



# **PSI2617 – Inovação em Engenharia**

## ***Highlights do Curso***

**27 Fevereiro 2018**

**Prof. Leopoldo Yoshioka**

Quais dessas empresas você reconhece?



## Ranking das Empresas mais Inovadoras do Mundo (Forbes, 2017)



# 1 (1)



# 7



# 2 (2)



# 8 (7)

REGENERON

# 3 (4)



# 9



# 4 (7)

BIOMARIN

# 10 (10)

ALEXION

# 5 (3)

amazon.com

# 11 (8)



# 6 (9)

ARM

# 12 (5)

#1

# TESLA

## THE CAR THAT PAYS FOR ITSELF

In July Elon Musk announced "Part Deux" of Tesla's plan: building an autonomous vehicle that owners can summon by app and send out as an on-demand, self-driving taxi, offsetting the car's costs.

[GO TO FULL PROFILE >](#)

- Sistemas mecânicos melhoram cerca de 1% ao ano
- Sistemas elétricos e baterias melhoram cerca de 7% ao ano, ou seja, dobram o desempenho a cada 10 anos
- Sistemas computacionais e softwares melhoram 70% ao ano, ou seja dobram de desempenho a cada 18 meses (Lei de Moore).

# Ranking das Empresas mais Inovadoras do Mundo (Forbes, 2017)



# 1 (1)



# 12 (5)



# 2 (2)



# 11 (8)



# 3 (4)



# 4 (7)



# 5 (3)



# 10 (10)



# 9



# 7

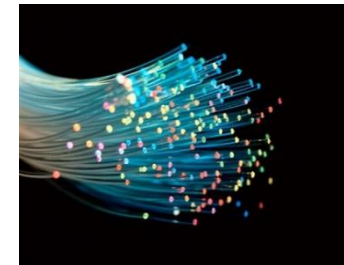
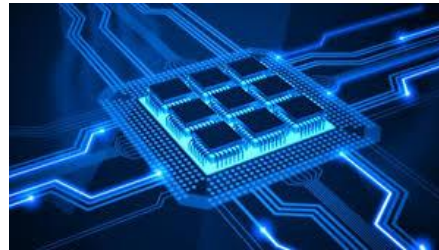
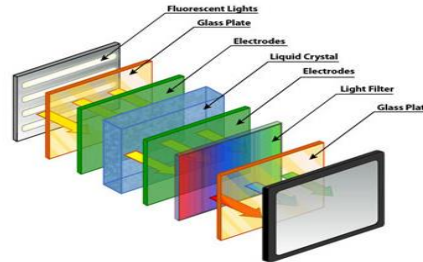
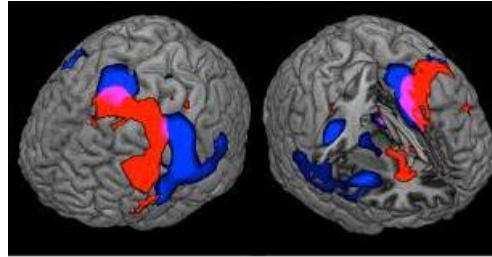
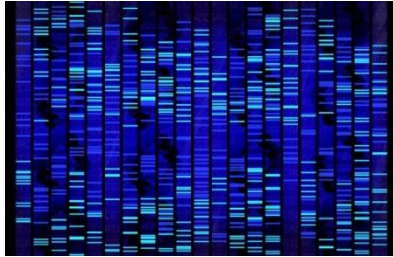


