



UNIVERSITY OF  
CAMBRIDGE



LEVERHULME CENTRE FOR THE  
**FUTURE OF INTELLIGENCE**

# Intelligence as Ideology

## Its History and Future

Dr Stephen Cave  
Executive Director, CFI  
University of Cambridge  
[@stephenjcave](#)



LEVERHULME CENTRE FOR THE  
FUTURE OF INTELLIGENCE

[ABOUT](#)

[PROGRAMMES](#)

[TEAM](#)

[CAREERS](#)

[NEWS](#)

[EVENTS](#)

[CONTACT](#)

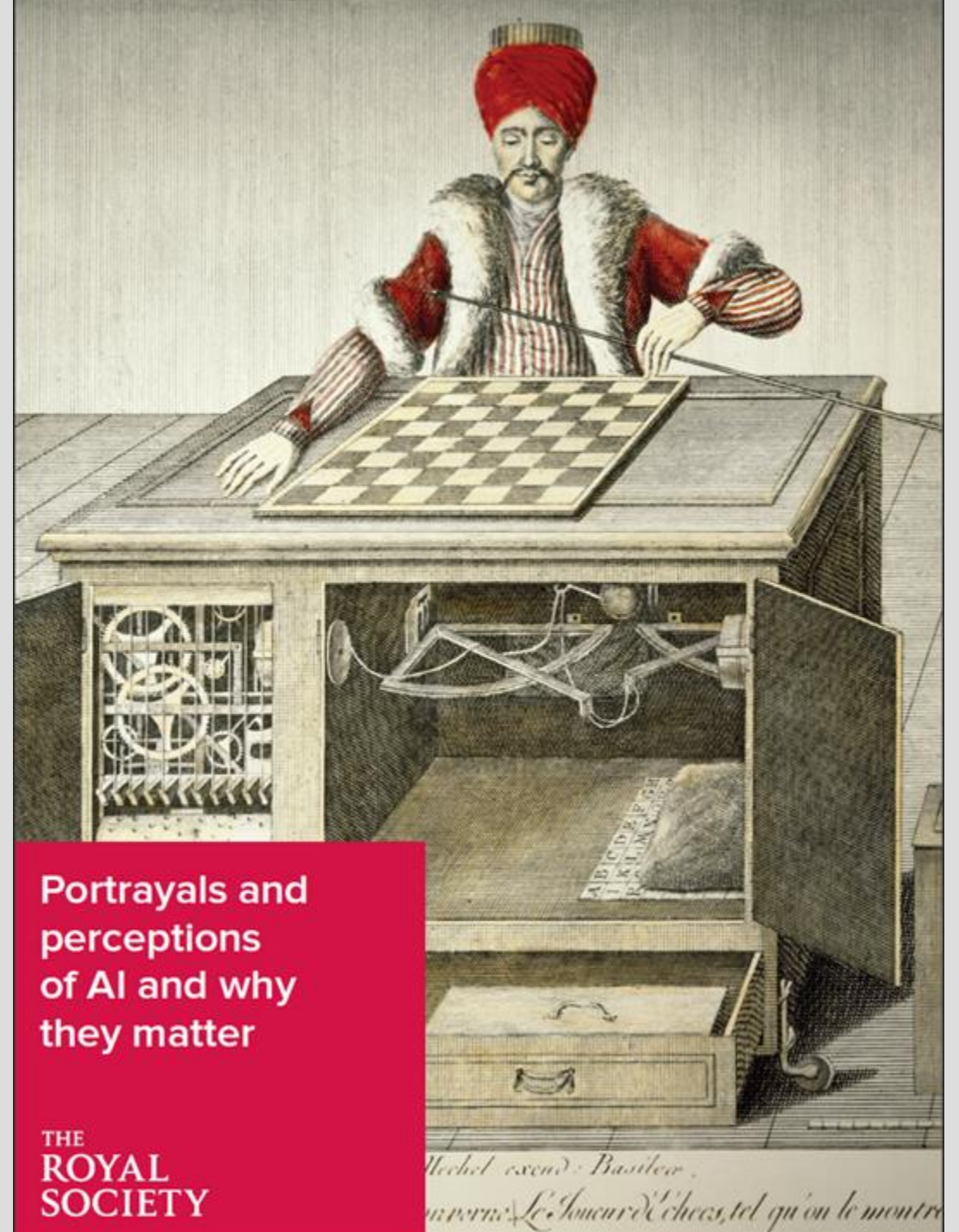
