

# Branding and Performance in the Global Beer Market

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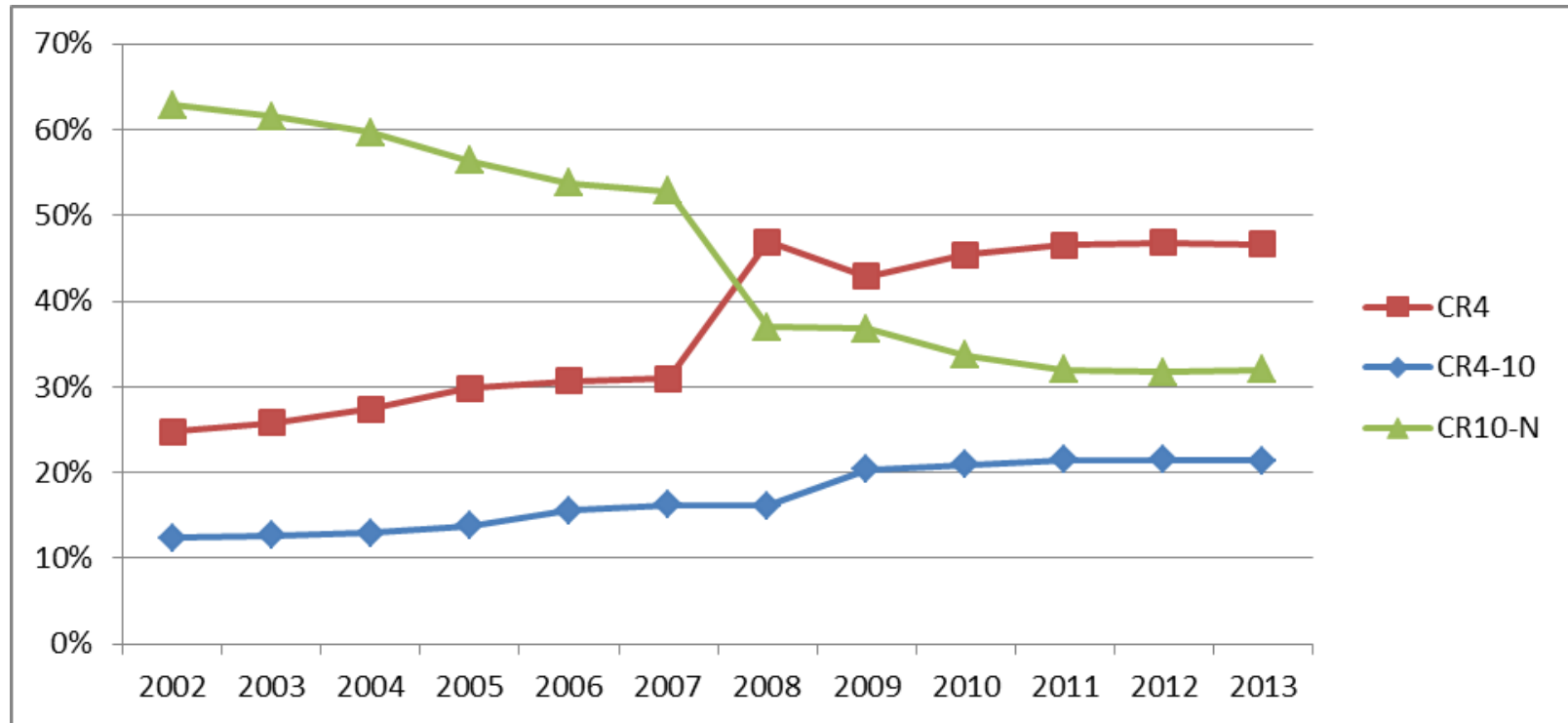
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# *Take away*

- Increasing global market share for the lager beer
- High income elasticities of lager beer in developing countries
- High price premium on premium lager
- M&A strategies motivated by the growth of premium lager

# *Increasing concentration*



# *World market for beer*

<b>Type of beers</b>	<b>Quantity consumed (Bill liter)</b>			<b>Value of consumption (Bill USD)</b>		
	2016	Freq. 2016	% 2000-16	2016	Freq. 2016	% 2000-16
<b>Standard lager</b>	139.7	73.4	55.6	335.8	59.1	53.9
<b>Premium lager</b>	30.6	16.1	31.8	143.8	25.3	45.1
<b>Ales and stouts</b>	5.7	3.0	14.6	23.7	4.2	16.2
<b>Specialty beers</b>	9.0	4.7	27.8	47.4	8.3	42.8
<b>Low alcohol beers</b>	5.3	2.8	108.0	18.0	3.2	110.9
<b>Total beer cons.</b>	190.3	100.0	49.2	568.7	100.0	50.0