# 8 (7)



# 6 (9)

# As Maiores Inovações no últimos 30 anos



## QUIZ #5: Maiores inovações nos últimos 30 anos (Wharton)

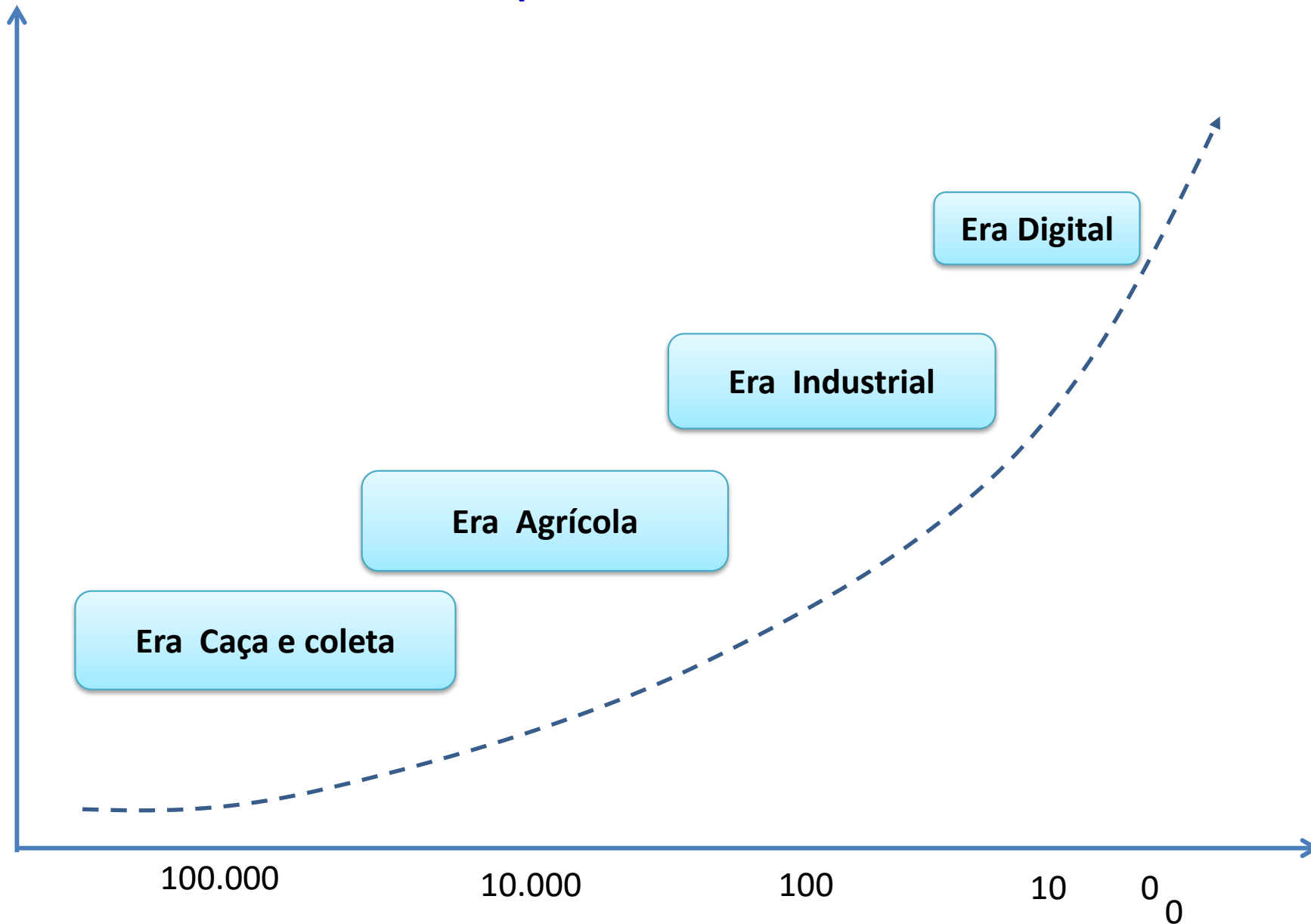
RANK	INOVAÇÃO
1	Internet, broadband, WWW (browser and html)
2	PC/laptop computers
3	Mobile phones
4	Email
5	DNA testing and sequencing/Human genome mapping
6	Magnetic Resonance Imaging (MRI)
7	Microprocessors
8	Fiber optics
9	Office software (spreadsheets, word processors)
10	Non-invasive laser/robotic surgery (laparoscopy)
11	Open source software and services (e.g., Linux, Wikipedia)
12	Light emitting diodes
13	Liquid crystal display (LCD)
14	GPS systems
15	Online shopping/ecommerce/auctions (e.g., eBay)