# EXPLORING THE IMPACT OF ARTIFICIAL INTELLIGENCE



## AI NARRATIVES PROJECT

Leverhulme Centre for the Future of  
Intelligence and the Royal Society

[bit.ly/NarrativesAI](https://bit.ly/NarrativesAI)



## **Three parts:**

Part 1: Intelligence as Ideology - its Present

Part 2: Intelligence as Ideology - its History

Part 3: Intelligence as Ideology - its Future

Three parts:

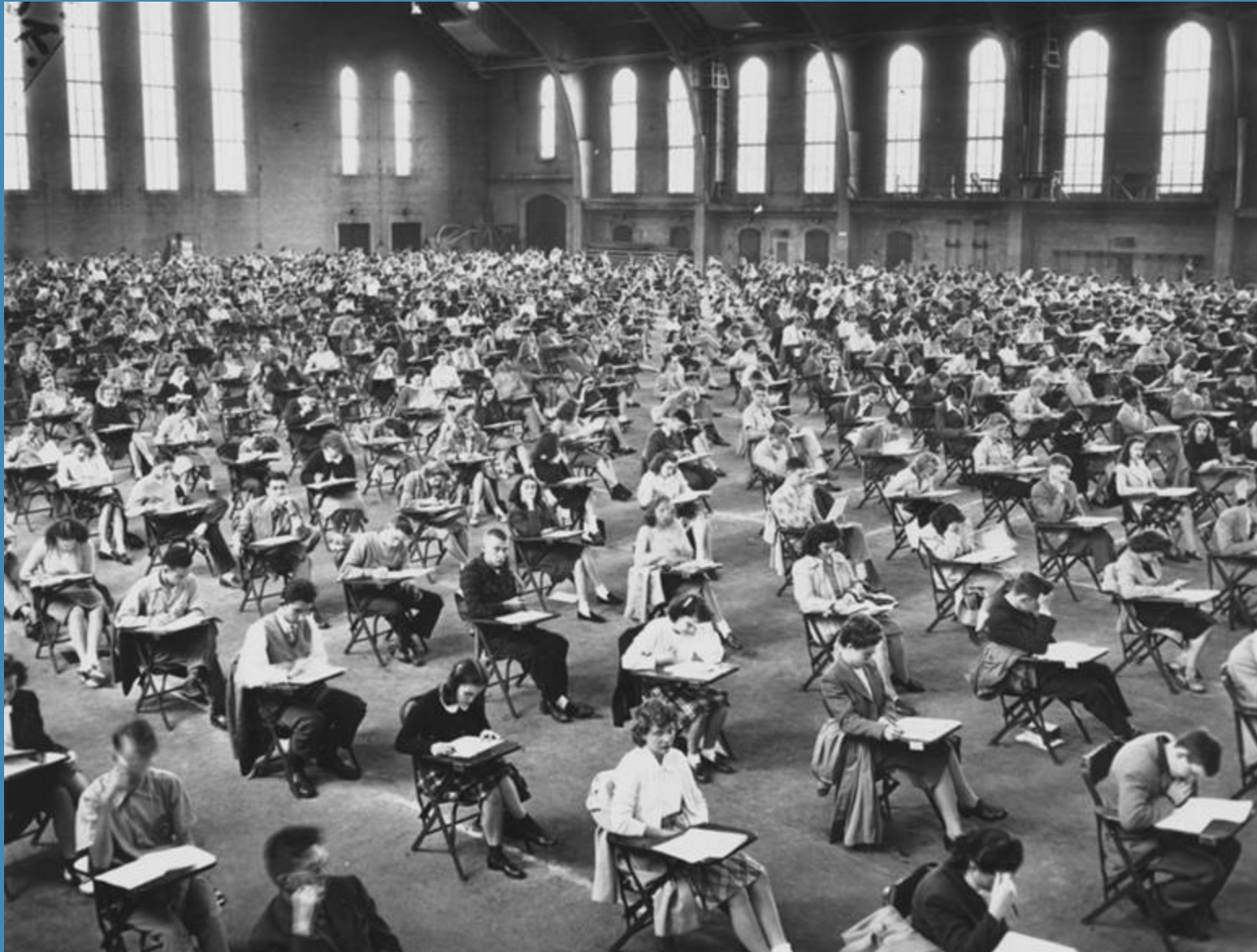
**Part 1: Intelligence as Ideology - its Present**

