



Warby Parker Usage Funnels

Learn SQL from Scratch

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Executive Summary

This Warby Parker survey analysis includes:

- Survey results
- Drop-off rates
- Completion rates
- Survey insights

The purchase funnel analysis includes:

- Drop-off rates between steps
- A/B test results (trialing 3 pairs vs 5 pairs)

Taking insights from the above, there are data-based recommendations for future activity.

Users who tried on 5 pairs were significantly more likely to purchase than users who tried on only 3 pairs. This might be simply because users have had more opportunities to find a style that works for them. Doing a trial of 10 could be worth testing to see its impact on purchase behaviour.

The highest drop-off in the survey was the final question about a user's last eye exam. Testing the removal of this question could help to increase the number of survey completions.

1. Survey Results

1.1 Survey Results

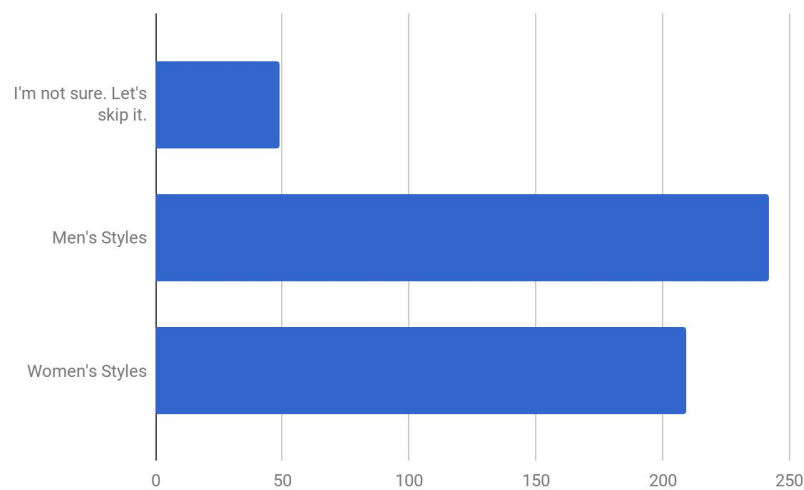
Question	Response s	Conversion (from previous step)
1. What are you looking for?	500	n/a
2. What's your fit?	475	95%
3. Which shapes do you like?	380	80%
4. Which colors do you like?	361	95%
5. When was your last eye exam?	270	75%

The final question, “*When was your last eye exam?*” has the highest drop-off rate of 25% from the previous question. This might be high as users might not know this information off hand and might have problems recalling their last eye appointment, or for privacy reasons, may not want to disclose this medical data. Taking this question out could potentially help to increase survey completions.

The survey has an overall completion rate of 54%. Having fewer questions could potentially help to increase the percentage of survey completions.

1.2 '1. What are you looking for?' Results

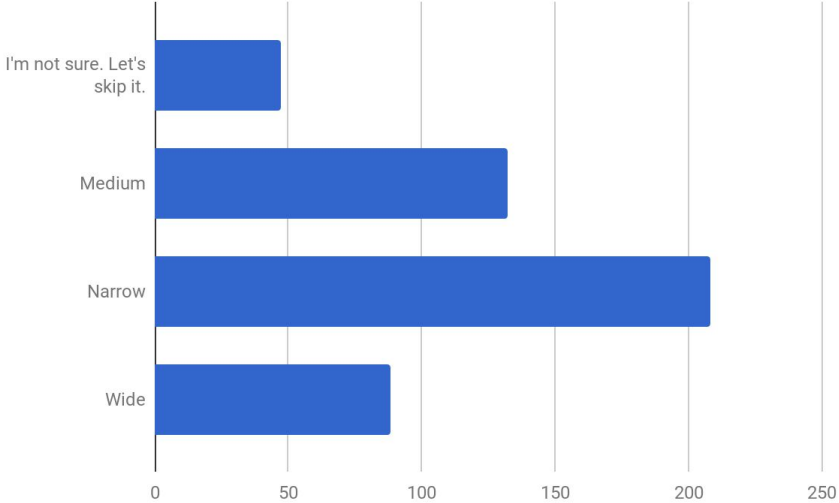
Responses	#	%
I'm not sure. Let's skip it.	49	10%
Men's Styles	242	48%
Women's Styles	209	42%



We can see that in general, men’s styles are searched for more than women’s. This could be reflective of the marketing/targeting activity that’s being used to drive traffic to the survey.

