



# Softening the winner's curse: How to combat cost overruns in mega-sporting events

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## **The winner's curse**

The winner's curse hypothesis was first advanced to explain low returns on investment to companies engaged in competitive bidding for oil and gas leases in Middle East countries were putting companies into fierce competition through auctioning (Capen et al., 1971); then in financial markets (Thaler, 2017 Nobel Prize winner).

Usually: *in any auction-type setting where the value of the auctioned object is uncertain but will turn out to be the same for all bidders, the party who overestimates the value is likely to outbid the competitors and win the contest.*

The bidder who has the most aggressively bid and overestimated the value (the winner) yields an expected financial loss (which increases with the number of bidders): a nice case of adverse selection of an investment project.

Olympics: nobody knows the real (market) value of being selected to host them.

In the bidding process, the IOC objective is to obtain the best possible Olympics project (quality, security, telecommunication, etc.) by selecting – voting – the “best” host city’s candidature file ...

... though its actual detailed knowledge of the Olympics projects remains limited (despite site visits) compared to each city’s knowledge about its own project: information asymmetry.

Candidate cities’ objective: get the Games; they overbid for that with underestimating their costs (overestimating the benefits/impact): the winner’s curse emerges as soon as a city is a candidate with other candidates to outbid: the winner is cursed by the IOC auction-like allocation process...

... some IOC requirements are mandatory (ex: Olympics sporting facilities)...

... while the quality of non sporting infrastructures, ceremonies, etc., is appealing for the votes in favour of «the best» (most magnificent, fantastic, fantabulous) candidate city’s project, *i.e.* often (one of) the most costly.

## Indicators of the winner's curse

Primarily: cost overruns = *ex post* achieved cost > *ex ante* announced cost; the cost at the end of (or after) the Games appears to be quite higher than the cost declared (forecast) 7 years earlier (in the candidature file). Focus on it.

Other indexes:

- . Revisions (ex post) in the Olympics project (because the cost has become too high).
- . Delayed completion of Olympics investments (ex: Athens 2004).
- . Extra public subsidy or extra public finance.
- . Host city fiscal deficit and debt (then taxpayers extra-taxation).

Empirical evidence of Olympics cost overruns (Tables 2 & 3).

The number of candidate cities to host the Games is down (2 in 2002, 2 in 2004, 1 in 2028), how many in 2026 and 2032?

Candidate cities have resigned after negative vote/referendum (2022: St Moritz, Munich, Cracow; 2024: Hamburg) or after political decision (2022: Stockholm, Oslo; 2024: Boston, Rome, Budapest).

**Table 2: Ex ante and ex post cost of Summer Olympics**

Host city, year (Nb of bidders)	ct-1: ex ante cost	Ct: ex post cost	After t cost
Munich 1972 (4 bidders)	Overall cost: \$2705m	Investment cost: \$1757m00 LOOC operation cost: \$656m00	
Montreal 1976 (3 bidders)	Investment cost: \$549.5m00  Olympic stadium cost: \$172m	Investment cost: \$3395.6m00 LOOC operation cost: \$476m00	Operation: \$1592m Stadium: \$1000m
Moscow 1980 (2 bidders)	Overall cost: \$3.7bn Operation cost: \$2bn Investment cost: \$1,7bn	Overall cost: \$9bn	
Los Angeles 1984	No commitment	Overall cost: \$1592m LOOC operation cost: \$546m	
Seoul 1988 (2 bidders)	Overall cost: \$3.1bn Investment cost: \$3450m	LOOC operation cost: \$664m00 Investment cost: \$4063m00	Extra cost: \$2bn
Barcelona 1992 (6 bidders)	Investment cost in: 1985: F13bn; 1988: F23,5bn 1990: F35,5bn; 1992: F41,5bn LOOC operation cost: \$1670m	Investment cost: \$10134m00 Overall cost: \$9.3bn LOOC operation cost: \$1793m00	Debt: \$6.1bn

Atlanta 1996 (6 bidders)	Overall cost in 1990: \$2021m	Investment cost: \$1324m00 LOOC operation cost: \$1346m00	
Sydney 2000 (5 bidders)	Overall cost in 1994: \$3428m Investment cost: \$2500m LOOC operation cost: \$1463m New South Wales Invt: \$1220m	Investment cost: \$2601m00 LOOC operation cost: \$2434m00 New South Wales Invt: \$1249m	Overall cost: \$6.6bn
Athens 2004 (5 bidders)	LOOC operation cost: \$2162m00 Overall cost: €4.6bn	LOOC operation cost: \$2404m00 Overall cost: €6.0bn (June 2004)	Overall: €9.6bn
Beijing 2008 (5 bidders)	Investment cost: \$1600m00 Invt cost in 2006: \$2800m LOOC operation cost: \$786m00  Olympic stadium cost: €300m Overall cost: €2.2bn (\$bn1.9bn) 2004 \$2.4bn in 2006	Investment cost: \$2170m00  LOOC operation cost: \$1458m00 Infrastructure cost: \$35.6bn Olympic stadium cost: €380m 2004 Overall cost: \$43 to 45bn	Invt cost: €13.5bn  Infrastr: €29bn
London 2012 (5 bidders)	Overall cost: £3.4bn in 2005; £3.674bn end 2005; £9.3bn in 2007 £10.0bn in 2009 Investment in 2005: £2.664bn in 2006: €15.0bn LOOC operation 2005: £1010m in 2006: €1900m	Overall in 2011: \$19bn (£11.6bn)	

m: million; bn: billion; \$m00: in 2000 dollars; Australian dollars for Sydney; F: French francs

Sources: Andreff & Nys (2002), Auf der Maur (1976), Barget & Gouguet (2010), Gouguet & Nys (1993), Preuss (2004 & 2006), Zimbalist (2010 & 2011), bidding committees, press articles.

