**1.How many campaigns does CoolTShirts use?**

SELECT COUNT(DISTINCT utm\_campaign)

FROM page\_visits;

**How many sources does CoolTShirts use?**

SELECT COUNT(DISTINCT utm\_source)

FROM page\_visits;

**How are they related?**

SELECT DISTINCT utm\_campaign, utm\_source

FROM page\_visits;

**What pages are on their website?**

SELECT DISTINCT page\_name

FROM page\_visits;

**2. How many first touches is each campaign responsible for?**

WITH first\_touch AS (

SELECT user\_id,

MIN(timestamp) as first\_touch\_at

FROM page\_visits

GROUP BY user\_id)

SELECT ft.user\_id,

ft.first\_touch\_at,

pv.utm\_source,

pv.utm\_campaign,

COUNT(utm\_campaign)

FROM first\_touch ft

JOIN page\_visits pv

ON ft.user\_id = pv.user\_id

AND ft.first\_touch\_at = pv.timestamp

GROUP BY utm\_campaign

ORDER BY 5 DESC;

**How many last touches is each campaign responsible for?**

WITH last\_touch AS (

SELECT user\_id,

MAX(timestamp) as last\_touch\_at

FROM page\_visits

GROUP BY user\_id)

SELECT lt.user\_id,

lt.last\_touch\_at,

pv.utm\_source,

pv.utm\_campaign,

COUNT(utm\_campaign)

FROM last\_touch lt

JOIN page\_visits pv

ON lt.user\_id = pv.user\_id

AND lt.last\_touch\_at = pv.timestamp

GROUP BY utm\_campaign

ORDER BY 5 DESC;

**How many visitors make a purchase?**

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '4 - purchase';

**How many last touches on the purchase page is each campaign responsible for?**

WITH last\_touch AS (

SELECT user\_id,

MAX(timestamp) as last\_touch\_at

FROM page\_visits

WHERE page\_name = '4 - purchase'

GROUP BY user\_id)

SELECT lt.user\_id,

lt.last\_touch\_at,

pv.utm\_source,

pv.utm\_campaign,

COUNT(utm\_campaign)

FROM last\_touch lt

JOIN page\_visits pv

ON lt.user\_id = pv.user\_id

AND lt.last\_touch\_at = pv.timestamp

GROUP BY utm\_campaign

ORDER BY 5 DESC;

**What is the typical user journey?**

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = ‘1 – landing\_page’;

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = ‘2 – shopping\_cart’;

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '3 - checkout’;

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = ‘4 - purchase';

**CoolTShirts can re-invest in 5 campaigns, which should they pick and why?**

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '1 – landing\_page'

AND utm\_campaign = 'ten-crazy-cool-tshirts-facts';

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '2 – shopping\_cart’

AND utm\_campaign = 'ten-crazy-cool-tshirts-facts';

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '3 - checkout'

AND utm\_campaign = 'ten-crazy-cool-tshirts-facts';

SELECT COUNT(DISTINCT user\_id)

FROM page\_visits

WHERE page\_name = '4 - purchase'

AND utm\_campaign = 'ten-crazy-cool-tshirts-facts';