Part 2: Intelligence as Ideology - its History

Part 3: Intelligence as Ideology - its Future



## Part 1: Intelligence as Ideology - its **Present**



*Some current widespread views about intelligence:*

*Some current widespread views about intelligence:*

1. Intelligence is a general, unitary capacity



*Some current widespread views about intelligence:*

1. Intelligence is a general, unitary capacity
2. It can be measured

*Some current widespread views about intelligence:*

1. Intelligence is a general, unitary capacity
2. It can be measured
3. Intelligence is an (perhaps the most) important determinant of a person's potential

*Some current widespread views about intelligence:*

1. Intelligence is a general, unitary capacity
2. It can be measured
3. Intelligence is an (perhaps the most) important determinant of a person's potential
4. Measurement of intelligence should therefore be used to determine people's lot in life

151 views | Jun 24, 2019, 02:50pm

# Can The AI Economy Really Be Worth \$150 Trillion By 2025?



**Andrew Cave** Contributor   
Leadership Strategy

f

“

t

in



GETTY

Can AI really be worth \$150 Trillion within six years? (photo credit: Getty)

Artificial intelligence is set to transform global productivity, working patterns and lifestyles and create enormous wealth.

News &gt; Science

# Stephen Hawking: 'Transcendence looks at the implications of artificial intelligence - but are we taking AI seriously enough?'

Success in creating AI would be the biggest event in human history. Unfortunately, it might also be the last, unless we learn how to avoid the risks, says a group of leading scientists

**Stephen Hawking** , **STUART RUSSELL** , **Max Tegmark** ,  
**Frank Wilczek** | Thursday 1 May 2014 21:30 | 351 comments



Click to follow  
The Independent

“The potential benefits are huge; everything that civilisation has to offer is a product of human intelligence; we cannot predict what we might achieve when this intelligence is magnified by the tools that AI may provide, but the eradication of war, disease, and poverty would be high on anyone's list. Success in creating AI would be the biggest event in human history.”

*Hawking, Russell, Tegmark, Wilczek 2014*



“The potential benefits are huge; **everything that civilisation has to offer is a product of human intelligence**; we cannot predict what we might achieve when this intelligence is magnified by the tools that AI may provide, but the eradication of war, disease, and poverty would be high on anyone's list. Success in creating AI would be the biggest event in human history.”

*Hawking, Russell, Tegmark, Wilczek 2014*

“Looking further ahead, there are no fundamental limits to what can be achieved: there is no physical law precluding particles from being organised in ways that perform even more advanced computations than the arrangements of particles in human brains. An explosive transition is possible... **machines with superhuman intelligence** could repeatedly improve their design even further.”

