MARKETING ANALYSIS

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INTRODUCTION

As a Marketing Analyst tasked with evaluating the effectiveness of Sustainable Clothing Co.'s marketing campaigns, it's imperative to delve into the provided data to derive meaningful insights. By scrutinizing key metrics and performance indicators, we can ascertain the impact of their marketing efforts and offer actionable recommendations for future strategies. Let's examine the data closely to determine the success of Sustainable Clothing Co.'s recent campaigns.

TABLES

sustainable_clothing

Product ID	Product Name	Category	Size	Price
1	Organic Cotton T-Shirt	Tops	S	$29.99
2	Recycled Denim Jeans	Bottoms	M	$79.99
3	Hemp Crop Top	Tops	L	$24.99
4	Bamboo Lounge Pants	Bottoms	XS	$49.99
5	Eco-Friendly Hoodie	Outerwear	XL	$59.99
6	Linen Button-Down Shirt	Tops	M	$39.99
7	Organic Cotton Dress	Dresses	S	$69.99
8	Sustainable Swim Shorts	Swimwear	L	$34.99
9	Recycled Polyester Jacket	Outerwear	XL	$89.99
10	Bamboo Yoga Leggings	Activewear	XS	$54.99
11	Hemp Overalls	Bottoms	M	$74.99
12	Organic Cotton Sweater	Tops	L	$49.99
13	Cork Sandals	Footwear	S	$39.99
14	Recycled Nylon Backpack	Accessories	One Size	$59.99
15	Organic Cotton Skirt	Bottoms	XS	$34.99
16	Hemp Baseball Cap	Accessories	One Size	$24.99
17	Upcycled Denim Jacket	Outerwear	M	$79.99
18	Linen Jumpsuit	Dresses	L	$69.99
19	Organic Cotton Socks	Accessories	M	$9.99
20	Bamboo Bathrobe	Loungewear	XL	$69.99

transactions (first 10 shown)

transaction_id	product_id	quantity	purcahse_date
1	2	2	2023-06-02
1	14	1	2023-06-02
2	5	2	2023-06-05
3	2	1	2023-06-07
4	19	2	2023-06-10
5	2	1	2023-06-13
5	16	1	2023-06-13
6	10	2	2023-06-15
7	2	1	2023-06-18
8	4	1	2023-06-22
9	18	2	2023-06-26
10	2	1	2023-06-30
10	13	1	2023-06-30

marketing_campaigns

campaign_id	campaign_name	product_id	start_date	end_date
1	Summer Sale	2	2023-06-01	2023-06-30
2	New Collection Launch	10	2023-07-15	2023-08-15
3	Super Save	7	2023-08-20	2023-09-15

1. How many transactions were completed during each marketing campaign ?

```sql
SELECT m.campaign_name,COUNT(DISTINCT t.transaction_id) AS transaction_count
FROM marketing_campaigns AS m INNER JOIN transactions2 AS t
ON m.product_id=t.product_id
GROUP BY m.campaign_name
ORDER BY COUNT(DISTINCT t.transaction_id) DESC;
```

OUTPUT

campaign_name	transaction_count
Summer Sale	7
New Collection Launch	6
Super Save	3

2. Which product had the highest sales quantity?

```sql
WITH cte as (
Select t.product_id,product_name, Sum(quantity) As total_quantity
From transactions as t
Join sustainable_clothing  as sc on t.product_id = sc.product_id
Group by 1 , 2
Order By total_quantity )

Select *
From cte
Where total_quantity in (select max(total_quantity) from cte) ;
```

OUTPUT

product_id	product_name	total_quantity
12	Organic Cotton Sweater	9

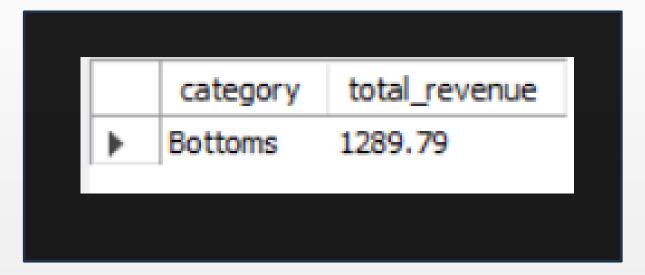# 3. What is the total revenue generated from each marketing campaign?

```sql
SELECT m.campaign_name,ROUND(SUM(c.price * t.quantity),2) AS
total_revenue_generated
FROM marketing_campaigns AS m INNER JOIN transactions AS t
ON m.product_id=t.product_id
INNER JOIN sustainable_clothing AS c
ON c.product_id=t.product_id
GROUP BY m.campaign_name
ORDER BY SUM(c.price * t.quantity) DESC;;
```

OUTPUT

campaign_name	total_revenue_generated
Summer Sale	639.92
New Collection Launch	439.92
Super Save	209.97

4. What is the top-selling product category based on the total revenue generated?

```sql
With cte as (
    Select category, round(sum(quantity*price),2) As total_revenue
    From transactions t
    Join sustainable_clothing s On t.product_id = s.product_id
    Group By 1
    Order by total_revenue desc)

Select *
From cte
Where total_revenue in (select max(total_revenue) from cte) ;
```

OUTPUT

	category	total_revenue
▶	Bottoms	1289.79

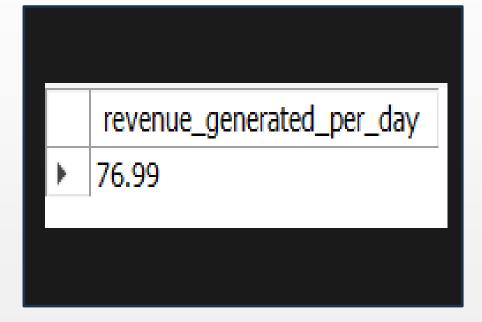# 5. Which products had a higher quantity sold compared to the average quantity sold?

```sql
WITH Qtysold AS(SELECT c.product_name,SUM(t.quantity) AS qty_sold, AVG(t.quantity) avg_qty_sold
FROM transactions AS t INNER JOIN sustainable_clothing AS c
ON t.product_id=c.product_id
GROUP BY c.product_name)


SELECT product_name,qty_sold
FROM Qtysold
WHERE qty_sold>avg_qty_sold
ORDER BY qty_sold DESC;
```

