OOH Effectiveness: Sales & Brand Metric ROI Analysis Automotive Category Summary

December 2023



- Ad Spend Trends
- Optimizing Sales RROASOptimizing Brand Metric ROAS



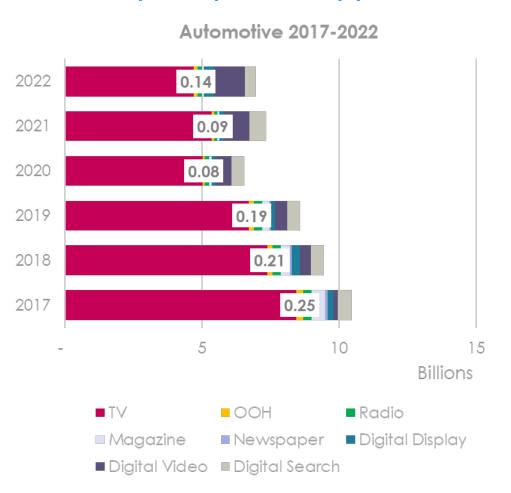
>> Benchmarketing

Vivvix Automotive Spend by Year

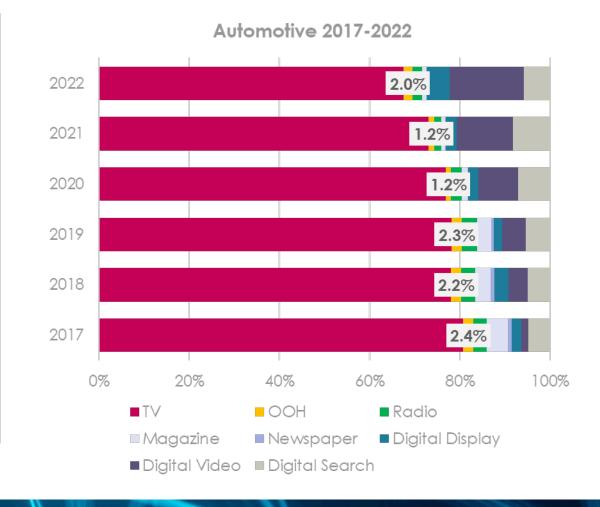


OOH increased in 2022 but is not back to 2019 (pre covid) levels

Vivvix \$bn spend by channel by year



Vivvix % spend by channel by year

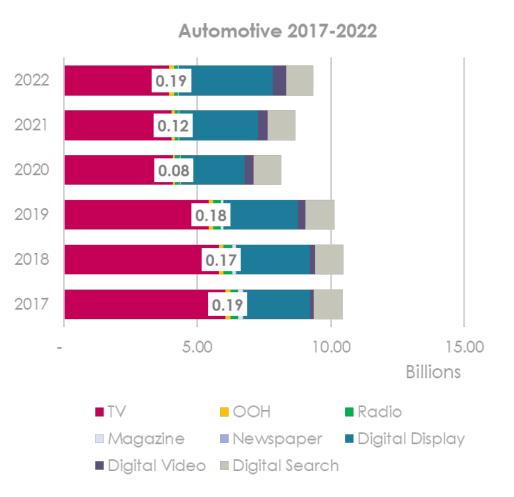


SMI Automotive Spend by Year

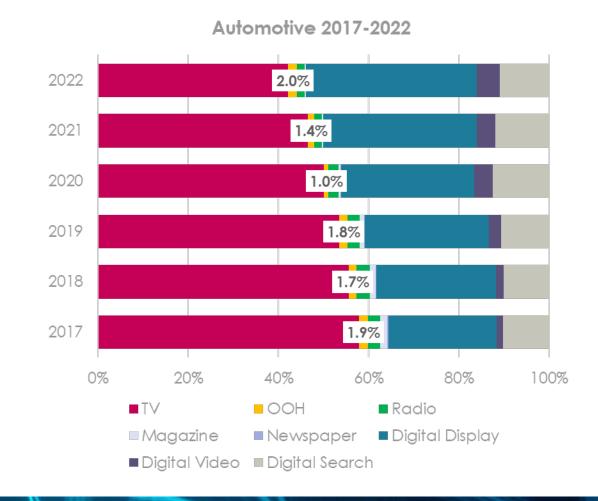


SMI shows higher OOH spends in 2022 than 2019 (unlike Vivvix)