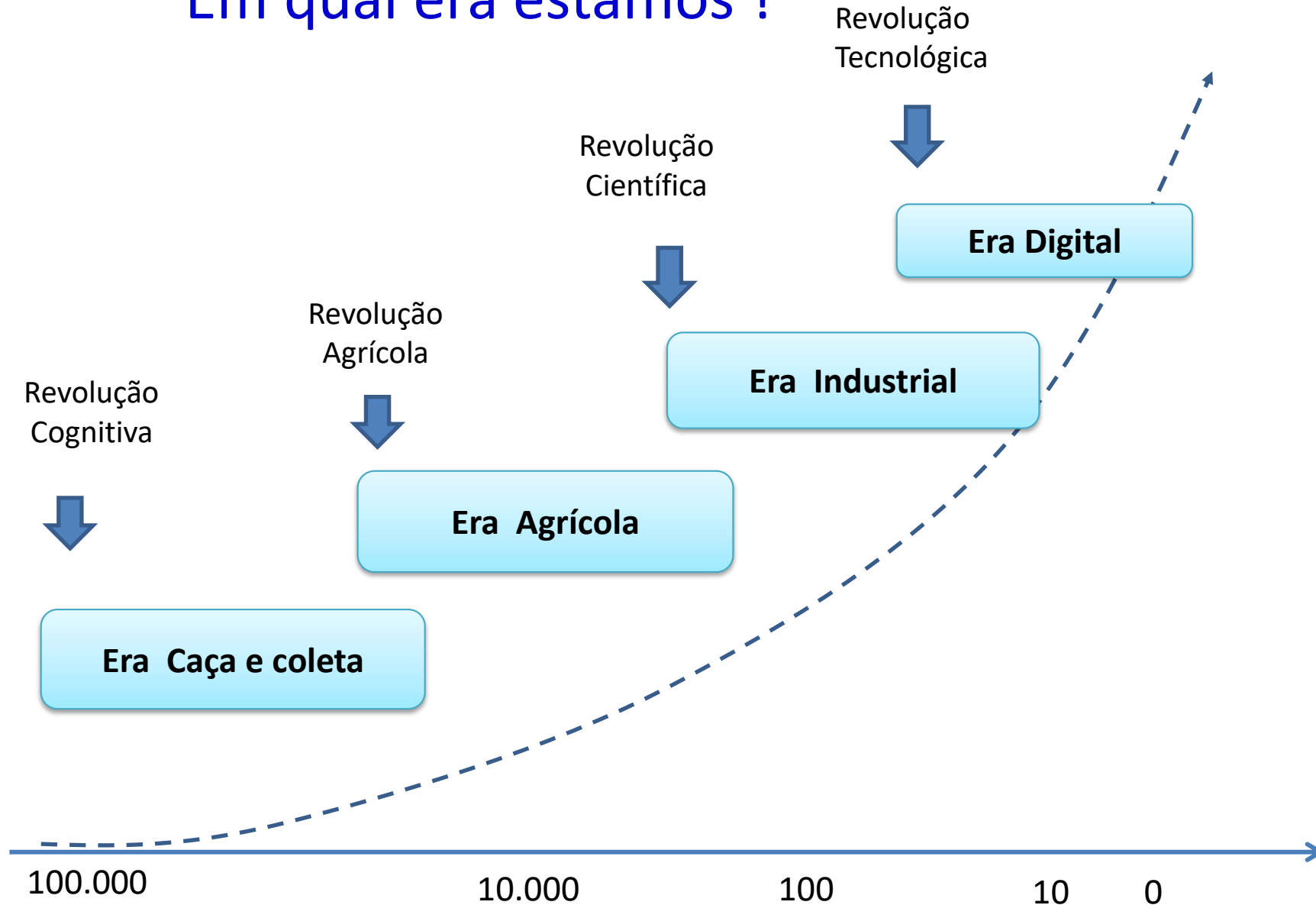


Em qual era estamos ?