1.3 '2. What's your fit?' Results

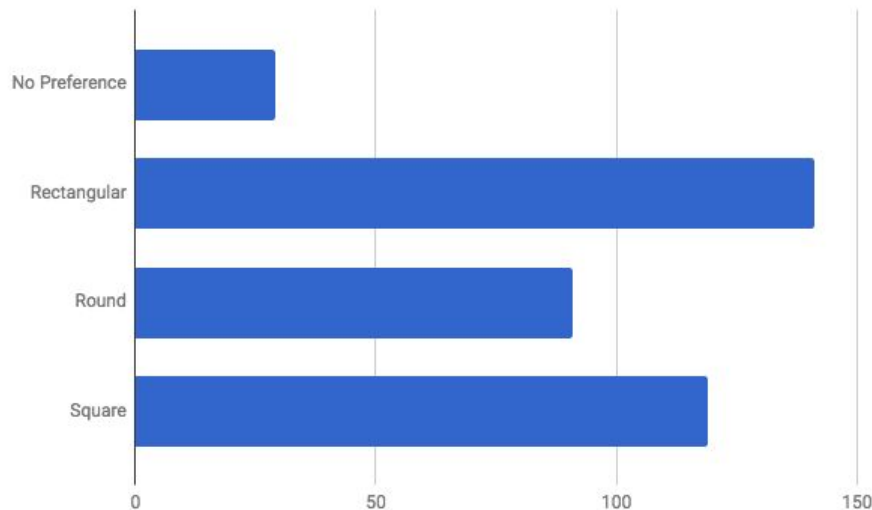
Responses	#	%
I'm not sure. Let's skip it.	47	10%
Medium	132	28%
Narrow	208	44%
Wide	88	19%



Almost half of the users had “Narrow” as their fit. This is very important as for communications around the survey, using narrow frames in imagery around the website could help to resonate with more prospective customers.

1.4 '3. Which shapes do you like?' Results

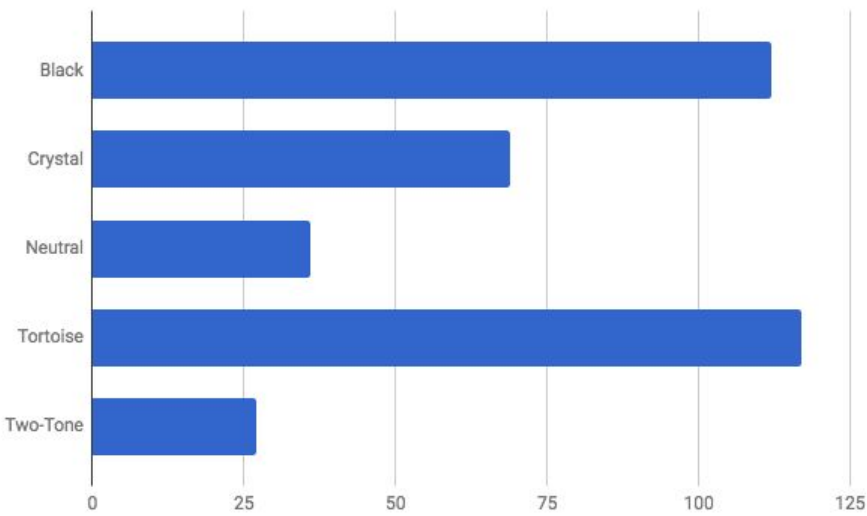
Responses	#	%
No Preference	29	8%
Rectangular	141	37%
Round	91	24%
Square	119	31%



The rectangular frames resonate the most with users. Taking “angular” frames (rectangular and square), this accounts for 74% of the responses for those who indicated a preference. Using angular frames in advertising/marketing communications might be more likely to resonate with more prospective customers.

1.5 '4. Which colors do you like?' Results

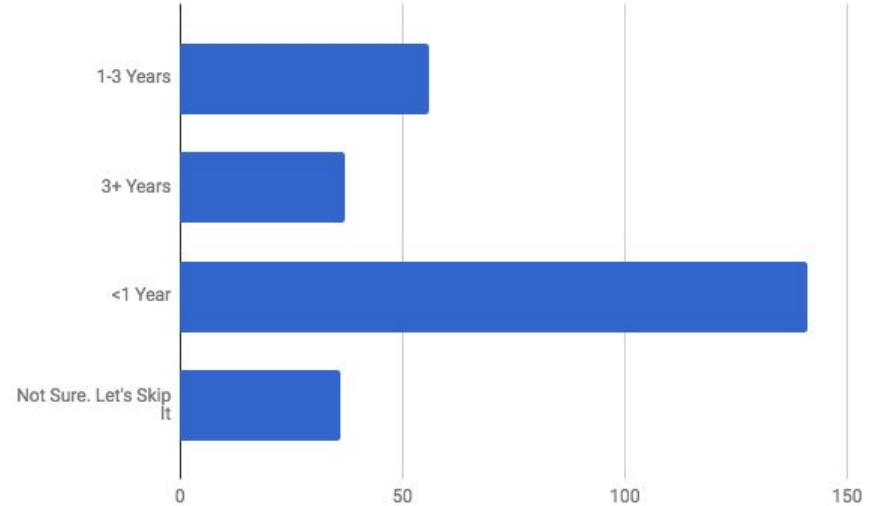
Responses	#	%
Black	112	31%
Crystal	69	19%
Neutral	36	10%
Tortoise	117	32%
Two-Tone	27	7%



Tortoise was the most popular colour choice, followed closely by black. These two colours represent a combined 63% of colours liked. This should be used by the product teams as sourcing more variations within black and tortoise could be of interest to customers which could increase conversions.