*Hawking, Russell, Tegmark, Wilczek 2014*

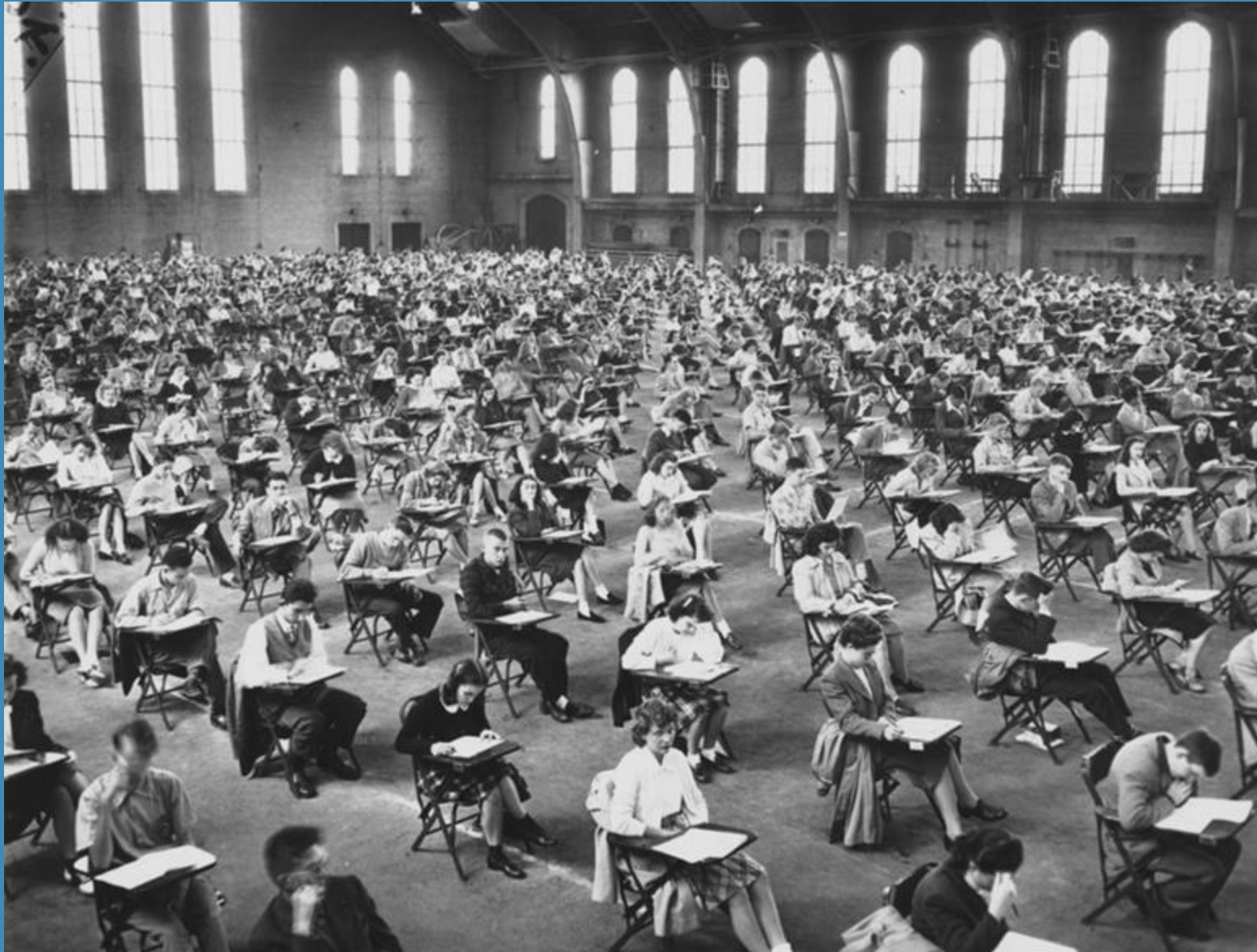
Three parts:

Part 1: Intelligence as Ideology - its Present

**Part 2: Intelligence as Ideology - its History**

Part 3: Intelligence as Ideology - its Future

## Part 2: Intelligence as Ideology - its **History**







*Two themes historically in tension:*

1. Many people think intelligence does *not* distinguish people and is *not* particularly important.
2. Some people (like Plato and Aristotle) think intelligence *does* distinguish people and *is* very important -- and can be used to justify and naturalise a dominance hierarchy.