# Em qual era estamos ?



# Em qual era estamos ?



O que há de comum ?



1 pessoa para fabricar



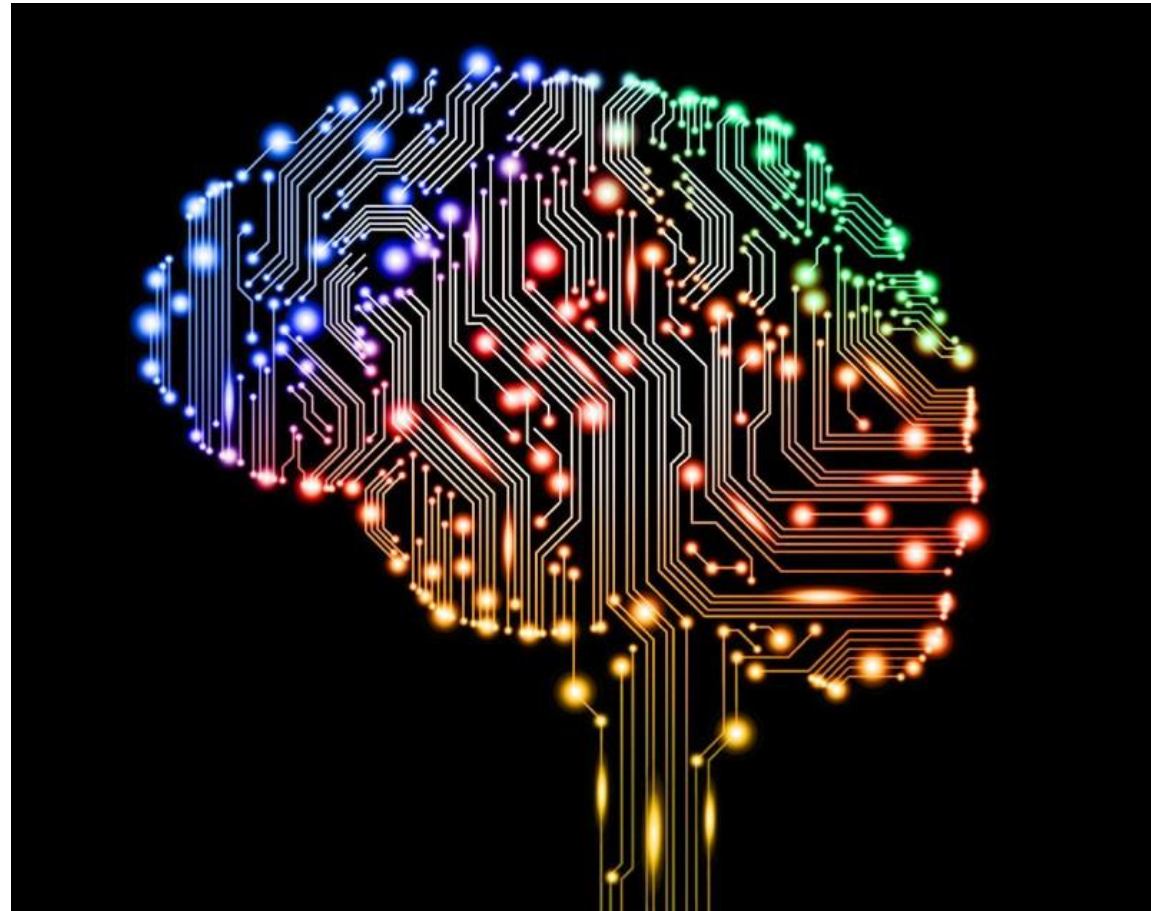
Pelo menos 1 milhão de  
pessoas participaram para  
fabricar



Vários milhões de pessoas  
participaram para fabricar

Qual será o impacto da Inteligência Artificial nas nossas vidas?

80% de todos os trabalhos já podem ser substituídos, com a tecnologia disponível, por máquinas, que estão cada vez mais melhores em aprender.