1.6 '5. When was your last eye exam?' Results

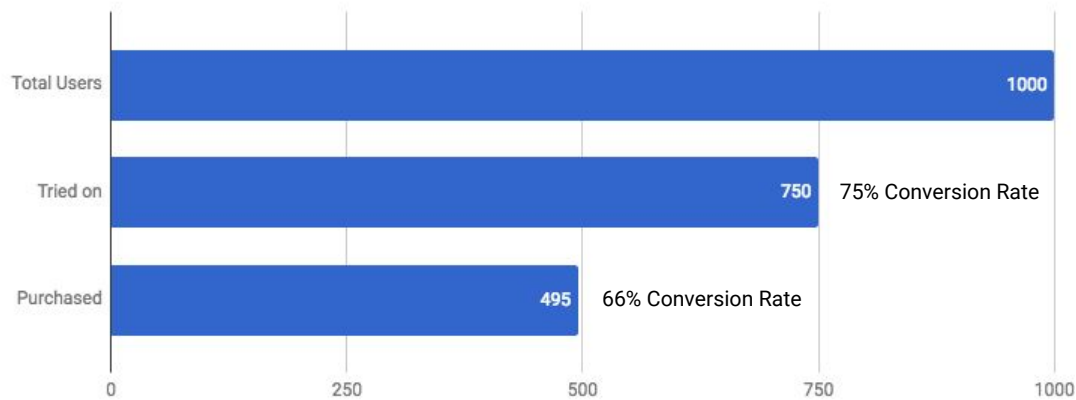
Responses	#	%
1-3 Years	56	21%
3+ Years	37	14%
<1 Year	141	52%
Not Sure. Let's Skip It	36	13%



Almost ½ the users have had their last eye exam within the last year, with the other ½ being over a year. The audience is quite divisive here. There may also be little value added with asking this question as this may not have direct impacts for sales, and yet this has the highest amount of drop-offs out for the survey.

2. Funnel Analysis

2.1 Funnel Usage



The total conversion rate is 49.5%. This is important to note as the overall conversion rate can be used as baseline to compare the results of the A/B test, and to measure future periods of activity. If the conversion rate goes below this, it might suggest a poor product mix, or unqualified traffic visiting the site from marketing activity, and and vice versa.

3. A/B Test Results

3.1 A/B Test Results

Responses	3 Pairs	5 Pairs
Tried on	379	371
Purchased	201	294
Conversion Rate	53%	79%

From the A/B test, we can see that the 5 pairs trial worked much more successfully, as it lead to over 25% more conversions than the 3 pairs trial, and was significantly over the total conversion rate of 66%. A rationale for this might be that the 5 pairs offers users more styles to choose from, with higher odds of resonating with the user leading to a purchase.

If cost-feasible, it would be worth testing the 5 pairs trial against a larger number such as 10 to see its impact on conversions.

4. Purchase Insights

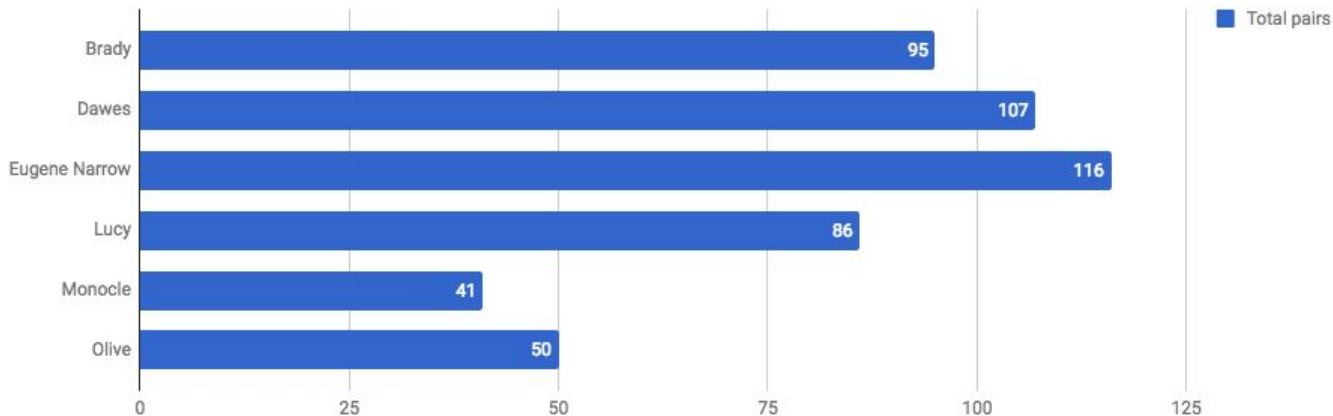
4.1 Styles by Price Range

Responses	Total	\$50	\$95	\$150
Mens	243	41	95	107
Womens	252	0	166	86

We can see that across the board, we have differences in shopping behaviours between the men's and women's style purchase data. The men's styles tend to lean more into the expensive range (\$150), whereas the women's styles lean more towards the medium range (\$95).

This could be due to a number of reasons, such as women purchasing more pairs of glasses for regular use compared to men, or due to trends, purchase power, or other factors that might need to be researched further.

