Delivery Time Variation:

- Mahadevapura has the highest average delivery time, indicating longer delivery durations.
- Areas like Brookefield, Vimanapura, and Pattandur also experience relatively higher delivery times.

2. Reasons for Variation:

- Factors such as distance, traffic conditions, or order density could contribute to longer delivery times in specific areas.
- Urban or congested areas like Mahadevapura and Brookefield may experience slower delivery due to traffic.

Observations:

1. Traffic Impact:

- Urban areas like Mahadevapura, Brookefield, and Vimanapura with higher delivery times may be prone to traffic congestion.
- Areas with lower delivery times, such as ITI Layout or HSR Layout, might have better traffic conditions.

Thank You.