KANTOR STAF PRESIDEN
REPUBLIK INDONESIA

PREPARING INDONESIA'S HUMAN CAPITAL FOR THE FUTURE

SOME POLICY DIRECTIVES

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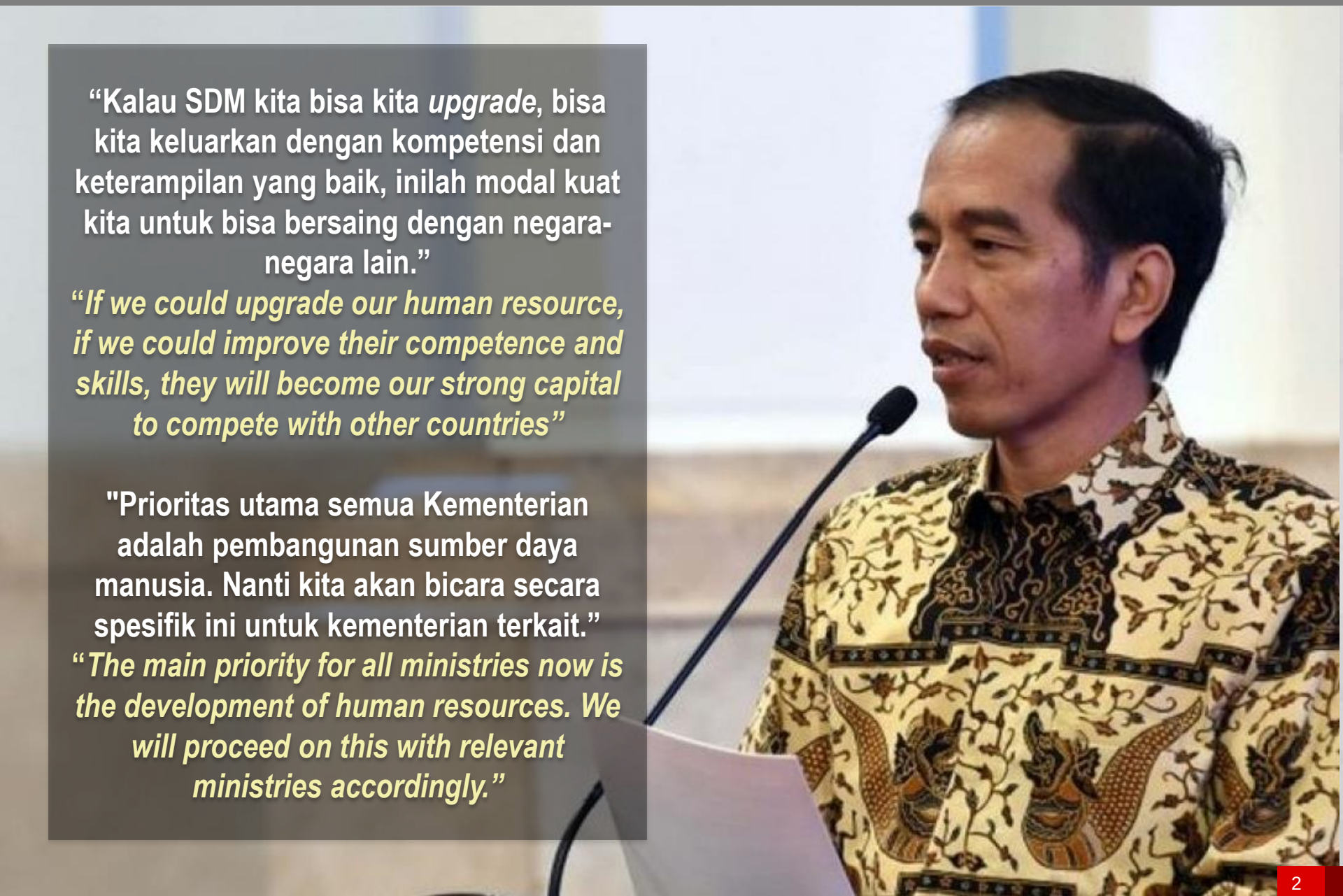
DEVELOPMENT FOCUS:
HUMAN RESOURCE AS THE KEY TO UNLEASH COMPETITIVENESS

"Kalau SDM kita bisa kita *upgrade*, bisa kita keluarkan dengan kompetensi dan keterampilan yang baik, inilah modal kuat kita untuk bisa bersaing dengan negara-negara lain."