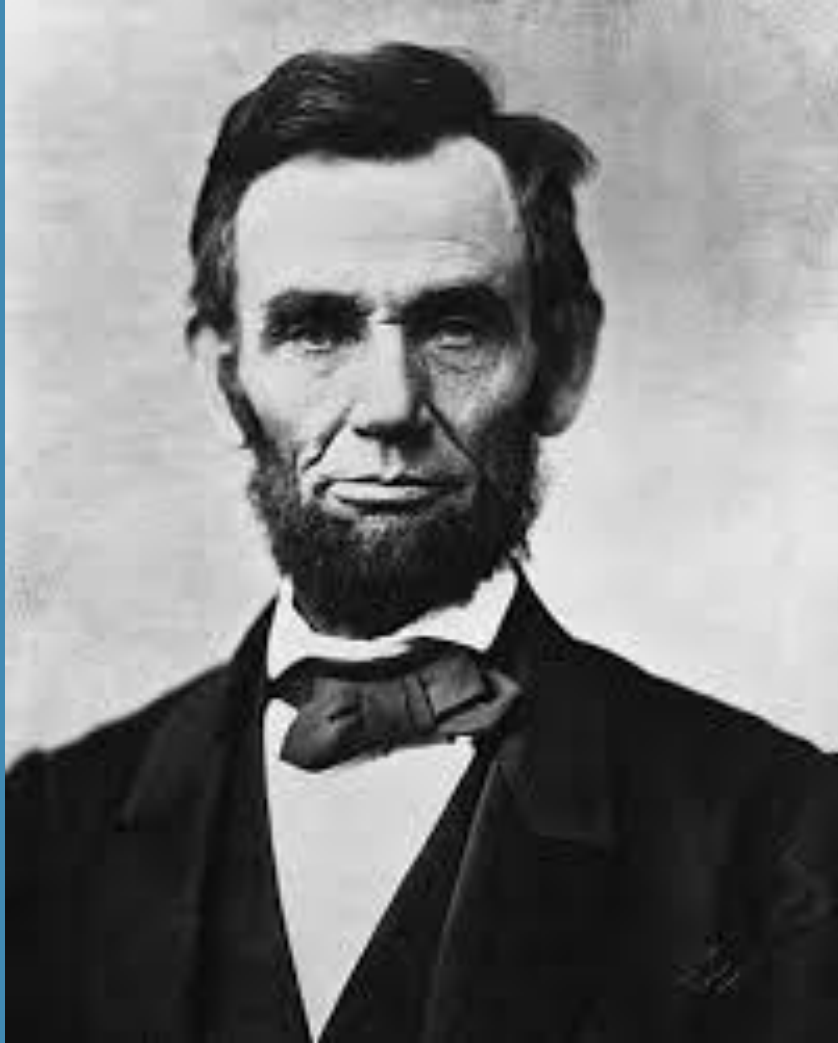


PUCK



FROM THE CAPE TO CAIRO.

THOUGH THE PROCESS BE COSTLY, THE ROAD OF PROGRESS MUST BE CUT.



“There is a physical difference between the white and black races which I believe will forever forbid the two races living together on terms of social and political equality. And inasmuch as they cannot so live, while they do remain together there must be the position of superior and inferior, and I as much as any other man am in favour of having the superior position assigned to the white race.”

*Abraham Lincoln*



# From Nott and Gliddon *Types of Mankind* (1856)

FIG. 339. — Apollo Belvidere.<sup>533</sup>



FIG. 340.<sup>534</sup>



Greek.

FIG. 345.<sup>539</sup>



Orang-Outan.

FIG. 346.<sup>540</sup>



Hottentot Wagoneer — Caffre War.

FIG. 341. — Negro.<sup>536</sup>



FIG. 342.<sup>537</sup>



Creole Negro.

FIG. 347.<sup>546</sup>



Chinapanzan.

FIG. 348.<sup>542</sup>



Hottentot from Somerset.

FIG. 343. — Young Chinapanzan.<sup>535</sup>



FIG. 344.<sup>538</sup>



Young Chinapanzan.

FIG. 349.



Molle Negro, 1822.

FIG. 350.



Molle Negro, 1824.

FIG. 351.