- Increasing market share for Lager beer
- No inflation in beer prices

# Regional markets

World regions	Number of Countries	Standard lager		Premium lager		Specialty beers	
		2016	% 2000-16	2016	% 2000-16	2016	% 2000-16
<b>Africa &amp; M. E.</b>	5	4.6	51.5	0.7	29.6	0.2	32.3
<b>Asia</b>	14	72.9	130.9	7.3	78.2	0.4	69.4
<b>South America</b>	5	24.5	45.0	1.5	233.7	0.6	95.6
<b>North America</b>	2	12.9	0.8	7.9	-3.2	4.6	15.8
<b>West Europe</b>	16	13.0	-23.3	6.9	0.0	2.5	19.3
<b>East Europe</b>	5	11.9	37.6	6.3	103.8	0.7	56.8
<b>All countries</b>	47	139.7	55.6	30.6	31.8	9.0	27.8

Note: Consumption measured in billions of liters.

- Increasing market share for Lager beer in developing countries

# *Income elasticities*

- $\text{Log}(T_{ijk}) = \alpha + \beta_k \text{Log}(G_{ij}) + \delta_k (\text{Log}(G_{ij}))^2 + \eta_k X_{ij} + \lambda_j + \mu_{ijk}$
- $T_{ijk}$  Type k beer in country j, year i
- $G_{ij}$  GDP year i for country j
- $X_{ij}$  Controlling variables
- $\lambda_j$  Country fixed effects

# *Income elasticities*

	<b>Model 1</b>	<b>Model 2</b>	<b>Model 3</b>	
	Pooled OLS	Fixed effects	Fixed effects	
<b>Type of beers</b>	$\beta_k$	$\beta_k$	$\beta_k$	$\delta_k$
<b>Standard lager</b>	0.659	0.220	3.297	-0.169
<b>Premium lager</b>	1.140	0.422	3.086	-0.144
<b>Ales and stouts</b>	1.435	0.109	1.423	-0.071
<b>Specialty beers</b>	1.650	0.288	0.020 <sup>+</sup>	0.015 <sup>+</sup>
<b>Low alcohol beers</b>	1.407	0.226	0.731 <sup>+</sup>	-0.027 <sup>+</sup>
<b>Total beer cons.</b>	0.764	0.247	2.791	-0.138

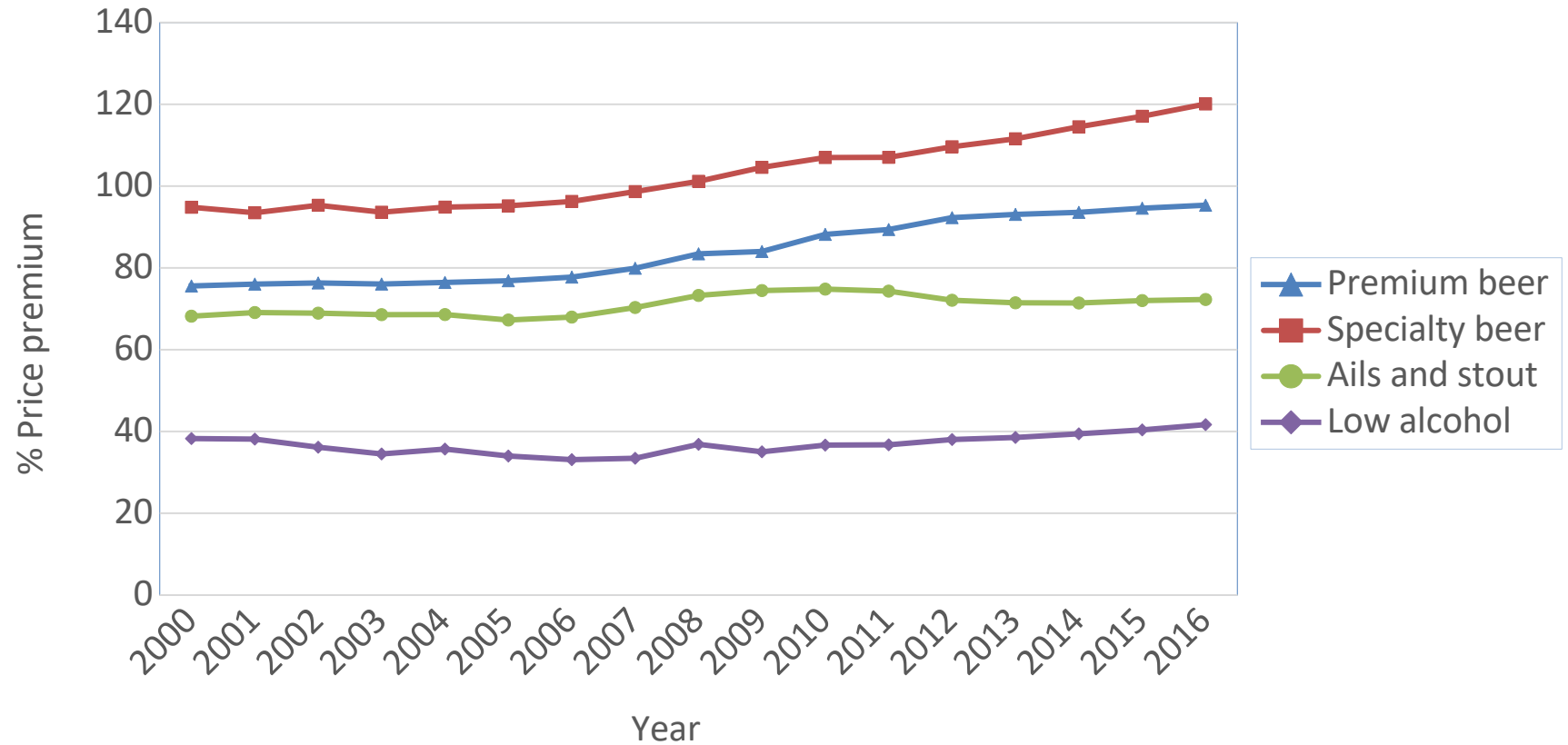
- High and decreasing elasticity for premium lager
- Constant elasticity for specialty and low alcohol beer