"If we could upgrade our human resource, if we could improve their competence and skills, they will become our strong capital to compete with other countries"

"Prioritas utama semua Kementerian adalah pembangunan sumber daya manusia. Nanti kita akan bicara secara spesifik ini untuk kementerian terkait."

"The main priority for all ministries now is the development of human resources. We will proceed on this with relevant ministries accordingly."

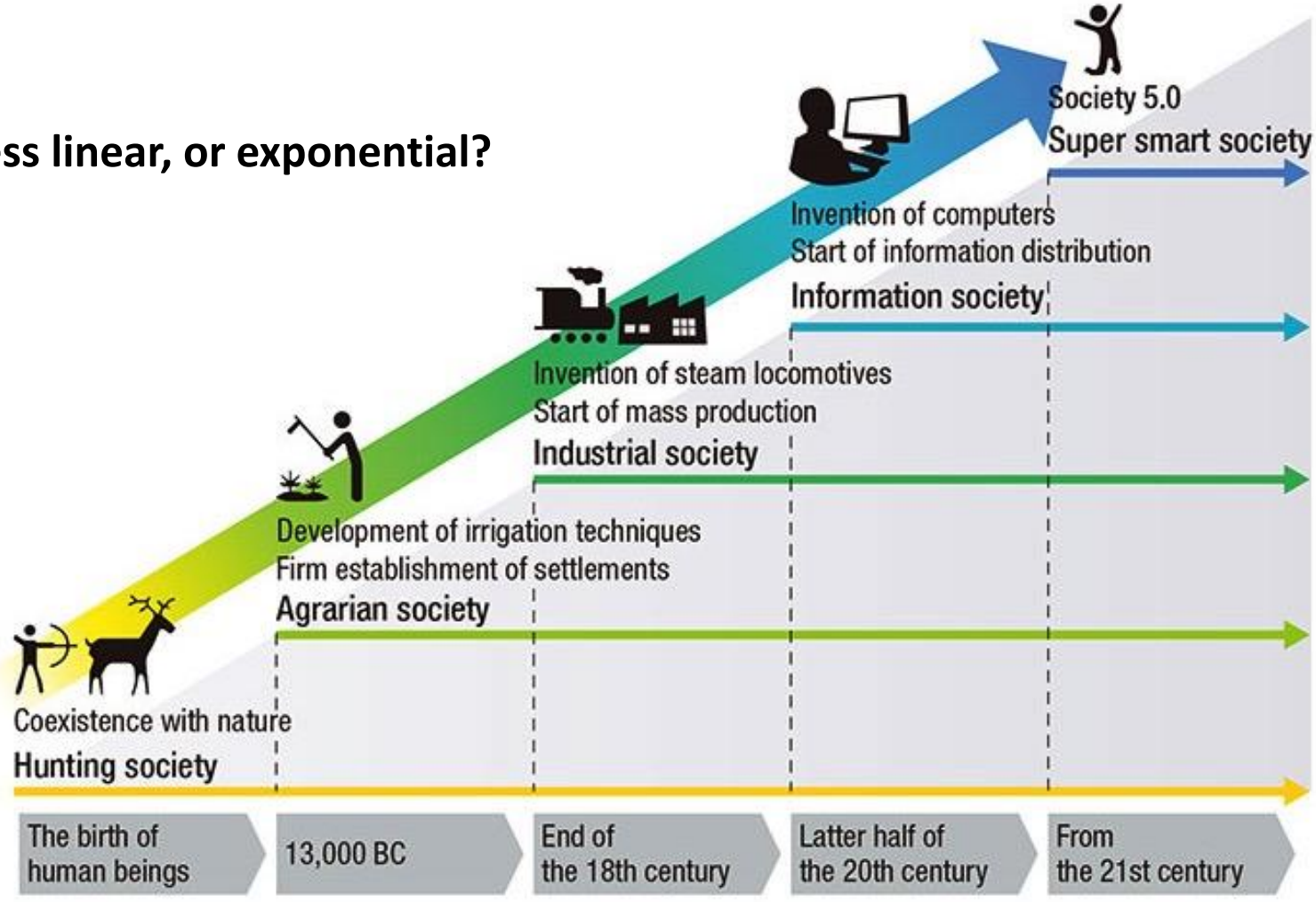


ALTHOUGH PRODUCTIVITY AND COMPETITIVENESS INCREASE, INDONESIA'S HUMAN CAPITAL STILL NEEDS TO BE IMPROVED

COUNTRY	GDP (US$)[1] 2018, 191 countries	HCI[2] 2018, 157 countries	HDI[3] 2018, 189 countries	GTCI[4] 2018, 119 countries	GII[5] 2018, 126 countries	GCI[6] 2018, 137 countries
USA	1 (20,412,870)	24 (0.75-0.77)	13 (0.924)	3 (75.34)	6 (59.8)	2 (5.9)
China	2 (14,092,514)	46 (0.66-0.68)	86 (0.752)	43 (48.01)	17 (53.0)	27 (5.0)
Japan	3 (5,167,051)	3 (0.83-0.85)	19 (0.909)	20 (62.63)	13 (55.0)	9 (5.5)
Germany	4 (4,211,635)	11 (0.78-0.81)	5 (0.936)	19 (67.77)	9 (58.0)	5 (5.7)
UK	5 (2,936,286)	15 (0.77-0.79)	14 (0.922)	8 (73.11)	4 (60.1)	8 (5.5)