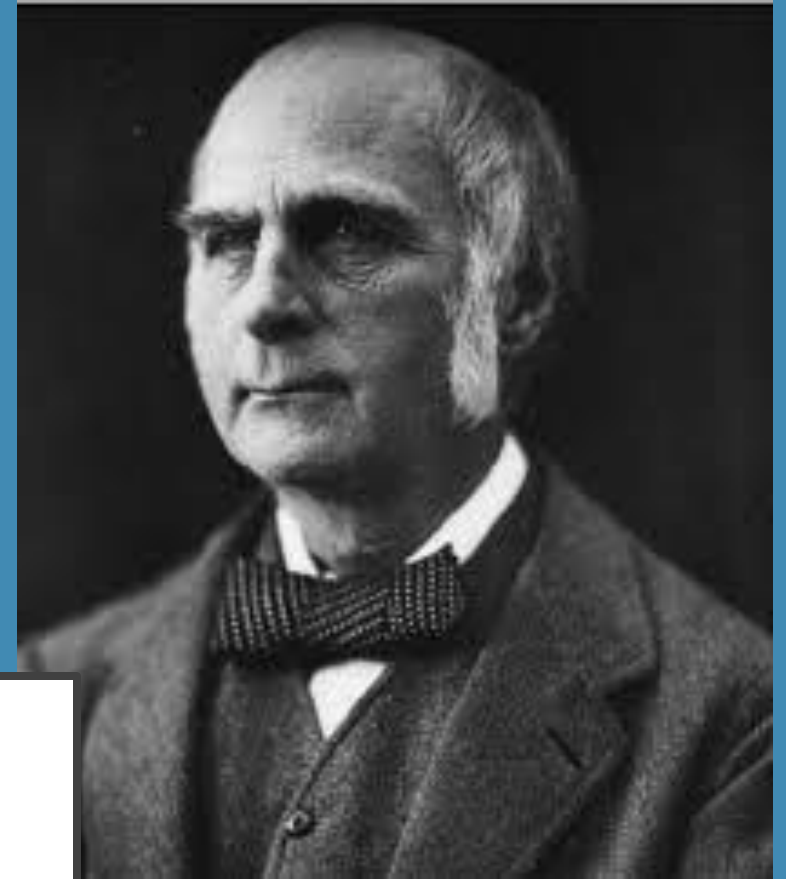
Negro, 2200 years old [supra, pp. 250-251].