4.2 Total pairs by Model



The Eugene Narrow is the most popular model out of all 6 offered models. With Olive being so low in terms of pairs sold, it might be worth looking at retiring this option and introducing something else into the product mix that might have a higher chance for sell-through.

5. Recommendations & Next Steps

Recommendations

Test different “try on” quantities

- If cost-feasible, it would be worth testing the 5 pairs trial against a larger number (e.g. 10) to see its impact on conversions.
- The A/B test revealed the more options a user could try, the higher likelihood for a purchase. This should be explored further.

Reflecting the Users

- Black, angular (square/rectangle) frames are the most popular. Using this in website imagery/ads could resonate better with new users.

Test removing the “When was your last eye exam?” question”

- This question had the highest drop-off rate, and arguably is the least-business critical for the survey.
- It would be worth testing the removal of this question and seeing its impact on survey completions.

Appendix A:

SQL Queries

1.1 Survey Results

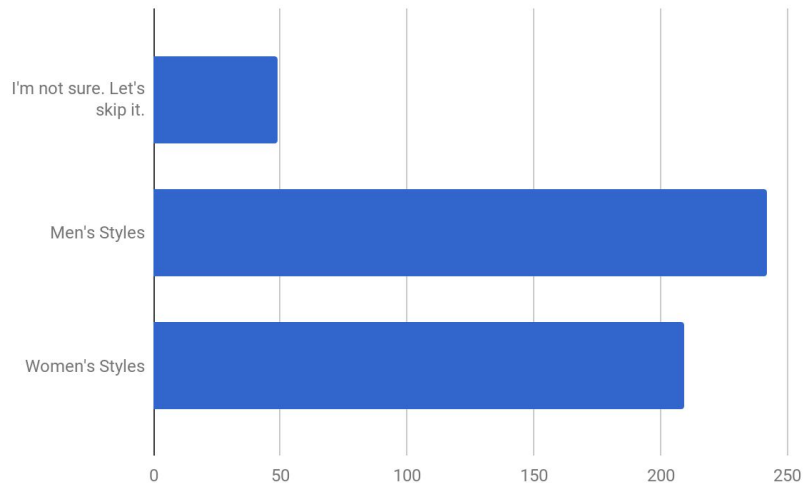
Question	Responses	Conversion (from previous step)
1. What are you looking for?	500	n/a
2. What's your fit?	475	95%
3. Which shapes do you like?	380	80%
4. Which colors do you like?	361	95%
5. When was your last eye exam?	270	75%

```
-- SQL Query
```

```
SELECT question, COUNT(*)  
FROM survey  
GROUP BY question;
```

1.2 '1. What are you looking for?' Results

Responses	Responses	%
I'm not sure. Let's skip it.	49	
Men's Styles	242	
Women's Styles	209	

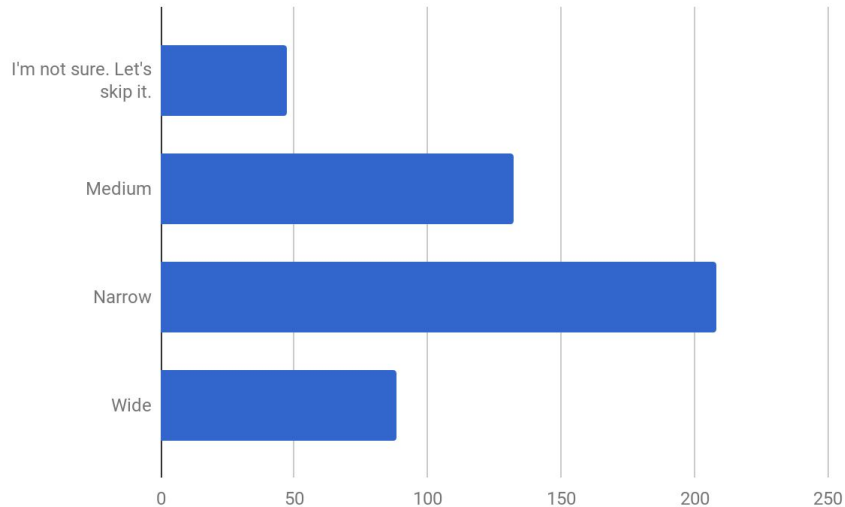


-- SQL Query

```
SELECT response, COUNT(*)  
FROM survey  
WHERE question LIKE "1.%"  
GROUP BY response
```

1.3 '2. What's your fit?' Results

Responses	Responses	%
I'm not sure. Let's skip it.	47	
Medium	132	
Narrow	208	
Wide	88	