Indonesia	16 (1,074,966)	87 (0.52-0.55)	116 (0.694)	77 (38.04)	85 (29.8)	36 (4.7)

1. Top 5 Highest GDP and Indonesia in 2018. Gross Domestic Product Rank by IMF, (2018), id.wikipedia.org/wiki/Daftar_negara_menurut_PDB_(nominal).
2. The Human Capital Project by World Bank Group, The World Bank, (2018), Boston.
3. Human Development Indices and Indicators 2018 Statistical Update by United Nations Development Programme, (2018), New York.
4. The Global Talent Competitiveness Report 2018 by INSEAD, the Adecco Group, and Tata Communications (2013-2019), INSEAD, the Adecco Group, and Tata Communications, www.insead.edu/global-indices/gtci.
5. Global Innovations Index 2009-2010, 2014, 2015, 2016, 2017 & 2018 by Cornell University, INSEAD, and the World Intellectual Property Organization (2009-2018), Cornell University, INSEAD, and the World Intellectual Property Organization, www.globalinnovationindex.org/.
6. The Global Competitiveness Report 2013-2014, 2014-2015, 2015-2016, 2016-2017 & 2017-2018 by World Economic Forum (2013-2018), World Economic Forum, www.weforum.org/reports/.

Is the progress linear, or exponential?



