



How others wargame is an intelligence tool

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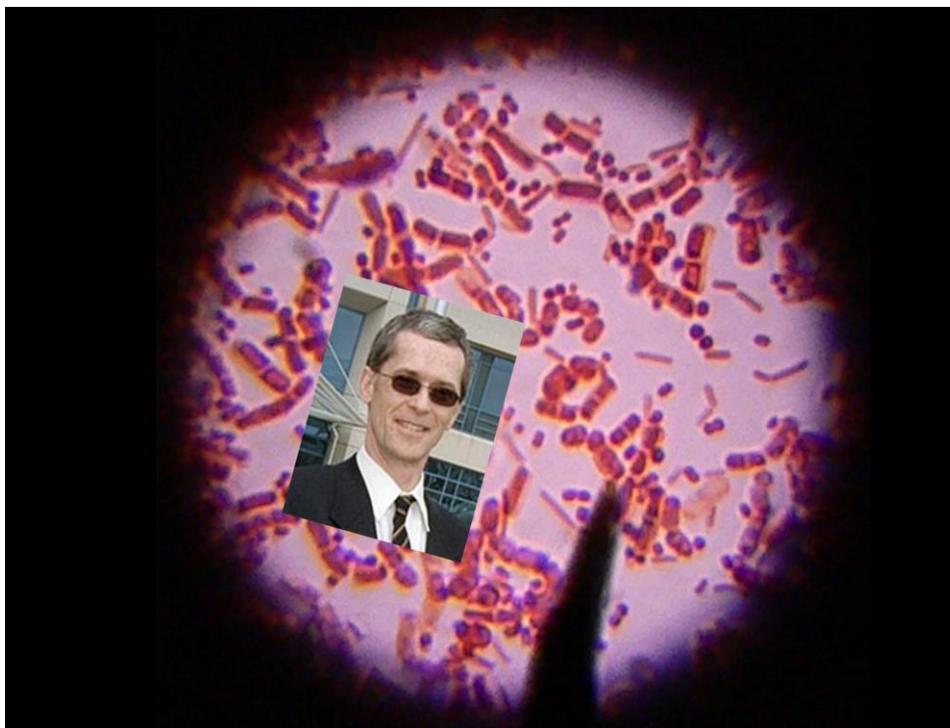


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Why Look at How Others Wargame?

This conference and the recent Connections USA conferences have addressed how specific militaries use wargaming -- for example the UK, Germany, Sweden, Latin American Countries and so on.

I was asked to look at what we do not know about how important militaries wargame. This creates a problem – what I don't know is a vast subject unsuitable for a 15 minute panel. However, the question has some interesting characteristics that make it worth creating an analytic framework for deciding what information to look for and why.



Stephen Downes-Martin

Dr. Stephen Downes-Martin has over 30 years of experience in developing and applying wargaming, game theory, decision analysis, and systems thinking to tactical, operational and strategic military problems for a wide variety of government, military, aerospace, and commercial organizations in the US and abroad. Stephen is currently a Research Professor at the US Naval War College, where his research focus is on how to manipulate decision support, analysis and assessment methods to deceive decision makers, how decision makers misuse such methods to deceive themselves, how to detect such attempts and protect decision makers from them. His education includes a PhD from London University, MA (with Distinction) from the US Naval War College (JPME Phase I), Master of Advanced Study (Mathematics) from Cambridge University, and industrial and academic courses in business management, science and technology, and liberal arts. Stephen has published widely, and has been an invited speaker in the US, Europe and the former Soviet Union on business, international security and technology issues. He was a reserve military intelligence officer in the British Army, and is now a US citizen. Stephen deployed to Helmand Province Afghanistan for spring 2010 to support Regional Command (South West) as the Commanding General's Assessments Advisor, for which he was awarded the Superior Civilian Service Medal. He deployed to ISAF HQ in Kabul for spring 2012 advising General Allen's Afghan Assessments Group.