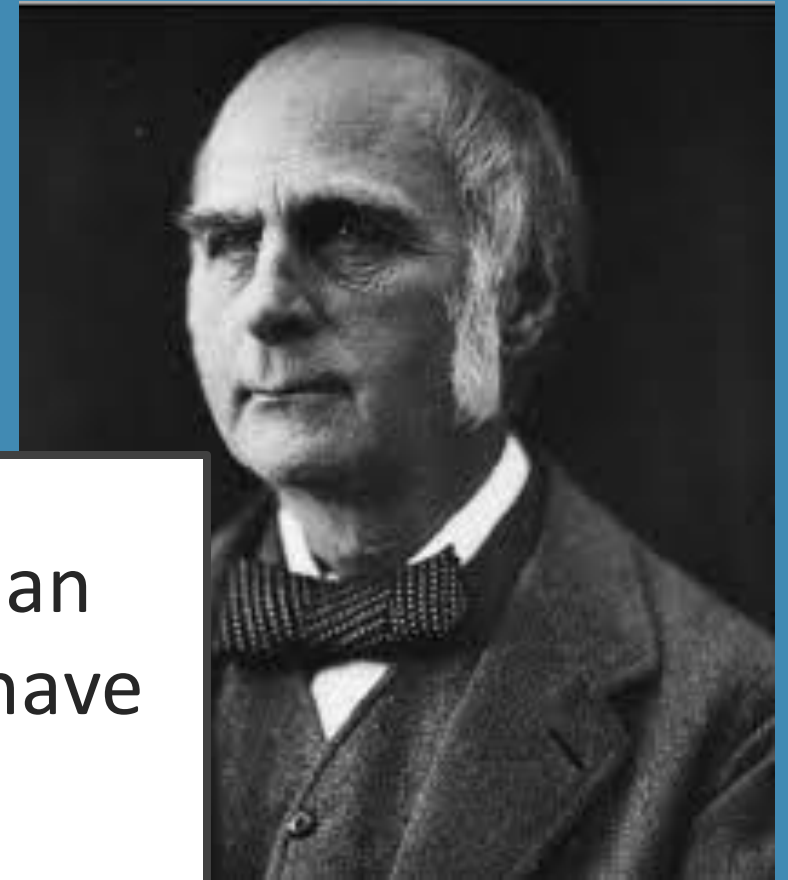
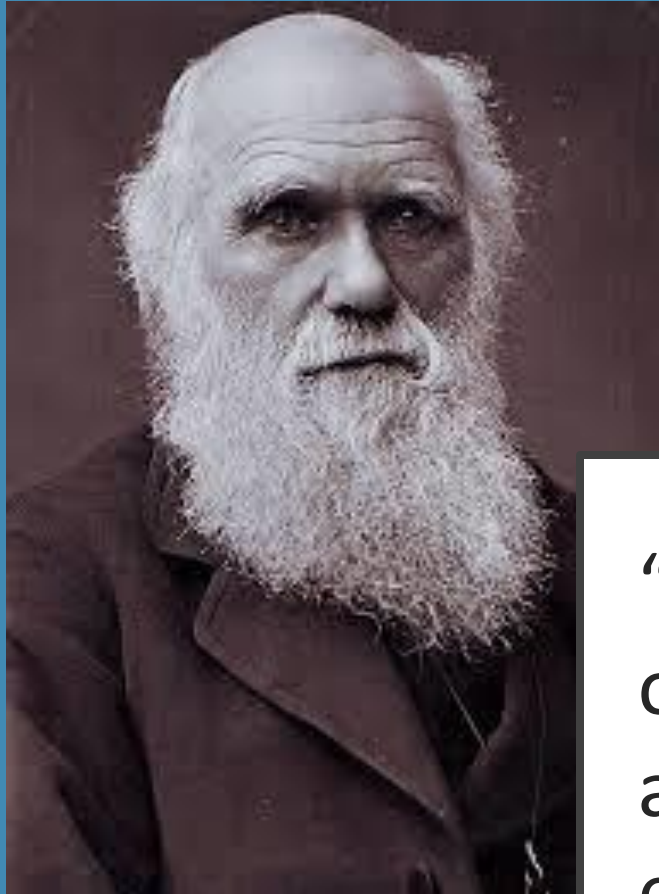
FIG. 352.



Nalana, 2200 years old.

Francis Galton, FRS  
*Hereditary Genius*, 1869





“You have made a convert of an opponent in one sense, for I have always maintained that, excepting fools, men did not differ much in intellect, only in zeal and hard work.”

*Charles Darwin to Francis Galton*



“The tests have told the truth...

Their dullness seems to be racial,  
or at least inherent in the family  
stocks from which they came.”

*Lewis Terman, inventor of the Stanford-Binet  
IQ test, 1916*





“It is also possible to make a picture of the elements now entering into American intelligence. At one extreme we have the distribution of the Nordic race group. At the other extreme we have the American negro. Between the Nordic and the negro, but closer to the negro than to the Nordic, we find the Alpine and Mediterranean types.”