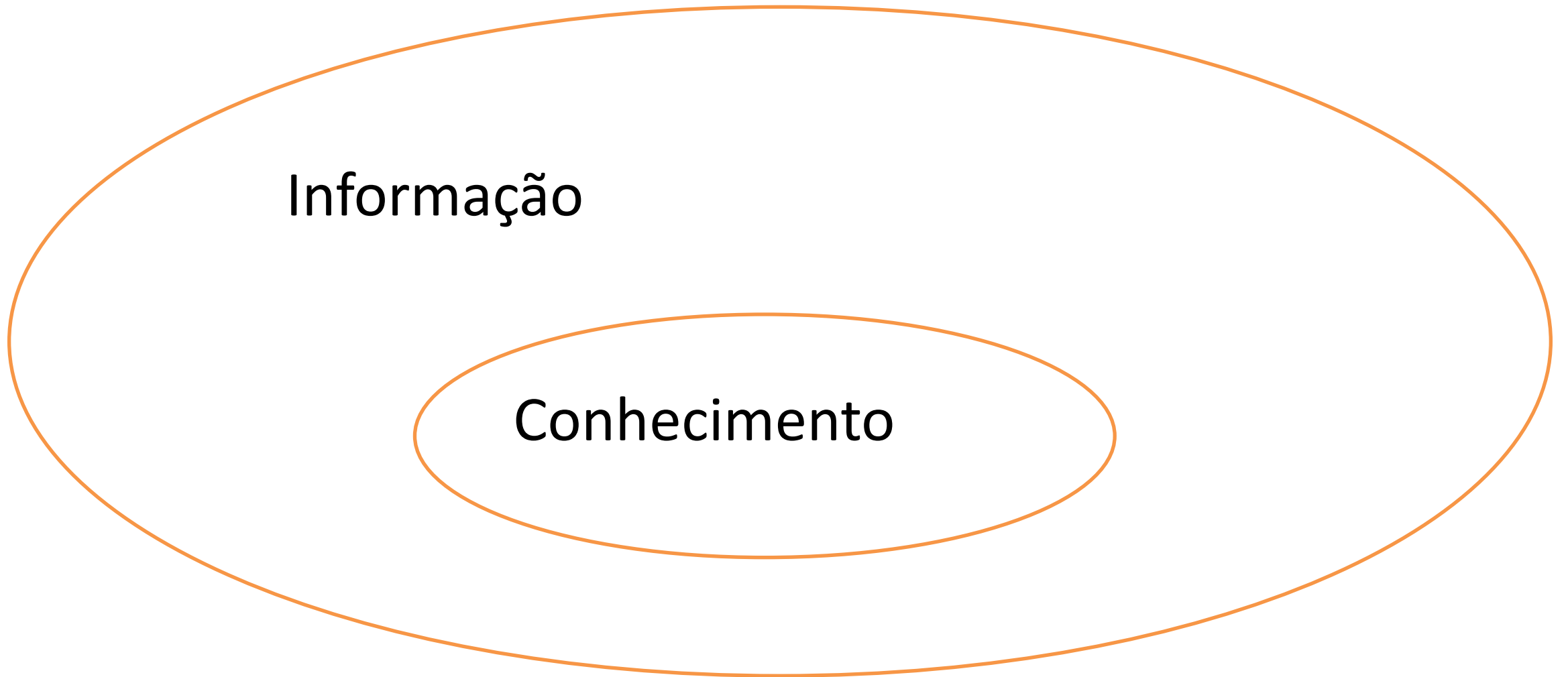
Alvert Wenger  
Union Square Ventures

# World After Capital

Albert Wenger

[worldaftercapital.org](http://worldaftercapital.org)