His full bio can be viewed at:

<http://www.linkedin.com/pub/stephen-downes-martin/b/475/12>

Image: Streptococcus pyogenes
http://www.ehow.com/facts_5684939_causes-flesh-eating-bacteria_.html

	US \$m
USA	640221
China, P. R.	188460
Russia/USSR	87837
Saudi Arabia	66996
France	61228
UK	57891
Germany	48790
Japan	48604
India	47398
Korea, South	33937
Italy	32657
Brazil	31456
Australia	23963
Turkey	19085
Canada	18460
Israel	16032
Colombia	13003
Spain	12765
Taiwan	10530
Algeria	10402

2013 Military budgets in current US\$
Estimated by SIPRI

The usual suspects ... yawn
But ... who is missing?

China?
North Korea?
ISIL?
Hezbollah?



The Top Twenty of National Militaries?

First, it's reasonable to look at the world's militaries ranked by military budget. After all, these are the ones with which we should be concerned. There are several ways of measuring this, so I chose military budgets in current USD as estimates by the Stockholm International Peace Research Institute (SIPRI) and looked at the top 20 nations.

http://www.sipri.org/research/armaments/milex/milex_database/milex_database

The International Institute of Strategic Studies (IISS) publishes the "Military Balance" which provides, among other items, military expenditures. This is a for fee publication and so the tables are not available on line.

<http://www.iiiss.org/en/publications/military%20balance/issues/the-military-balance-2014-7e2c>

However Wikipedia has published a "top 15" list of military budgets for 2014 from "The Military Balance". This is similar to the SIPRI list with some disagreement at the bottom of the list.

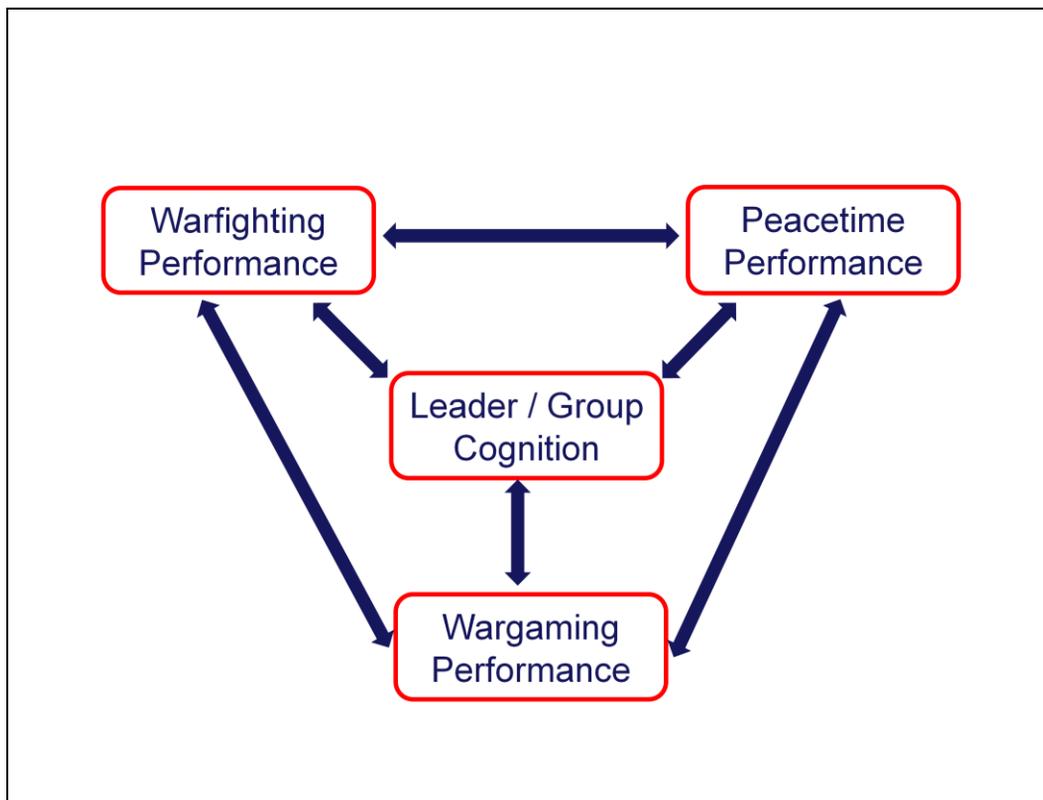
We notice three things:

First, the presence of militaries whose wargaming styles and methods we are already (and should be) studying -- European, China, Russia, Latin American, United States, and so on. But for some of these we know little about how they wargame, for example China.