SMI \$bn spend by channel by year



SMI % spend by channel by year

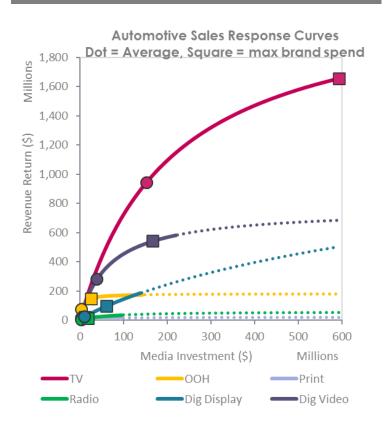


Automotive: Optimizing Sales RROAS using MMM Sales Curves

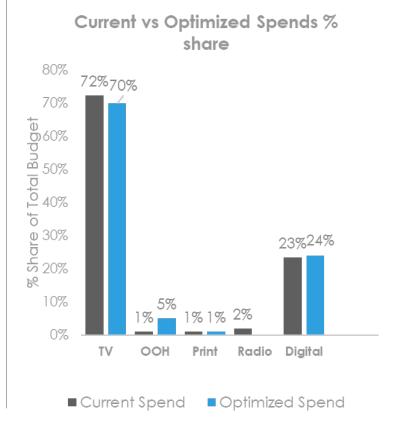


Increasing OOH allocation up to 5% and downweighting TV to 70% increases ROI by 5%

Sales response curves to identify optimal spend levels



Using the response curves to optimize current spend levels



Recommendations and Results

Decrease TV to 70% and upweight OOH to up to 5%, Digital to up to 24%

Extra **\$69.23m** revenue generated using the same budget

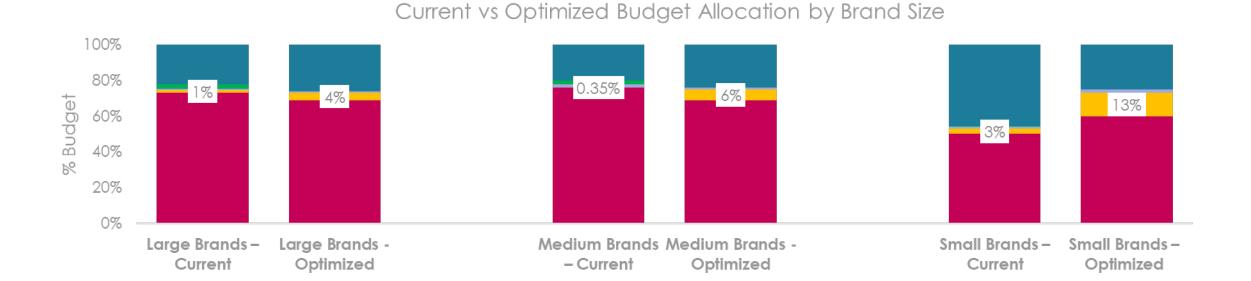
ROAS increases from 6.25 to 6.57

+5% RROAS increase

Automotive: Optimizing Sales RROAS for Small, Medium and Large brands



Optimization recommends incremental increases to OOH allocation for all brands regardless of size





Spend range: \$317-\$827m Increase OOH from 1% up to 4% **2% improvement in RROAS**



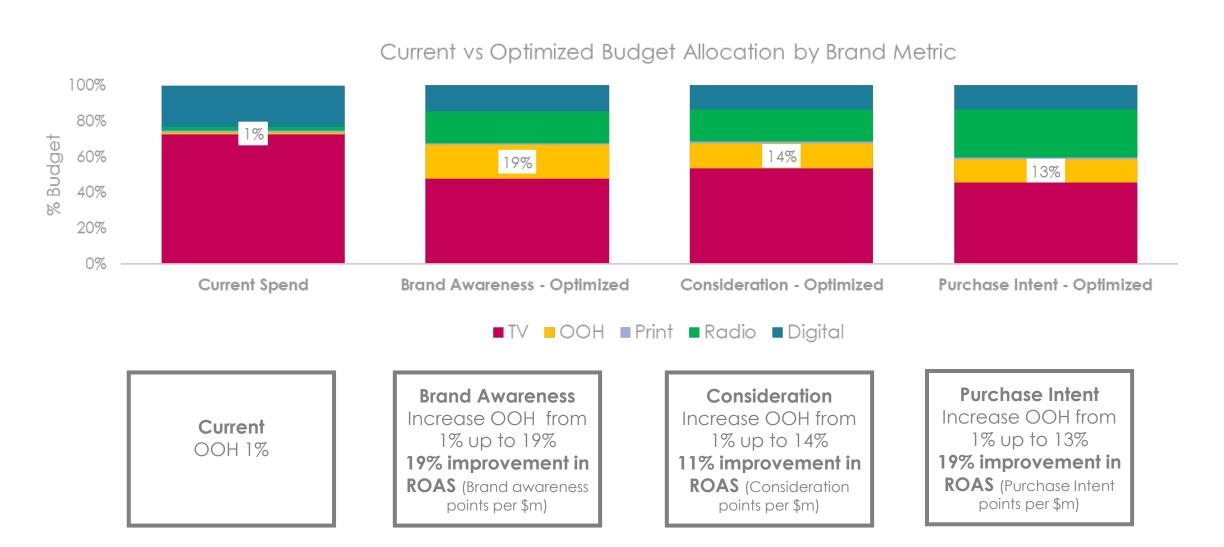
■TV ■OOH ■ Print ■ Radio ■ Digital



Automotive: Optimizing Key Brand Metrics



Optimization recommends incremental increases to OOH allocation to improve brand metric scores