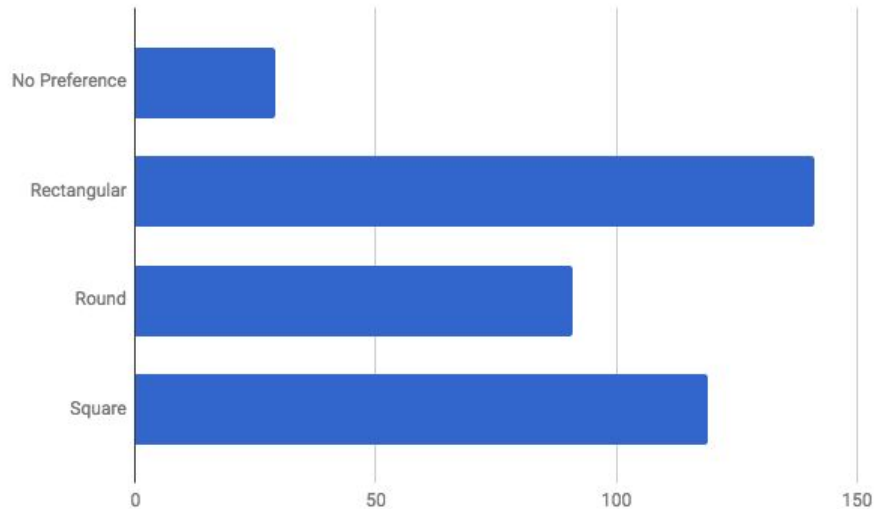


-- SQL Query

```
SELECT response, COUNT(*)  
FROM survey  
WHERE question LIKE "2.%"  
GROUP BY response
```

1.4 '3. Which shapes do you like?' Results

Responses	Responses	%
No Preference	29	
Rectangular	141	
Round	91	
Square	119	

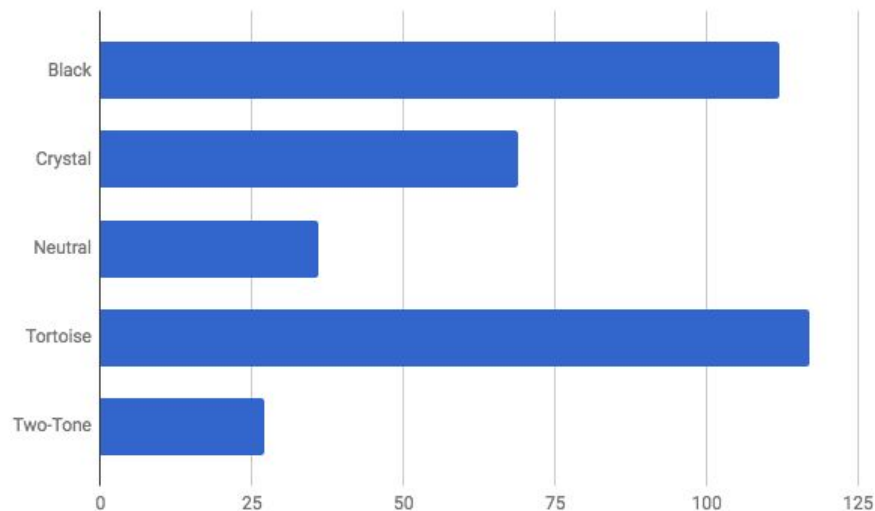


-- SQL Query

```
SELECT response, COUNT(*)  
FROM survey  
WHERE question LIKE "3.%"  
GROUP BY response
```

1.5 '4. Which colors do you like?' Results

Responses	Responses	%
Black	112	
Crystal	69	
Neutral	36	
Tortoise	117	
Two-Tone	27	

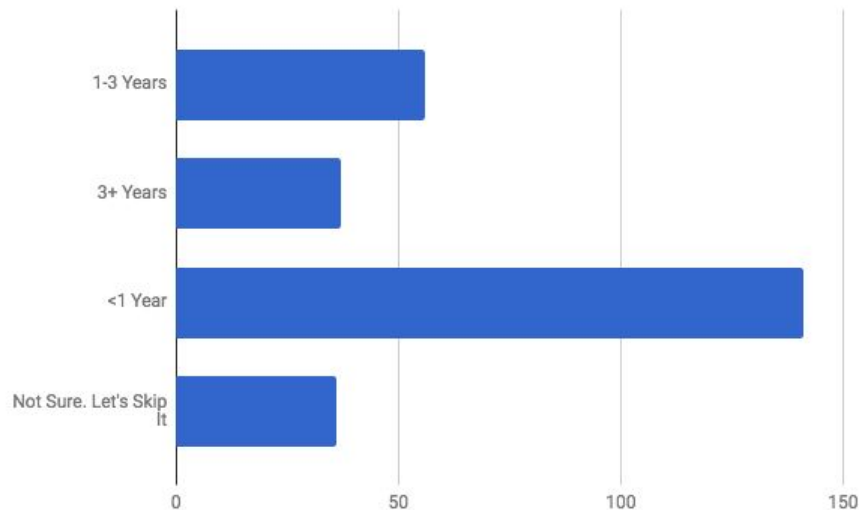


-- SQL Query

```
SELECT response, COUNT(*)  
FROM survey  
WHERE question LIKE "4.%"  
GROUP BY response
```