Economic and social innovation by deepening of Society 5.0

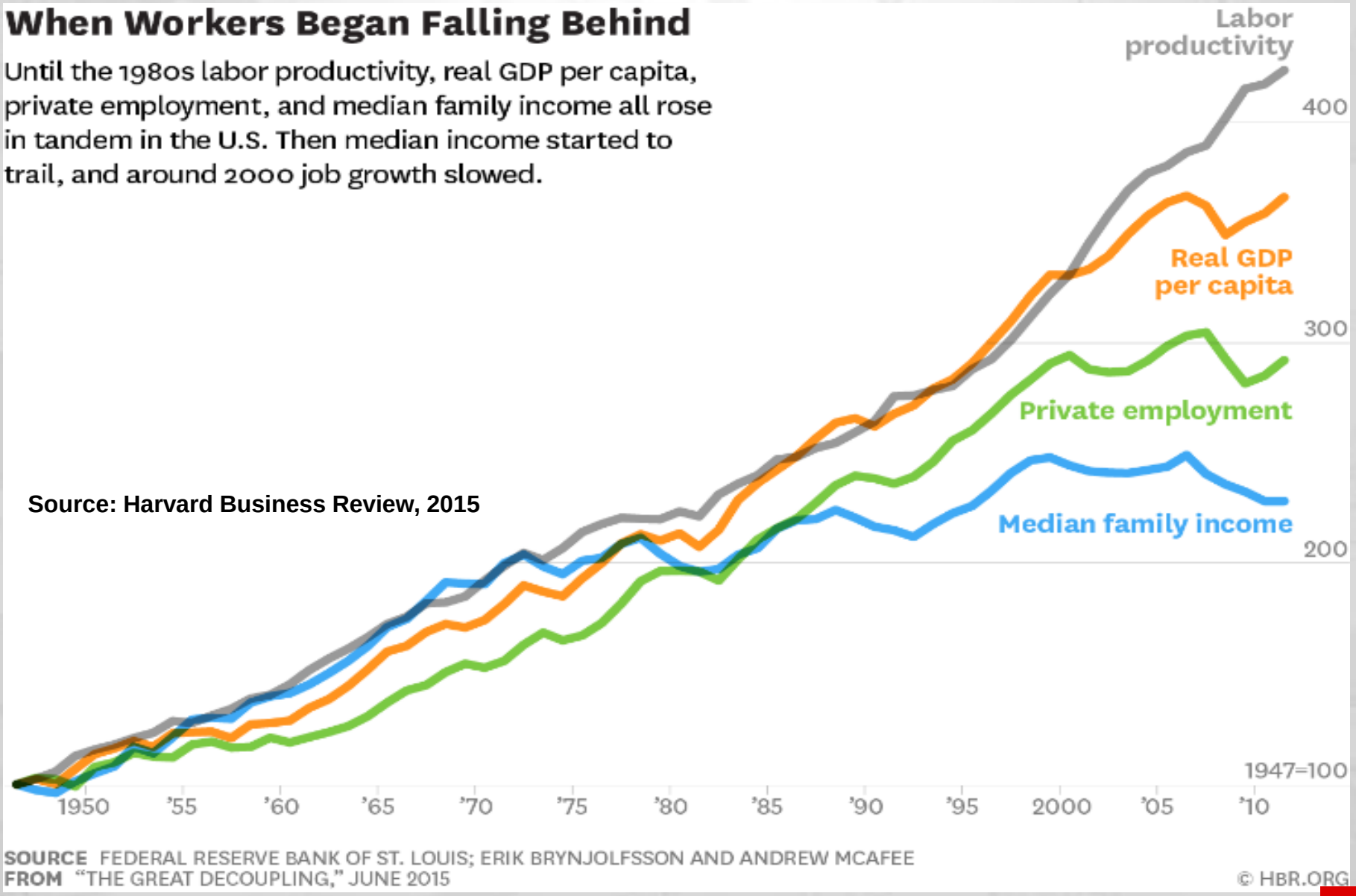
Source: Prepared based on materials from the Japan Business Federation (Keidanren)