*Carl Brigham, inventor of the SAT, 1923*

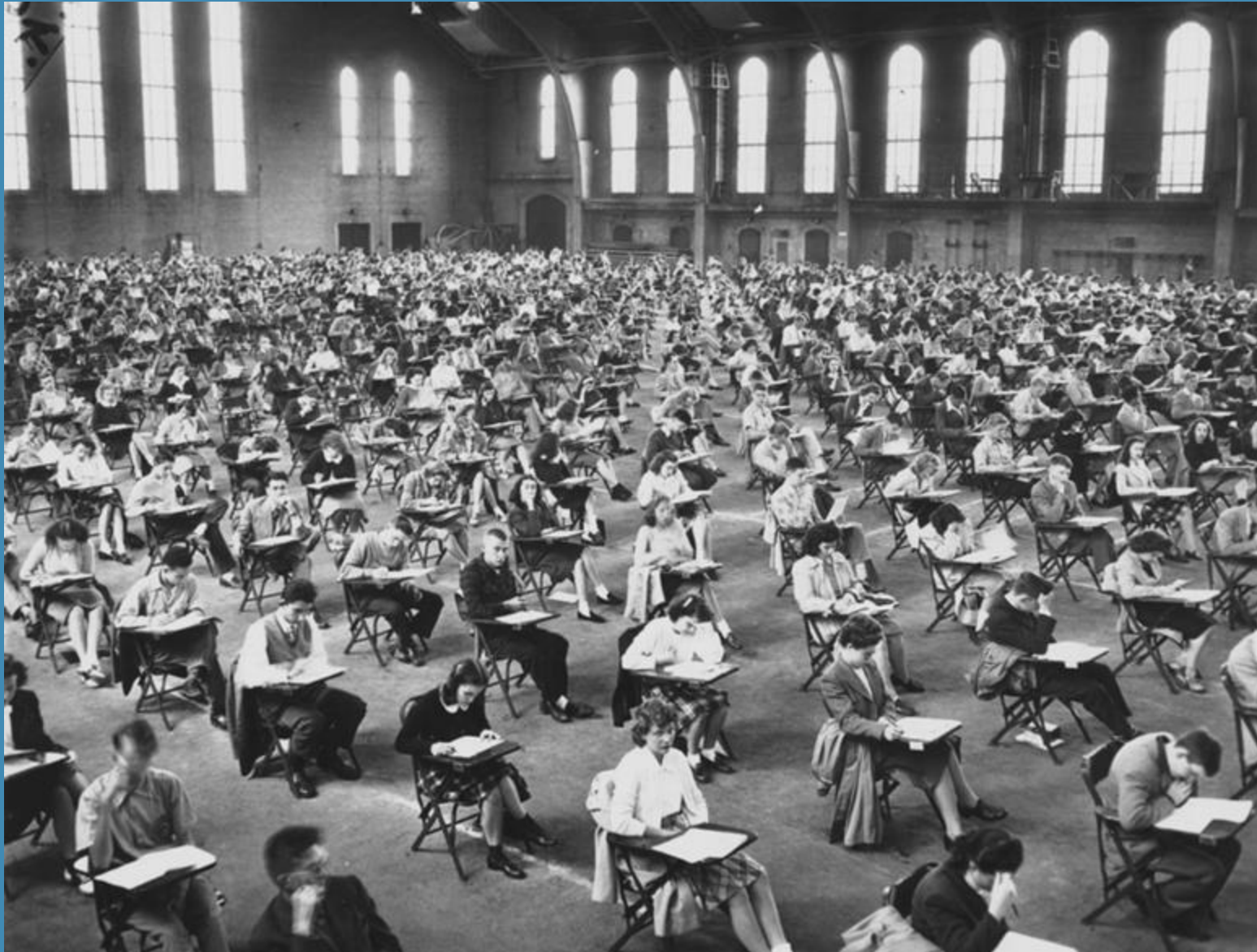
Three parts:

Part 1: Intelligence as Ideology - its Present

Part 2: Intelligence as Ideology - its History

**Part 3: Intelligence as Ideology - its Future**

## Part 3: Intelligence as Ideology - its **Future**



“The potential benefits are huge; **everything that civilisation has to offer is a product of human intelligence**; we cannot predict what we might achieve when this intelligence is magnified by the tools that AI may provide, but the eradication of war, disease, and poverty would be high on anyone's list. Success in creating AI would be the biggest event in human history.”

*Hawking, Russell, Tegmark, Wilczek 2014*

*The ideology of intelligence in the age of AI:*

**1. Favours the white, privileged western male**

eg, perpetuates biased cult of 'brilliance'

**2. Misdirects concerns about the impact of AI**

eg, towards risk of 'superintelligence', or towards professional workers



UNIVERSITY OF  
CAMBRIDGE



LEVERHULME CENTRE FOR THE  
**FUTURE OF INTELLIGENCE**

# Intelligence as Ideology

## Its History and Future

Dr Stephen Cave  
Executive Director, CFI  
University of Cambridge  
[@stephenjcave](#)