1.6 '5. When was your last eye exam?' Results

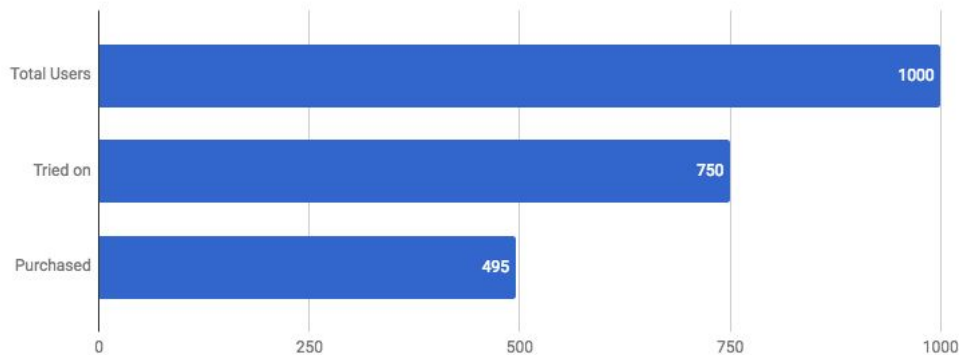
Responses	Responses	%
1-3 Years	56	
3+ Years	37	
<1 Year	141	
Not Sure. Let's Skip It	36	



-- SQL Query

```
SELECT response, COUNT(*)  
FROM survey  
WHERE question LIKE "5.%"  
GROUP BY response
```

2.1 Funnel Usage



-- SQL Query

```
WITH funnels AS (  
  SELECT quiz.user_id,  
         CASE  
           WHEN home_try_on.user_id IS NOT NULL THEN 'True'  
           ELSE 'False'  
         END AS is_home_try_on,  
         ROUND(home_try_on.number_of_pairs, 0) AS 'number_of_pairs',  
         CASE  
           WHEN purchase.user_id IS NOT NULL THEN 'True'  
           ELSE 'False'  
         END AS is_purchase  
  FROM quiz  
  LEFT JOIN home_try_on  
    ON quiz.user_id = home_try_on.user_id  
  LEFT JOIN purchase  
    ON home_try_on.user_id = purchase.user_id  
  GROUP BY quiz.user_id  
)  
  
SELECT COUNT(*) AS 'total_users',  
       SUM (  
         CASE  
           WHEN is_home_try_on = 'True' THEN 1  
           ELSE 0  
         END) AS 'tried_on',  
       SUM (  
         CASE  
           WHEN is_purchase = 'True' THEN 1  
           ELSE 0  
         END) AS 'purchased'  
FROM funnels;
```

3.1 A/B Test Results

Responses	3 Pairs	5 Pairs
Tried on	379	371
Purchased	201	294
Conversion	53%	79%

-- SQL Query

```
WITH funnels AS (  
  SELECT quiz.user_id,  
    CASE  
      WHEN home_try_on.user_id IS NOT NULL THEN 'True'  
      ELSE 'False'  
    END AS is_home_try_on,  
    ROUND(home_try_on.number_of_pairs, 0) AS 'number_of_pairs',  
    CASE  
      WHEN purchase.user_id IS NOT NULL THEN 'True'  
      ELSE 'False'  
    END AS is_purchase  
  FROM quiz  
  LEFT JOIN home_try_on  
    ON quiz.user_id = home_try_on.user_id  
  LEFT JOIN purchase  
    ON home_try_on.user_id = purchase.user_id  
  GROUP BY quiz.user_id  
)  
  
SELECT SUM(  
  CASE  
    WHEN (number_of_pairs = 3) THEN 1  
    ELSE 0  
  END) AS '3_pairs_try_on',  
  SUM(  
    CASE  
      WHEN (number_of_pairs = 3  
        AND is_purchase = 'True') THEN 1  
      ELSE 0  
    END) AS '3_pairs_purchase',  
  SUM(  
    CASE  
      WHEN (number_of_pairs = 5) THEN 1  
      ELSE 0  
    END) AS '5_pairs_try_on',  
    SUM(  
      CASE  
        WHEN (number_of_pairs = 5  
          AND is_purchase = 'True') THEN 1  
        ELSE 0  
      END) AS '5_pairs_purchase'  
  FROM funnels;
```