INDUSTRY 4.0 (AND SOCIETY 5.0) AS THE CONTEXT
OPPORTUNITIES, CHALLENGES, AND SOME POLICY IMPLICATIONS

When some of us struggle with problems caused by the digital connectivity …

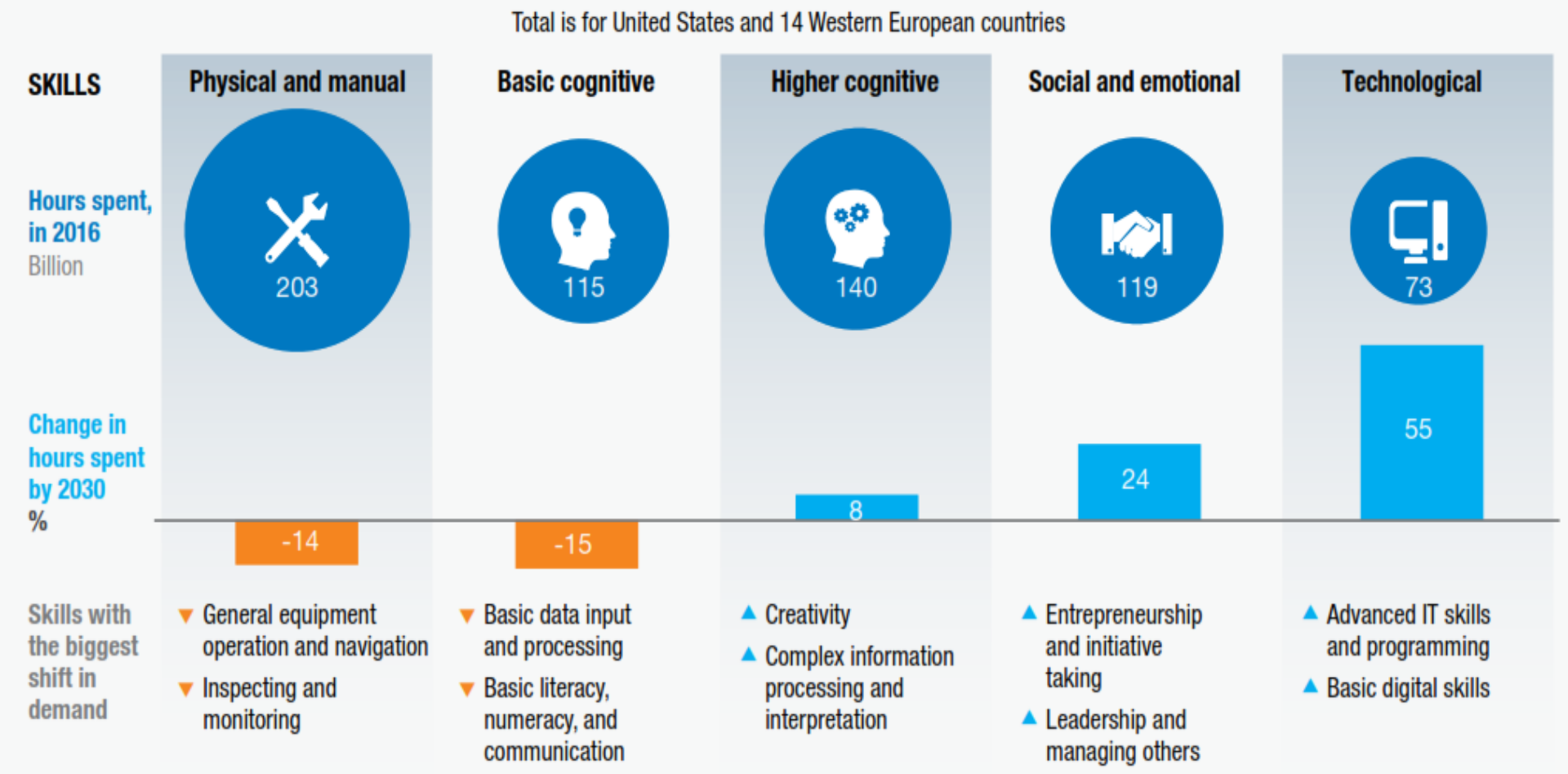
… some others are still fighting to get out from poverty