# Average price of beer

<b>World regions</b>	<b>Standard lager</b>	<b>Premium lager</b>	<b>Specialty beers</b>	<b>Ales and stouts</b>	<b>Low alcohol beers</b>	<b>Total beer cons.</b>
<b>Africa &amp; M. E.</b>	2.22	2.46	5.34	2.14	2.01	2.35
<b>Asia</b>	2.10	4.53	5.14	6.76	3.23	2.38
<b>South America</b>	2.09	2.58	2.64	2.06	2.29	2.13
<b>North America</b>	2.51	4.28	5.39	3.70	3.70	3.58
<b>West Europe</b>	4.93	6.74	6.52	5.81	4.48	5.61
<b>East Europe</b>	2.14	3.95	2.51	1.90	2.07	2.71
<b>All countries</b>	2.40	4.70	5.29	4.14	3.41	2.99

- High price premium for premium lager beer

# *Price premiums*



# *Premiumization of the market*

- Results of blind test experiments for lager beers
  - No real differences in quality or taste
  - Large perceived differences in branded beers
- Results:
  - Branding competitions
  - Investment in sales promotions and advertising

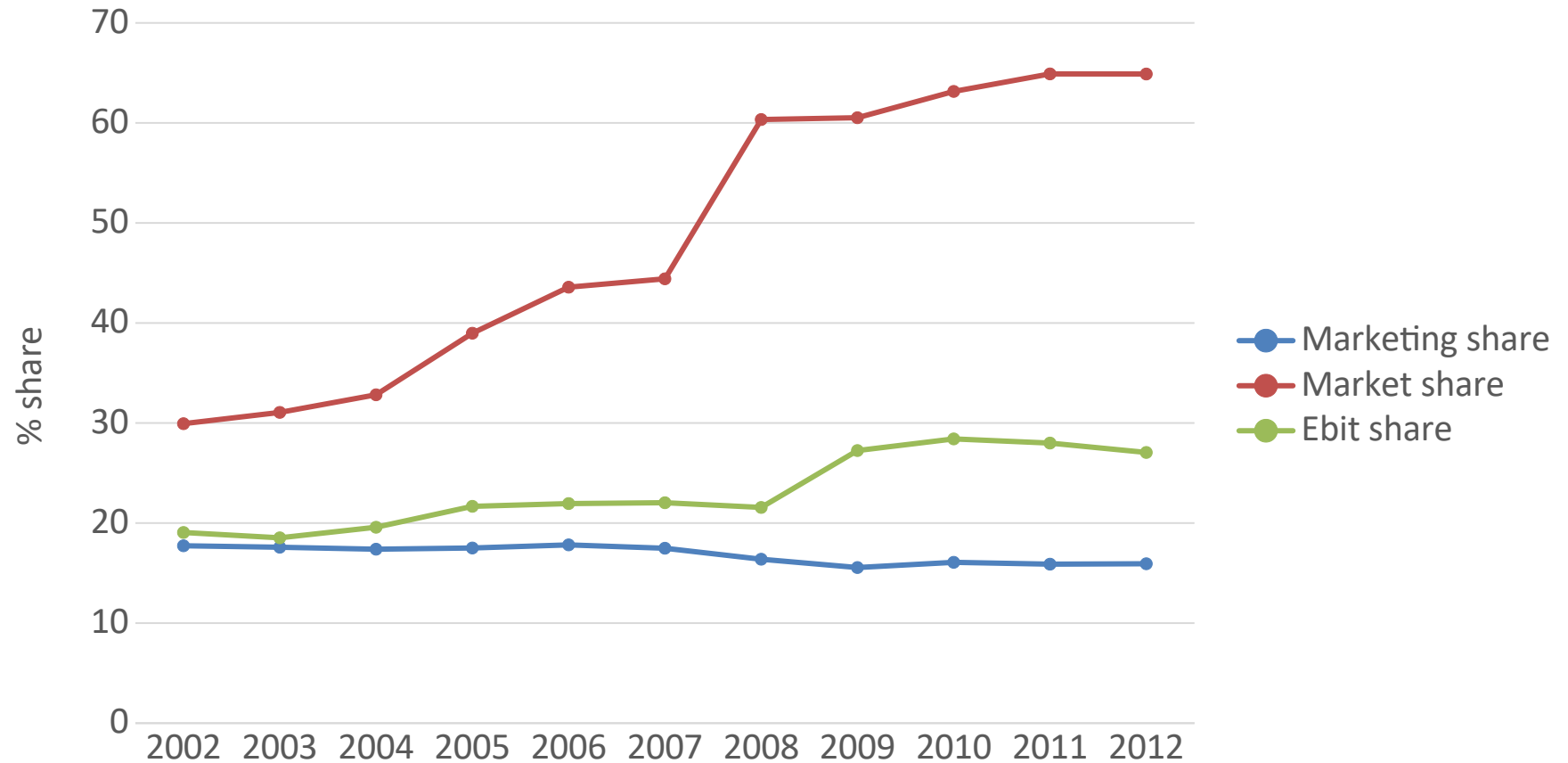
# *Premiumization of the market*

- Vertical product differences? NO!
  - Known technology with same raw material
  - Blind test experiments for lager beers:
    - Almenberg et al: Triangle test of Czechvar, Heineken and Stella Artios
    - Result: The only one different could not be pointed out (Only 33%)
- Horizontal product differences? YES
  - Blind test experiments for lager beers:
    - McConnell: Same beer with 3 labels of popular, premium and super-premium
    - Result: Panel ranked high priced beer higher in quality