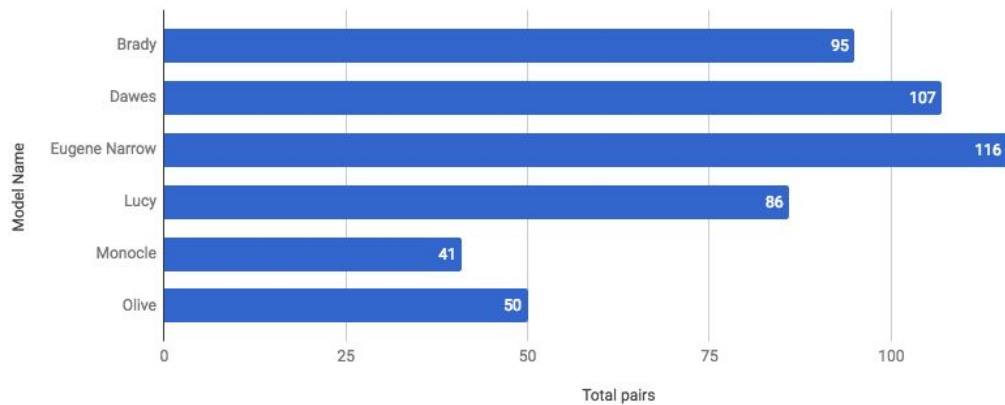
4.1 Styles by Price Range

Responses	Total	\$50	\$95	\$150
Mens	243	41	95	107
Womens	252	0	166	86

```
-- SQL Query

SELECT style,
       COUNT(*) AS 'Total',
       SUM(
         CASE
           WHEN price = '50' THEN 1
           ELSE 0
         END) AS '$50',
       SUM(
         CASE
           WHEN price = '95' THEN 1
           ELSE 0
         END) AS '$95',
       SUM(
         CASE
           WHEN price = '150' THEN 1
           ELSE 0
         END) AS '$150'
FROM purchase
GROUP BY style;
```

4.2 Total pairs by Model



-- SQL Query

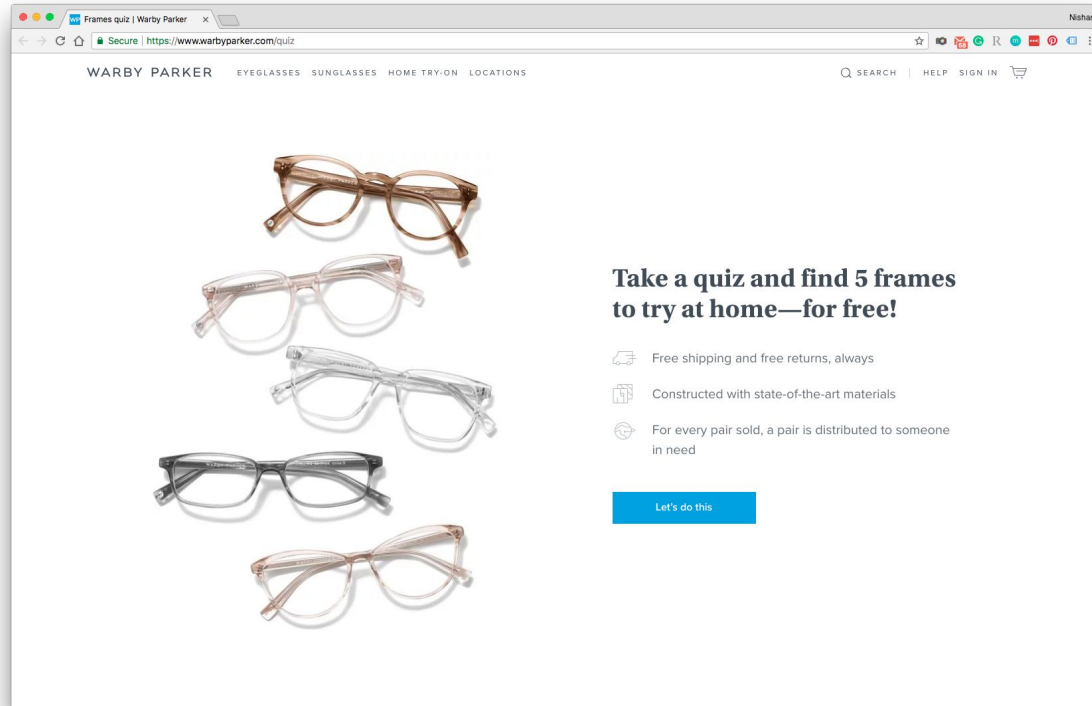
```
SELECT model_name,  
       COUNT(*) AS 'Total pairs',  
       SUM(  
         CASE  
           WHEN style LIKE 'Women%' THEN 1  
           ELSE 0  
         END) AS Womens,  
       SUM(  
         CASE  
           WHEN style NOT LIKE 'Women%' THEN 1  
           ELSE 0  
         END) AS Mens  
FROM purchase  
GROUP BY model_name;
```

Appendix B:

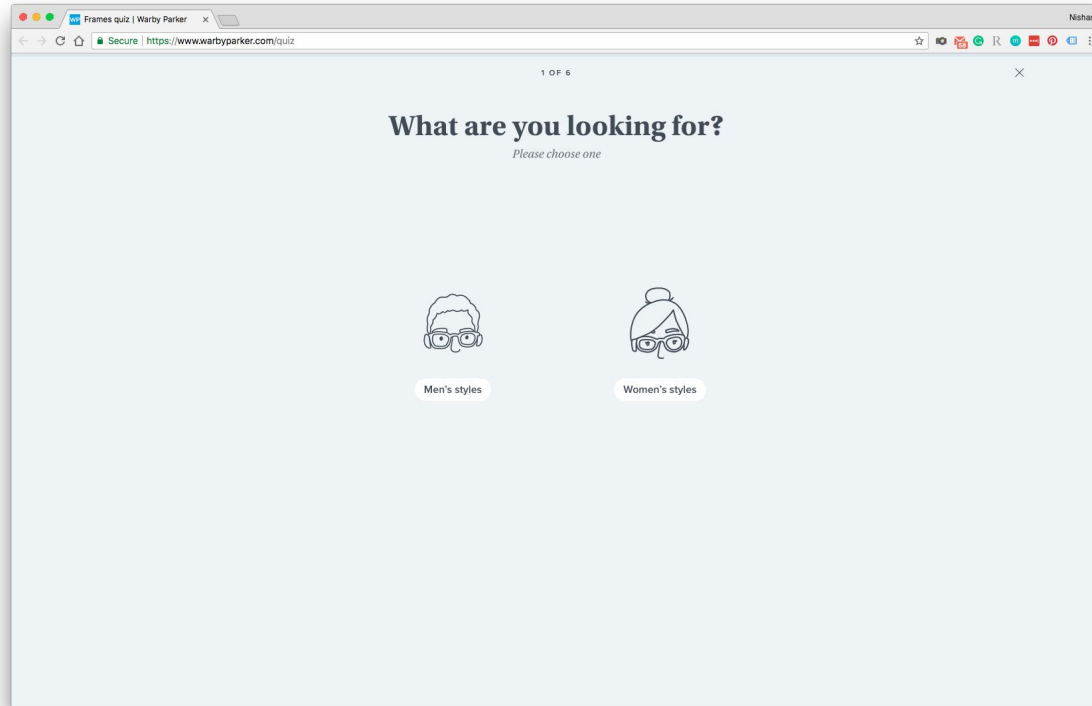
Warby Parker

Survey Screenshots

Survey Intro



1. What are you looking for?



2. What's your fit?


Frames quiz | Warby Parker

Secure | <https://www.warbyparker.com/quiz>

2 OF 6


What's your fit?

Please choose one




Narrow

If hats are big or if frames often appear oversized



Medium

A large range of people have medium-width faces. Not sure about yours? Pick this one.



Wide

If hats are snug or if frames sometimes pinch

I'm not sure. Let's skip it.

3. Which shapes do you like?


Frames quiz | Warby Parker

Secure | <https://www.warbyparker.com/quiz>


3 OF 6

Which shapes do you like?


Pick as many as you want



Round



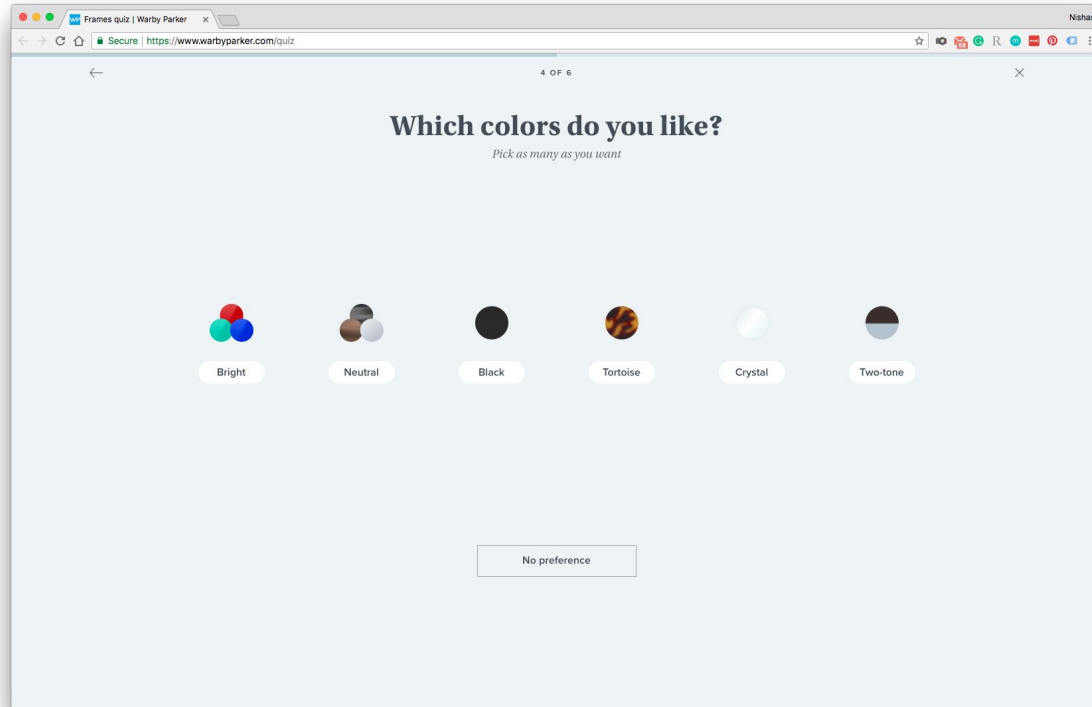
Rectangular



Square

No preference

4. Which colors do you like?



5. When was your last eye exam?

Frames quiz | Warby Parker

Secure | <https://www.warbyparker.com/quiz>

6 OF 6

When was your last eye exam?

Please choose one

☐ < 1
In the last mo.

☐ 1 - 3
1-3 mos. ago

☐ 3 - 12
3-12 mos. ago

☐ 12+
Over a year ago