Automotive Category Summary



To optimize sales ROAS and Brand metrics, OOH allocations should be incrementally increased across all measures

Vivvix Automotive spends, mix – current and trend

Automotive 2017-2022 9.44 8.58 0.21 0.19 0.09 0.08 0.14 2017 2018 2019 2020 2021 2022 TV Radio Magazine ■ Digital Display ■ Digital Video ■ Digital Search Newspaper

Automotive best action for OOH (and where from)

	Automotive – Current mix	Brand Awareness - Optimized	Consideration - Optimized	Purchase Intent - Optimized	Sales - Optimized
TV	72%	48%	54%	46%	70%
ООН	1%	19%	14%	13%	5%
Print	1%	1%	1%	1%	1%
Radio	2%	18%	18%	27%	0%
Digital	23%	15%	14%	14%	24%

OOH is currently only at 1% of an average budget for an Automotive brand

The analysis recommends incremental increases to OOH of up to 5% and 19% to optimize sales and brand metrics

The increased allocation for OOH should come from TV, Digital and Print. Radio should be increased for Brand metrics, and TV increased for Sales effects



Methodology: Optimizing Sales Revenue ROAS

Harnessing the power of multiple MMMs to create response curves which demonstrate RROA at different spend levels

1.) Gather multiple brand MMM results – combine to create average response curves by media channel for each category



3.) Then, taking that same 'average brand spend' – run an optimisation using the curves, which **optimise** incorporating **diminishing returns** to give us an **optimal Revenue ROAS**

We have access to hundreds of brand MMMs (market mix models of sales vs media activity by channel). We have anonymised and aggregated results from USA brand MMMs to provide category level response curves

For each category we have created response curves by media channel. These response curves allow us to optimise investment across media channels, both theoretically and practically, applying realistic constraints as to the maximum usage of each channel

We can show the average and maximum spend levels generally achieved in the category to guide the safe zone for optimisation

Methodology: Optimizing Brand Metrics

Pooled modelling of key brand metrics to create response curves to run optimisations

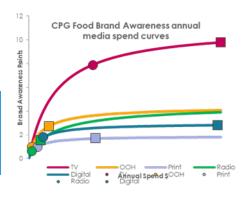
1.) Gather **data** by brand on **key brand metrics** (YouGov BrandIndex) and **media spends** by channel (Vivvix)





2.) Create a **large dataset** to allow for '**pooled modelling**'. Data is collated for all brands available within a category. Data is monthly - over the period 2019-2022

- 3.) **Econometric models** are then built for each of three key brand metrics using the pooled dataset:
- Brand Awareness, Consideration, Purchase Intent



4.) Response curves are also reported by the models, and from those response curves we are able to optimise total media spend by channel for each of our three key brand metrics

OOH's Four Media Categories

SMI attributes OOH spends into these categories plus an 'Other' category (Other = spend that could not be definitively assigned to one of the four primary categories)

NUMBER OF OUT OF HOME DISPLAYS STREET FURNITURE PLACE-BASED **BILLBOARDS TRANSIT** Arenas/Stadiums **Bulletins Bus Shelters Airport** 1.338 173.985 27,970 64.838 Cinema Digital Billboards **Urban Street Furniture Digital Airport** 34.800 11.500 3,150 57.866 **Digital Place-Based Bus Benches** Buses Posters Bike Kiosks 750.000 145.000 1.354.842 Newstands **Interior Exterior Printed** Rail/Subway **Junior Posters** Outdoor Kiosks 550.406 **Urban Panels** 356.773 19,000 Gas Stations **Digital Street Furniture** Wall Murals Digital Rail/Subway/Transit Convenience Stores 10.815 2.310 16,466 **Bus Shelters** Medical Point of Care Mobile Billboards Newsstands Office Buildings/Elevators 4,515 Outdoor Kiosks **Grocery Stores** Urban Panels Taxis **Shopping Malls** 21.000 24.255 Digital Taxis/Rideshare **Digital Shopping Malls** 71.400 12.507 **Vehicle Wraps** 441.0000