**Table 3: Ex ante and ex post cost of Winter Olympics**

Host city, year (Nb of bidders)	ct-1: ex ante cost	Ct: ex post cost	After t cost
Lake Placid 1980 (2 bidders)	Initial operation cost: \$47m Investment cost: \$129m	LOOC operation cost: \$96m	Op. loss: \$8.5m
Sarajevo 1984 (3 bidders)	Operation cost: \$17.6m	Operaton cost: \$20.2m Investment cost: \$15.1m	
Calgary 1988 (3 bidders)	Initial overall cost: can\$500m	Overall cost: can\$1000m LOOC operation cost: \$636m	
Albertville 1992 (7 bidders)	Initial total cost: F2933m in 1987: F3160m; 1991: F11487m of which operation cost: F3233m; sporting equipments: F714m infrastructures: F8630m Accommodation cost: F289m	Overall cost: F12bn LOOC operation cost: F4200m sporting equipments: F5755m infrastructures: F7800m Accommodation cost: F575m	Op. loss:\$60m (F285m) Extra sport equipt cost: F286m
Lillehammer 1994 (4 bidders)	Overall cost in 1988: \$1511m	Overall cost: \$1700m	Op.loss: \$343m

Nagano 1998 (5 bidders)	Overall cost in 1992: \$450m	Overall cost: \$875m	Debt: \$11bn
Salt Lake City 2002 (4 bidders)	Operation cost: \$400m in 1989; 1996: \$1000m; 1998: \$1300m	Operation cost: \$1.9bn	Op. loss: \$168m
Turin 2006 (6 bidders)	Investment cost: €3.5bn Operation cost: \$660m	Investment cost: €13bn Operation cost: \$1357m	Op. loss: \$38m
Vancouver 2010 (3 bidders)	Operation cost: \$846m	Operation cost: \$1269m Investment cost: €1.31bn	Op. loss: \$37m
Sochi 2014 (3 bidders)	Initial total cost: \$8.4bn 2007: \$12bn; 2010: \$33bn	Total cost: \$ 51bn	

m: million; bn: billion; \$00: in 2000 dollars; Australian dollars for Sydney; F: French francs; Y: yen

Sources: Andreff & Nys (2002), Barget & Gouguet (2010), Burton & O'Reilly (2009), Chappelet (2002), Elberse et a. (2007), Jeanrenaud (1999), Solberg (2008), Tihi (2003), Zimbalist (2010 & 2011), bidding

## **No cost overruns in Los Angeles 2028, what about Paris 2024?**

Los Angeles *de facto* was the only candidate city for hosting the 2028 Games: no auction, no overbidding, no reason of a cost overrun (according to theory).

L.A. is in a stronger position to bargain hosting terms with the IOC (already on the tracks), to utilise previous equipments, the sponsorship potential ahead of the usual schedule, etc. (+ outside my theory: a 100% private finance).

Paris 2024: a good probability of a lower cost overrun than average, why?

1/ Overbidding stopped in July 2017 with the decision of allocating both 2024 and 2028 Games together in Lima (and L.A. switching to 2028).

2/ Few new sport facilities to be built (like in L.A.); usually costs run over on:  
a/ non-sport infrastructures; b/ sport equipments / facilities.

3/ My suggestion of creating an external (to the LOOC) auditing body to supervise the cost evolution (every semester/trimester?) is under examination at the Observatory: in order to primarily avoid overruns on those costs financed by public funding ('taxpayer acceptability'); also privately-funded costs?

## **Softening the consequences of the winner's curse**

Move an increasing share of sporting facilities, infrastructures that can be dismantled from one Olympics site to the next one (going towards an entirely mobile Olympics site, in the future, thanks to new technology?).

Restricting the auction (future bids) to those (biggest) cities where required facilities and infrastructures are available; then no longer any chance for developing, emerging and small-developed countries to host the Games.

Significantly lowering the IOC prerequisites in terms of (brand new) sporting equipments, infrastructures (media, airports, etc.), ceremonies (?), size of delegations, = downsizing the Games transformed into a «less luxury good », the best way to combat their 'gigantism' and cost?

The only option to have the Games once hosted in developing countries (ex: in Africa).

External regular auditing of all expenditures from the allocation date on (my own suggestion above); likely to shrink the gap between *ex post* and *ex ante* cost.

Rotation sequence (rule) of the bid across the continents (more or less the implicit FIFA World Cup option) or other regional international subdivisions. Still cost overruns (Table 7 / FIFA WC) with aforementioned solutions.

The Lima 2017 ‘win-win’ formulae: allocating as many further Olympiads as the number of actual candidates; 2 candidates in 2024, allocated to 2024 and 2028. Imagine 3 candidates for 2032: one allocated to 2032, another one to 2036, the last one to 2040 = the auction-like process is stopped for the 2<sup>nd</sup> and 3<sup>rd</sup> one host cities; only the first allocated host city may be cursed.

## **Giving up the auction-like allocation process of the mega-sporting events**

- . Fix once and for all a Summer Olympics site (Olympia, 1996?); idem for the Winter Games.
- . Rotation across the few best hosting cities so far (3 Paris, London, LA; 2 Athens, Innsbruck, Lake Placid, Beijing, St Moritz, Tokyo?) endowed with infrastructures.
- . Distribution of the different Olympics sports contests across different competing candidate cities (UEFA Euro 2020 solution). The price to pay: low local economic impact (but at low cost).

Options with absolutely *no* chance of *cost overruns* (except if wrong management):

- . Allocation through a lottery across all potential (risk averse) candidate cities.
- . Discretionary authoritative IOC choice of a city (the most costly option for the IOC, then compelled to cover the overall cost of the Games).



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