# Da Era da Informação para a Era do Conhecimento





Dados

Informação

Conhecimento

Yuval Noah  
Harari



# Sapiens

A Brief

History of  
Humankind



How a Group of Hackers,  
Geniuses and Geeks  
Created the Digital  
Revolution



the **INNOVATORS**



**Walter  
Isaacson**  
Author of *STEVE JOBS*



# STEVEN JOHNSON

## DE ONDE VÊM AS BOAS IDEIAS

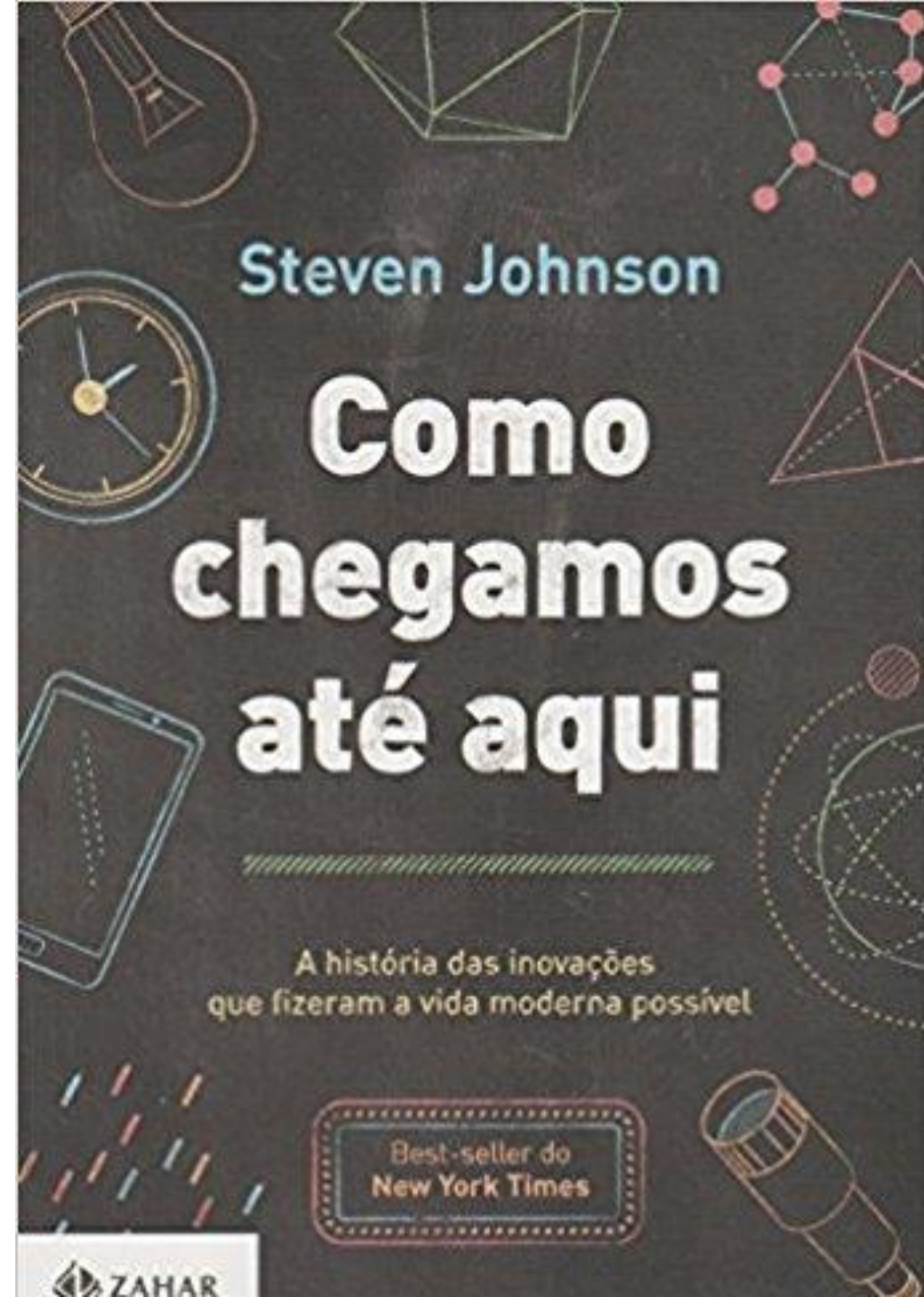
AUTOR **BEST-SELLER**  
**DOS LIVROS**

*CULTURA DA INTERFACE*

*O MAPA FANTASMA*

*DE CABEÇA ABERTA*

*EMERGÊNCIA*



# PEERS INC



How People and Platforms are  
Inventing the Collaborative Economy  
*and* Reinventing Capitalism