Second however is the absence of others to which we should be paying attention, for example North Korea (who does not appear on this table since its military budget is unknown -- at least at the unclassified level and to SIPRI).

Third there is an entire class of militaries missing entirely because they are either non state or quasi state actors such as ISIL, Hezbollah, Hama, Haqani network and so on, or are national militaries whose budgets are either unknown or are too low to appear on the list of world's top 20 despite their importance, for example North Korea.

Looking at military budgets is not enough



Wargaming is an “Intelligence Tell”

It's not just that we might learn from them techniques for doing wargaming better ourselves, even though that is incredibly important. I believe that the hypothesis that how a military wargames tells us something about how they warfight is not disproven (despite the fact that decisions made during a game are not good indicators of what decisions even the same people might make in a war which the game is attempting to investigate – no matter how “realistic” the game). It's the beliefs and psychological biases of the players – indicated by wargaming – that they bring to the warfight that is important to understand. I.e. their cognitive approach to the actual fight.

(I am not talking here about the topics wargamed, but about the methods, techniques, styles of wargaming used.)

In addition, if studying the performance of individual leaders and officers during real life war planning and war fighting tells us something about how those leaders might behave in future conflicts, then the hypotheses that examining their performance during wargames tells us something about how they might perform during the actual conflict that is being gamed should be examined. Obviously the fact that a wargame is not reality (I have addressed this elsewhere) must be used to process the results. It is not the decisions made in a wargame that matter, it is the beliefs that surface during the game and how those beliefs drove the reasons behind the decisions that were made and those that were not.

“Adjudication: The Diabolus in Machina of Wargaming”, Stephen Downes-Martin, Naval War College Review 2013, Vol. 66, No. 3, pp. 67 – 80

Studying the wargaming approaches of a military and the wargame performance of selected military and political leaders should be a topic of intelligence collection.

		Purpose of wargaming				What else?
		Plan war	Explore concepts	Research future	Educate experientially	
Characteristics of the Wargamers	Identity of Wargamers					
	Culture, Education, etc	<div style="border: 2px solid blue; border-radius: 15px; padding: 10px;"> <p>Wargame Design and Execution</p> <ul style="list-style-type: none"> ➤ What would we expect to see in here? ➤ What do we see in here? ➤ What would that tell us? ➤ What do the gaps tell us? </div>				
	Competitive environment					
	Strategic objectives					
	Resources and constraints					
What else?						

Proposed Analytic Framework

I propose a two-dimensional analytic framework of "Purpose of Wargaming" and "Characteristics of the Wargamers" for each identified group that "does wargaming".

- Purpose of Wargaming: War planning, Concept exploration, Futures research, Experiential Education.
- Characteristics of the Wargamers: Cultural background, Competitive environment, Strategic objectives, resources and constraints.

For both of these it is obvious that others can be identified, and many of these overlap.

Each cell in the matrix (4 x 4 here, but this is just a suggested list for each dimension) generates intelligence questions for each military being examined and expected answers based on theoretical analysis. Differences between what we might expect and what we discover from real evidence will tell us how well we understand the motives and background of the wargamers ... and hence what we know about how they might plan, think and perform at war.

Competitive environment, Strategic objectives, Resources and constraints are part of the traditional targets of intelligence collection. We need to expand this to the many facets of cultural characteristics drawing on research not usually associated with wargaming.

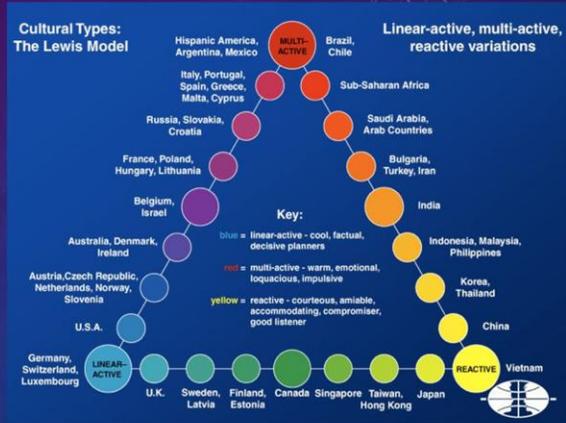
Some of these claim to apply to entire cultures, others are applied to specific individuals. Use the claims that these deal with whole cultures with suspicion. Mine the approaches for inspiration and apply them as well to individuals.