  - Consumer perceived the quality of beer by price signals

# 8 large breweries

Company	World Market share	Marketing & sales expenses Billion USD	Marketing and sales cost Share of revenue	
	2012	2012	2002	2012
AB Inbev	0.195	5.250	0.188	0.132
SAB Miller	0.117			
Heineken	0.101	1.350	0.154	0.122
Carlsberg	0.054	1.238	0.201	0.183
Molson Coors	0.041	1.126	0.280	0.288
Kirin	0.032	2.904	0.192	0.134
Tsing Tao	0.038	0.449	0.162	0.153
Yanjing	0.034	0.157	0.077	0.104
<b>Total</b>	0.612	12.481		
<b>Average</b>	0.077		0.179	0.159

# *Concentration and performance*



# *Development in premiums*

<b>World regions</b>	<b>Premium lager Billion USD</b>	<b>Price premium Percent</b>	<b>Price premium increases % 2000-2016</b>	<b>Size of premium Billion USD</b>	<b>Total premium increases % 2000-2016</b>
<b>Africa &amp; M. E.</b>	1.7	10.7	-2.74	0.16	27.4
<b>Asia</b>	33.2	106.1	4.59	17.81	84.52
<b>South America</b>	4.0	23.6	-9.54	0.76	153.2
<b>North America</b>	33.6	70.2	16.36	13.90	48.2
<b>West Europe</b>	46.2	36.9	-7.14	12.44	-7.8
<b>East Europe</b>	25.2	84.4	17.29	11.52	375.6
<b>All countries</b>	143.8	95.8	11.25	56.56	64.5

- High competition in Western Europe for lager beer
- Asia has the most profitable market for Lager beer

# *Conclusions*

- High income elasticities in developing countries
- High price premium on premium lager
- M&A strategies motivated by growth of premium lager

*Thank you for your time!*

*Questions?*