ROBIN CHASE

*cofounder of* ZIPCAR



"Sundararajan offers an insightful guide to the forces  
shaping our economy today—and tomorrow."  
HAL VARIAN, Chief Economist, Google

# THE SHARING ECONOMY

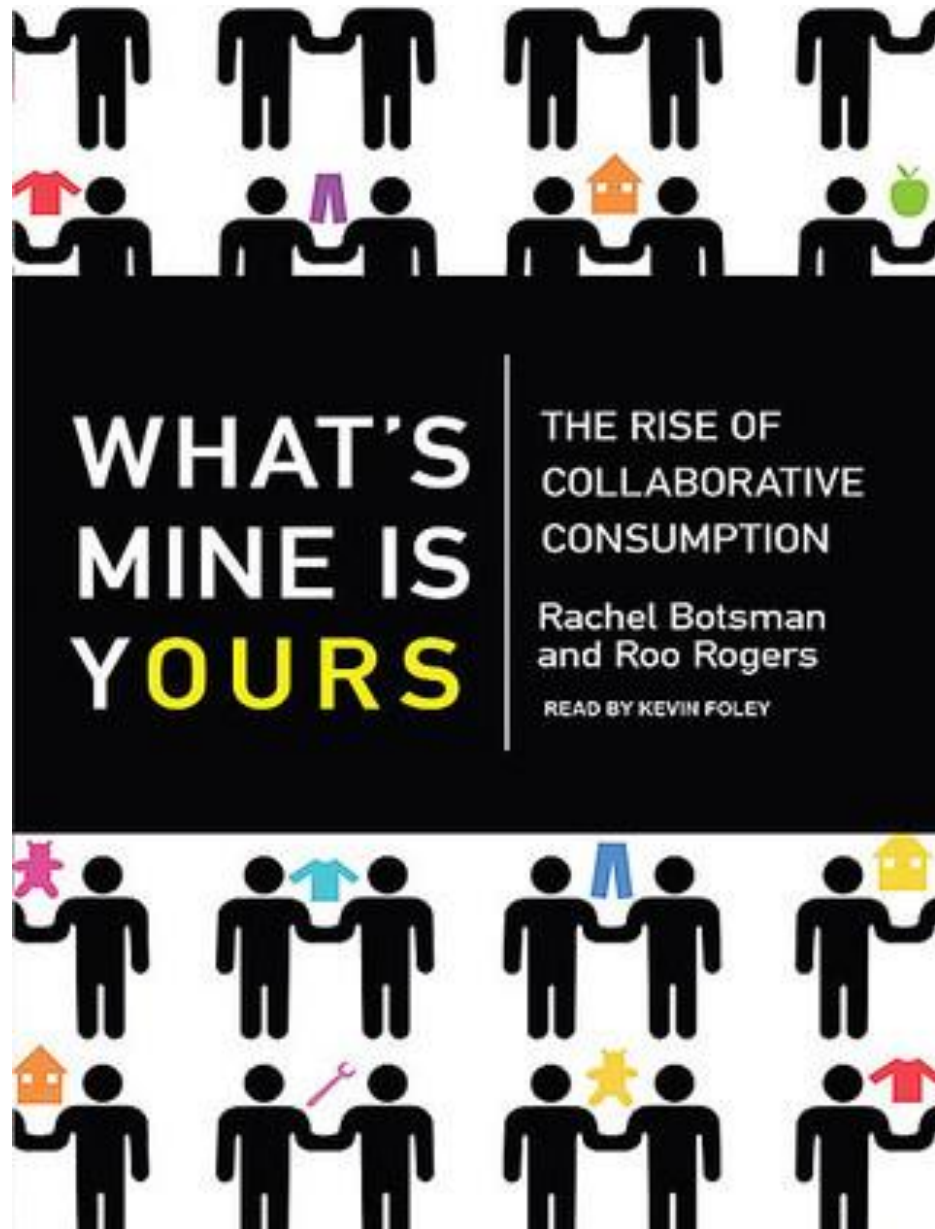
THE **END OF EMPLOYMENT** AND THE  