Slide from "Gaming Cultures: Some Observations from Peacebuilding Games"
 Gary Milante, Rex Brynan, Connections US 2014

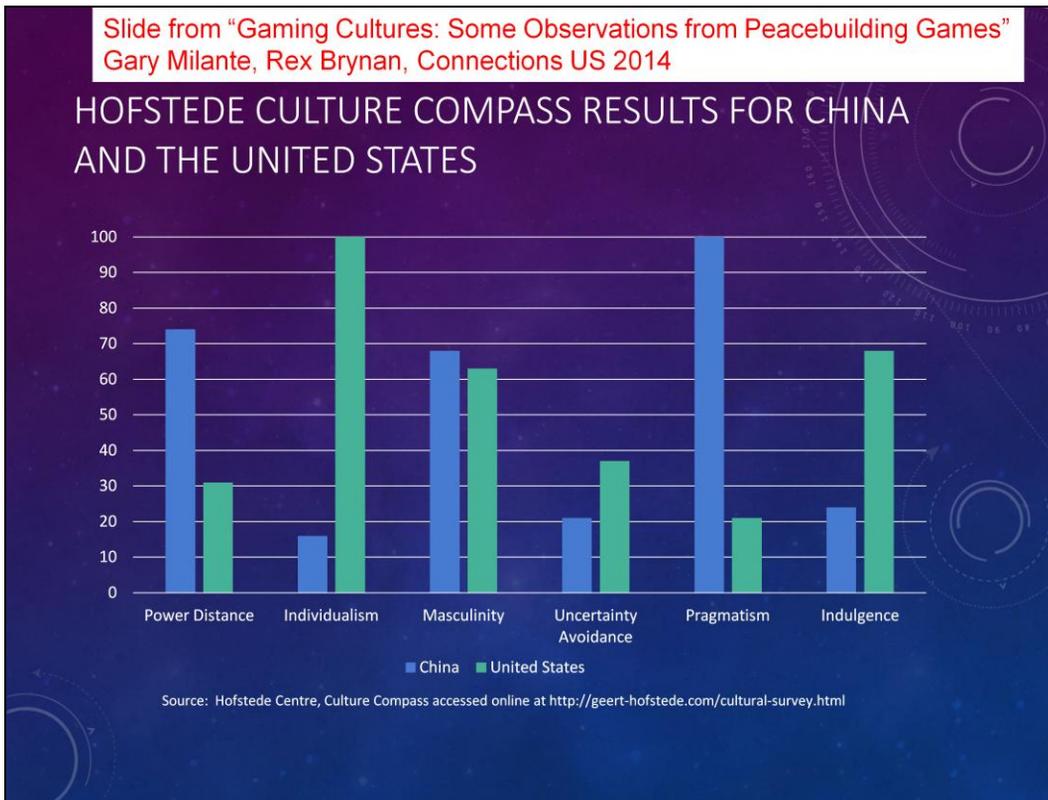
LEWIS MODEL OF CULTURAL TYPES

- "only those graduates in foreign languages, literature, philosophy or history are in some ways equipped to interact in a more meaningful way with foreign nationals..." – Richard D. Lewis, *When Cultures Collide*.

Linear-Active	Multi-Active	Reactive
Talks half of the time	Talks most of the time	Listens most of the time
Does one thing at the time	Does several things at once	Reacts to partner's action
Plans ahead step by step	Plans grand outline only	Looks at general principles
Polite but direct	Emotional	Polite, indirect
Confronts with logic	Confronts emotionally	Never confronts
Job-oriented	People-oriented	Very people-oriented
Sticks to facts	Feelings before facts	Statements are promises
Result-oriented	Relationship-oriented	Harmony-oriented
Sticks to agenda	Roams back and forth	Often asks for "repeats"
Written word important	Spoken word important	Face-to-face contact important
Restrained body language	Unrestrained body language	Subtle body language



