A won new. A won returning. B won overall.

D8A.ACADEMY/RESOURCES/SIMPSONS-PARADOX

THE TABLE

new visitors	A 6.0%, B 5.0%. A wins
returning	A 25%, B 22%. A wins
overall	← A 9.2%, B 19.2%. B wins?

WHY

the mix	B got 1,000 returning, A got 200
returning: 4x rate	the segment sets the rate, not the ad
n per cell	← print it next to every %

WHICH NUMBER

segment set before	the ad ran: trust the split, A
segment caused by	the ad (clicked?): trust the total

WORTH MEMORIZING

01 The table, with the n

Two campaigns, 1,200 visitors each. Read the rows, then read the last row.

SEGMENT	CAMPAIGN A	CAMPAIGN B
new	60 / 1,000 = 6.0%	10 / 200 = 5.0%
returning	50 / 200 = 25%	220 / 1,000 = 22%
overall	110 / 1,200 = 9.2%	230 / 1,200 = 19.2%

→ Returning visitors convert about four times more than new ones, whatever the campaign. B was shown to 1,000 of them, A to 200. The overall row mostly counts returning visitors.

02 Trap: which number to report

The split or the total. It depends on one thing: was the segment decided before the campaign, or by it?

THE SEGMENT IS	REPORT	BECAUSE
set before the ad: new vs returning	per segment: A	the mix is routing, not the ad
caused by the ad: clicked vs not	the total	splitting on an effect hides it
unknown	both, with n	and say the mix differs

→ Ask how visitors ended up in each campaign. If the answer is "returning customers get B", the total is telling you about the routing. The split is the campaign.