OUTPUT

product_name	qty_sold
Organic Cotton Sweater	9
Recycled Denim Jeans	8
Bamboo Yoga Leggings	8
Linen Jumpsuit	7
Organic Cotton Socks	7
Bamboo Lounge Pants	5
Eco-Friendly Hoodie	5
Organic Cotton Skirt	
Hemp Baseball Cap	5
Recycled Polyester Jacket	4
Cork Sandals	4
Linen Button-Down Shirt	3

6. What is the average revenue generated per day during the marketing campaigns?

```sql
SELECT ROUND(AVG(c.price * t.quantity),2) AS revenue_generated_per_day
FROM marketing_campaigns AS m
INNER JOIN transactions AS t ON m.product_id = t.product_id
INNER JOIN sustainable_clothing AS c ON c.product_id = t.product_id
WHERE t.purchase_date BETWEEN m.start_date and m.end_date;
```

OUTPUT

revenue_generated_per_day
76.99

7. What is the percentage contribution of each product to the total revenue?

```sql
With cte1 as
(Select round(sum(quantity*price),2) As total_revenue
From transactions t
Join sustainable_clothing s On t.product_id = s.product_id),

Cte2 as
(Select product_name ,round(sum(quantity*price),2) as total_product_revenue
From transactions t
Join sustainable_clothing s On t.product_id = s.product_id
Group By product_name)

Select product_name ,
        round((total_product_revenue*100)/total_revenue,2) As per_contribution
From cte1,cte2 ;
```

OUTPUT

product_name	per_contribution
Organic Cotton T-Shirt	1.28
Recycled Denim Jeans	13.71
Hemp Crop Top	0.54
Bamboo Lounge Pants	5.35
Eco-Friendly Hoodie	6.42
Linen Button-Down Shirt	2.57
Organic Cotton Dress	4.5
Sustainable Swim Shorts	1.5
Recycled Polyester Jacket	7.71
Bamboo Yoga Leggings	9.42
Hemp Overalls	4.82
Organic Cotton Sweater	9.64
Cork Sandals	3.43
Recycled Nylon Backpack	2.57
Organic Cotton Skirt	3.75
Hemp Baseball Cap	2.68
Upcycled Denim Jacket	5.14

8. Compare the average quantity sold during marketing campaigns to outside the marketing campaigns?

```sql
Select Case When mc.campaign_id is not null then 'marketing campaigns' Else 'outside of marketing campaigns'
        End As Transaction_type,avg(t.quantity) As "average_quantity_sold"
from transactions t
Left Join marketing_campaigns mc on t.product_id = mc.product_id
Group By  Transaction_type;
```

OUTPUT

Transaction_type	average_quantity_sold
marketing campaigns	1.1875
outside of marketing campaigns	1.4375

9. Compare the revenue generated by products inside the marketing campaigns to outside the campaigns?

```
Select Case When mc.campaign_id is not null then 'marketing campaigns'
Else 'outside of marketing campaigns' End As transaction_type,round(sum(t.quantity * sc.price),2) As revenue
From transactions t
Left Join marketing_campaigns mc On t.product_id = mc.product_id
Join sustainable_clothing sc On t.product_id = sc.product_id
Group By transaction_type ;
```
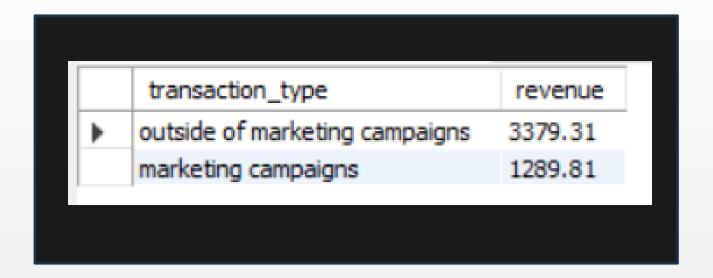
OUTPUT

transaction_type	revenue
outside of marketing campaigns	3379.31
marketing campaigns	1289.81

10. Rank the products by their average daily quantity sold?

```
With cte as
(Select product_name , avg(quantity) As avg_sold_qty
From transactions t
Join sustainable_clothing s On t.product_id = s. product_id
Group By 1)

Select product_name, avg_sold_qty ,
dense_rank() over (order by avg_sold_qty) as rnk_avg
From cte ;
```

OUTPUT

product_name	avg_sold_qty	rnk_avg
Organic Cotton T-Shirt	1.0000	1
Hemp Crop Top	1.0000	1
Organic Cotton Dress	1.0000	1
Cork Sandals	1.0000	1
Recycled Nylon Backpack	1.0000	1
Bamboo Bathrobe	1.0000	1
Recycled Denim Jeans	1.1429	2
Bamboo Lounge Pants	1.2500	3
Hemp Baseball Cap	1.2500	3
Recycled Polyester Jacket	1.3333	4
Bamboo Yoga Leggings	1.3333	4
Linen Button-Down Shirt	1.5000	5
Hemp Overalls	1.5000	5
Upcycled Denim Jacket	1.5000	5
Eco-Friendly Hoodie	1.6667	6
Organic Cotton Skirt	1.6667	6
Linen Jumpsuit	1.7500	7

THANK YOU