Lewis Model



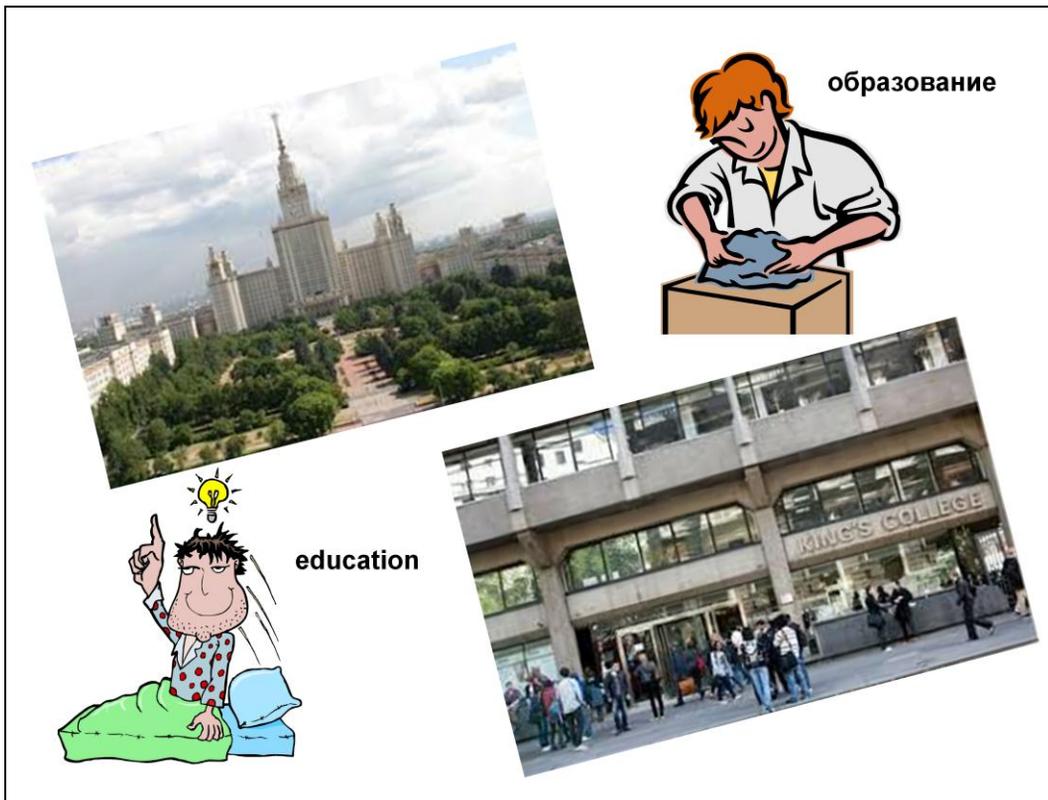
Hofstede culture compass results for China and the United States

See also the Lewis Model of Cultural Types described in
Lewis, R. (2005) "When Cultures Collide"

Slide from "Exploration of the Use of Reflective Practice"
Shawn Burns, Connections US 2014

The image is a composite of three elements. On the left, there are two book covers. The top one is 'The Reflective Practitioner: How Professionals Think in Action' by Donald A. Schön. The bottom one is 'Educating the Reflective Practitioner' by Donald A. Schön. On the right is a presentation slide for the 'XXXIX Inter-American War Game 2013' held in Newport, RI, United States. The slide features a globe with the Americas highlighted in blue, a banner with the event name, the year and location, and a row of national flags from various countries. There are also two red arrows pointing from the book covers towards the slide.

How does education drive professional behavior?



Example: Education in Russia and England

English (Education):