RISE OF **CROWD-BASED CAPITALISM**

ARUN SUNDARARAJAN



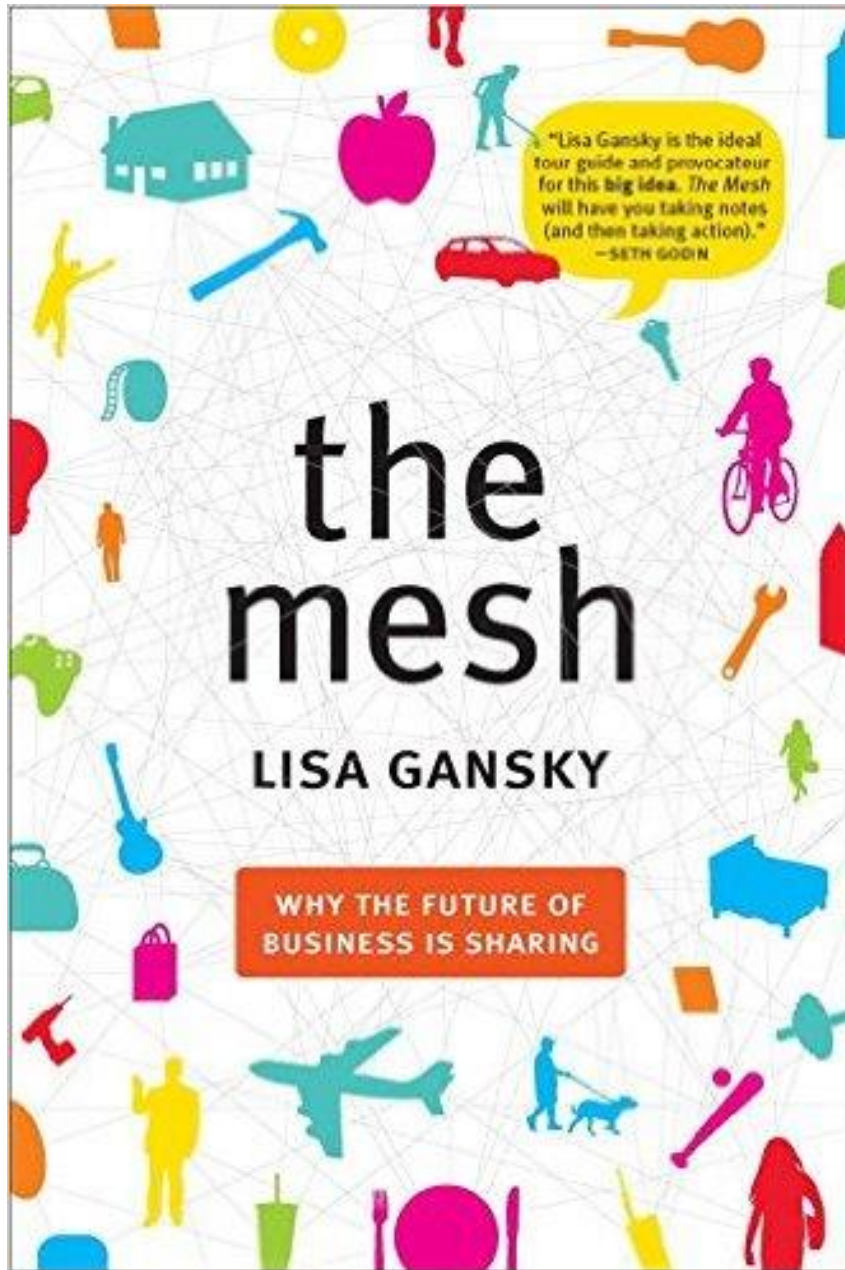
Prof. Arun  
Sundararaja

New York University



Rachel Botsman

University of Oxford



Lisa Gansky

Empreendedora





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