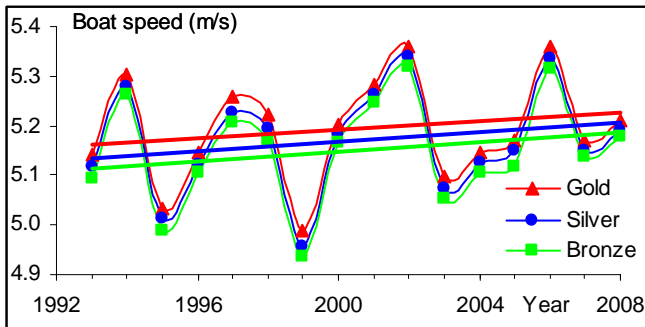


Facts. Did you know that...

...the finals of the last Olympic regatta in Beijing didn't show us the fastest boat speeds; though some very good times were shown during heats (world best time 5:36.20 in M4x AUS). The average speed of the medallists in the 14 boat types was at the level of the trend over the last 16 years:



The trend in the winner's speed grew by 0.082% per year, but for the silver and bronze medallists the slope was higher: 0.090% and 0.093% respectively. This means the margins are getting closer from year to year.

In RBN 2005/08 we found that margins didn't change much over the years, but now a trend towards smaller margins has definitely appeared. The table below shows the average margins (in seconds) from the winners in the 14 Olympic events and slopes of the trends:

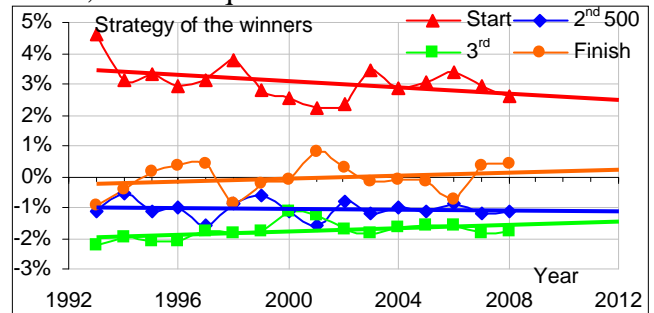
Margin(s) \ Place	2nd	3rd	4th	5th	6th
2008 Olympics	1.34	2.34	4.58	7.84	12.17
Average 1993-2008	1.78	3.24	5.40	8.26	11.62
Slope (s/year)	-0.03	-0.04	-0.05	-0.01	0.02

The negative slope tells us that the silver medallists reduced their margin from the winner by 0.03s every year, so they would catch up within 40 years and bronze would do it by 2062! Obviously, it won't happen and the current tendency should change in magnitude and, possibly, in direction. However, these facts confirm that currently the competition is getting tougher and tougher. Recently, we saw the Olympic final in W2x, where only 0.01s split gold from silver, and 0.23s silver from bronze. In contrast, the 6th place is getting further away from the winners from year to year.

In the boat types the highest growth of the speed was found in W8+ (0.32% per year), LW2x and LM2x:

Boat	W8+	LW2x	LM2x	LM4-	M8+	M4x	W4x
Slope	0.32%	0.26%	0.25%	0.23%	0.19%	0.16%	0.15%
Boat	W1x	W2-	M4-	M1x	W2x	M2x	M2-
Slope	0.03%	-0.02%	-0.03%	-0.05%	-0.11%	-0.11%	-0.13%

Another example of change is the trend in race strategy. In RBN 2002/10 we predicted the average race strategy in 2008 would be: +1%, -1%, -1%, +1%. In 2005 we had to change it to +2%, -1%, -1.5%, +0.5%. The winners of the last Olympics had showed on average +2.6%, -1.1%, -1.8%, +0.4%, which is quite close to the last forecast.



Using the current trends we can deduce the following typical strategy of the winners for 2012: +2.5%, -1.1%, -1.4%, +0.2%, which would not be very different from this year's numbers.

As always, silver and bronze medallists were relatively faster over the last 500m, but they had lost to the winners mainly during the second 500m, which was an unusual feature of this Olympics:

	2008	Gold	Silver	Bronze	4th	5th	6th
Start		2.6%	2.6%	2.6%	3.0%	3.3%	3.7%
2nd 500		-1.1%	-1.8%	-1.7%	-1.7%	-1.3%	-1.0%
3rd 500		-1.8%	-1.6%	-1.6%	-1.9%	-1.6%	-2.0%
Finish		0.4%	0.9%	1.0%	0.8%	-0.1%	-0.5%

Race strategy in the Beijing finals had a quite distinctive national federation characteristic:

	n	Start	2nd	3rd	Finish	Var.
AUS	7	3.5%	-1.3%	-1.8%	-0.2%	2.5%
CAN	5	3.4%	-1.4%	-2.1%	0.3%	2.8%
CHN	6	2.5%	-1.6%	-2.0%	1.3%	2.7%
CZE	4	5.3%	-1.1%	-1.5%	-2.2%	4.1%
FRA	4	3.2%	-2.1%	-2.6%	1.7%	2.9%
GBR	10	3.1%	-1.7%	-1.8%	0.6%	2.5%
GER	7	4.0%	-1.8%	-2.4%	0.4%	3.1%
NED	4	1.8%	-1.5%	-2.0%	1.9%	2.2%
NZL	5	2.0%	-1.7%	-0.9%	0.8%	2.1%
POL	4	2.1%	-0.5%	-1.5%	0.0%	2.1%
USA	7	2.6%	-1.4%	-1.0%	0.0%	2.2%

The Czechs and Germans were fastest at the start and therefore had the highest variation of the boat speed over the race. Dutch and French rowers had the fastest finish. New Zealand and Poland had the most even distribution of boat speed. British rowers had the most balanced race strategy, which reflected their leading performance in Beijing.

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