

SQL/Pandas Code for the YTD Function

EVALUATING YearToDay Revenue for a Manufacturing Company

The sales-based transaction table was connected with product lookup table via product_key

The sales-based transaction table was connected with the calendar lookup table using order_date and date keys

I had to generate cumulative increase in the revenue across month for each year for this firm.

1) Join Sales and Product tables to ascertain order_quantity and product_price for each order following calculate revenue amount generated for each order

2) Join this composite sales-product table to calendar lookup using order date to determine the date on which this order was placed.

Extracted year and month columns of the date and aggregated the sum of revenue on these two columns

Evaluated the cumulative sum of revenue across each month for every year and plotted the it for the entire sales data

Following plotted a similar field for different categories of products

Start of Month	YTDRevenue	Quantity Sold	TotalRevenue
01-07-2015	42,25,768.78	246	\$4,86,114.93
01-08-2015	47,66,221.55	277	\$5,36,452.77
01-09-2015	51,10,284.44	195	\$3,44,062.89
01-10-2015	55,14,561.09	222	\$4,04,276.65
01-11-2015	58,41,172.31	190	\$3,26,611.22
01-12-2015	64,04,933.98	325	\$5,63,761.67
01-01-2016	4,32,425.86	241	\$4,32,425.86
01-02-2016	9,06,588.80	266	\$4,74,162.94
01-03-2016	3,78,550.82	265	\$4,71,962.02
01-04-2016	13,73,508.40	289	\$4,94,957.58
01-05-2016	24,19,043.42	328	\$5,45,535.02
01-06-2016	29,52,868.63	311	\$5,33,825.21
01-07-2016	37,68,224.49	1953	\$8,15,355.86
01-08-2016	45,72,416.12	5957	\$8,04,191.63
01-09-2016	55,25,58.00	5969	\$9,52,741.88
01-10-2016	65,54,977.30	6386	\$10,29,619.30
01-11-2016	76,88,888.68	6331	\$11,33,911.38
01-12-2016	93,24,195.35	7922	\$16,35,306.67
01-01-2017	2,74,377.03	7019	\$12,74,377.03
01-02-2017	28,13,616.41	6827	\$13,39,239.38
01-03-2017	40,82,210.49	7326	\$14,48,594.08
01-04-2017	55,90,522.31	7679	\$15,27,611.82
01-05-2017	73,53,452.94	8198	\$17,68,430.63
01-06-2017	91,85,437.85	8259	\$18,26,984.91
Total	91,85,437.85	84173	\$2,49,14,567.18