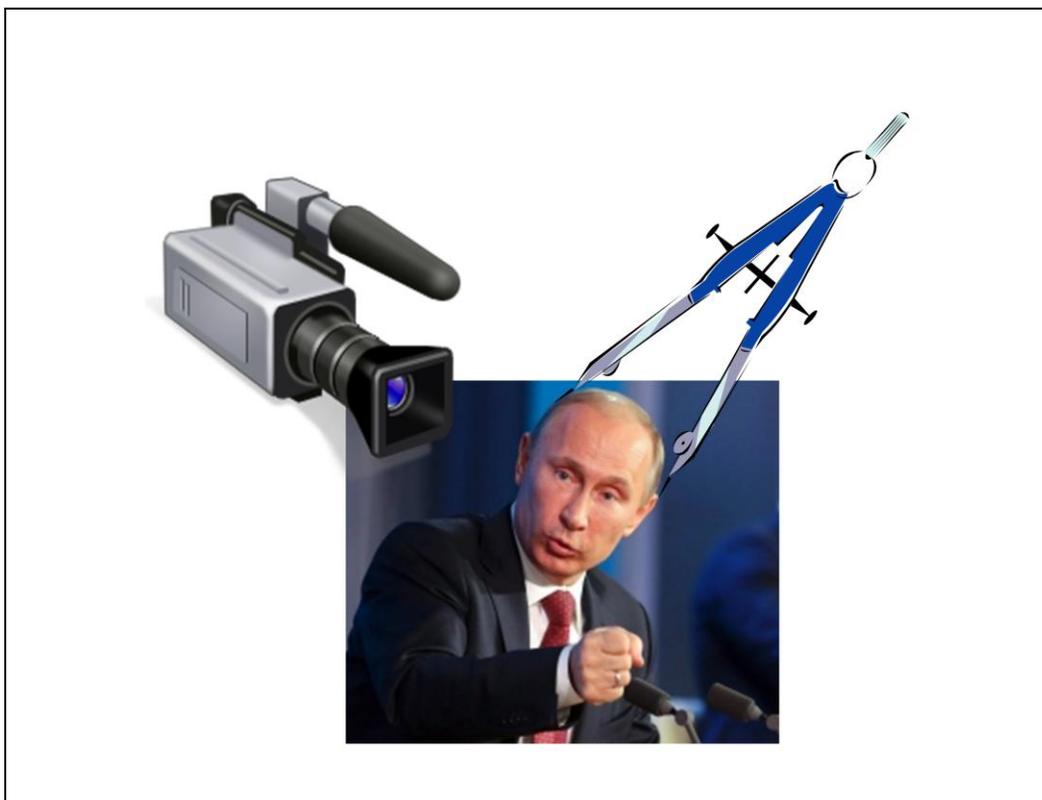
- From the Latin “ex-ducere”
- To “bring out”, “lead forth”, “expand” the mind

Compare to Russian: образование

- To “form” or “mold” the mind

Very different meanings of the word between different cultures.

What are the implications for how officers and political leaders think, plan and act in peacetime, wargames, and war, and the connections between these?



Leadership Profiling

1. Analysis of micro expressions, gestures and body language to detect stress, lying and other characteristics of leaders -- ONA "Body Leads Project" / Dr. Brenda Connors

See Stars and Stripes", Monday Aug 25, 2014

(<http://www.stripes.com/news/us/pentagon-studies-putin-s-body-language-for-hint-of-intent-1.271748>)

"Pentagon studies Putin's body language for hint of intent

A Pentagon research team is studying the body movements of Russian President Vladimir Putin and other world leaders in order to better predict their actions and guide U.S. policy, Pentagon documents and interviews show.

The "Body Leads" project backed by the Office of Net Assessment (ONA), the think tank reporting to Defense Secretary Chuck Hagel, uses the principles of movement pattern analysis to predict how leaders will act. ..."

2. Political Personality Profiling by the CIA / Dr. Jerry Post

Can we use this to examine leaders who wargame, or use how they wargame to assist in profiling them, in such a way that we gain insight into how they might warfight?

See for example "The Psychological Assessment of Political Leaders With Profiles of Saddam Hussein and Bill Clinton" edited by Jerrold M. Post

(http://www.press.umich.edu/23492/psychological_assessment_of_political_leaders#sthash.KXSXufMm.dpuf)



Some Specifics

- Russia** Lots of evidence from cold war of operational and strategic level warfighting. What has changed since then?
- ISIL, Hamas, Hezbollah** I am aware of evidence they do operational assessment, but I am unaware of any evidence describing how they wargame.
- North Korea** I am unaware of any evidence describing how they wargame. Probably Soviet style.
- China** Lots of evidence for field exercises, computer simulations, tactical drills. I am unaware of any evidence describing how they wargame.

Vladimir Vladimirovich Putin, President of Russia

Abu Bakr al-Baghdadi, Caliph of the Islamic State

Kim Jong-un, Supreme Leader North Korea

General Chang Wanquan, Minister of National Defense China



Questions?

Clearly there are critical gaps in our knowledge of how our adversaries wargame.

How does studying how they wargame tell us about how they think, plan and act in war?

Should how others wargame be an intelligence collection priority?

Image: Lawrence Olivier and Dustin Hoffman in the 1976 movie "Marathon Man"