INDUSTRY 4.0 (AND SOCIETY 5.0) AS THE CONTEXT
OPPORTUNITIES, CHALLENGES, AND SOME POLICY IMPLICATIONS

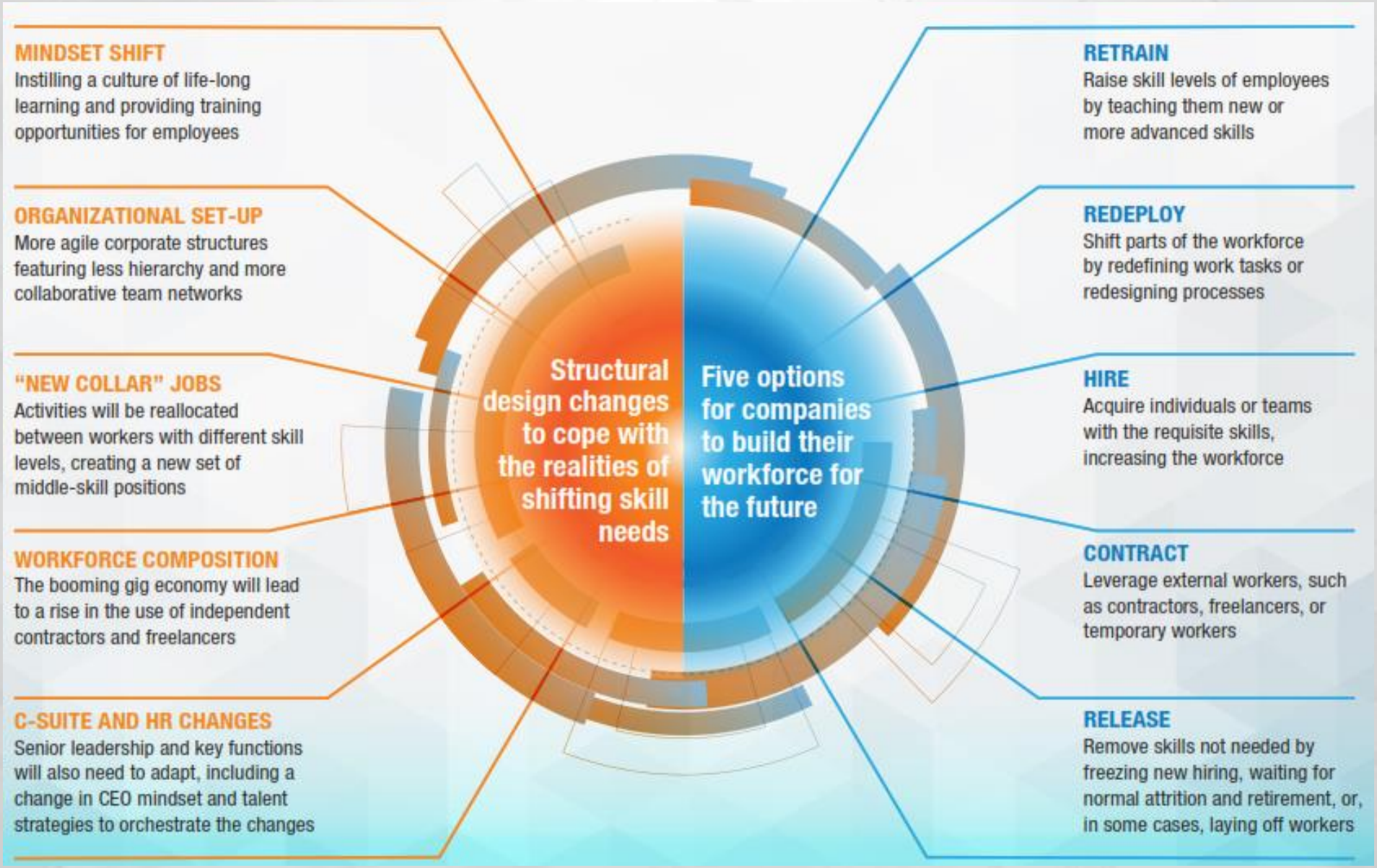


Source: Harvard Business Review, 2015

INDUSTRY 4.0 (AND ALL RELATED) WILL CHANGE SKILLS NEEDED IN THE WORKFORCE



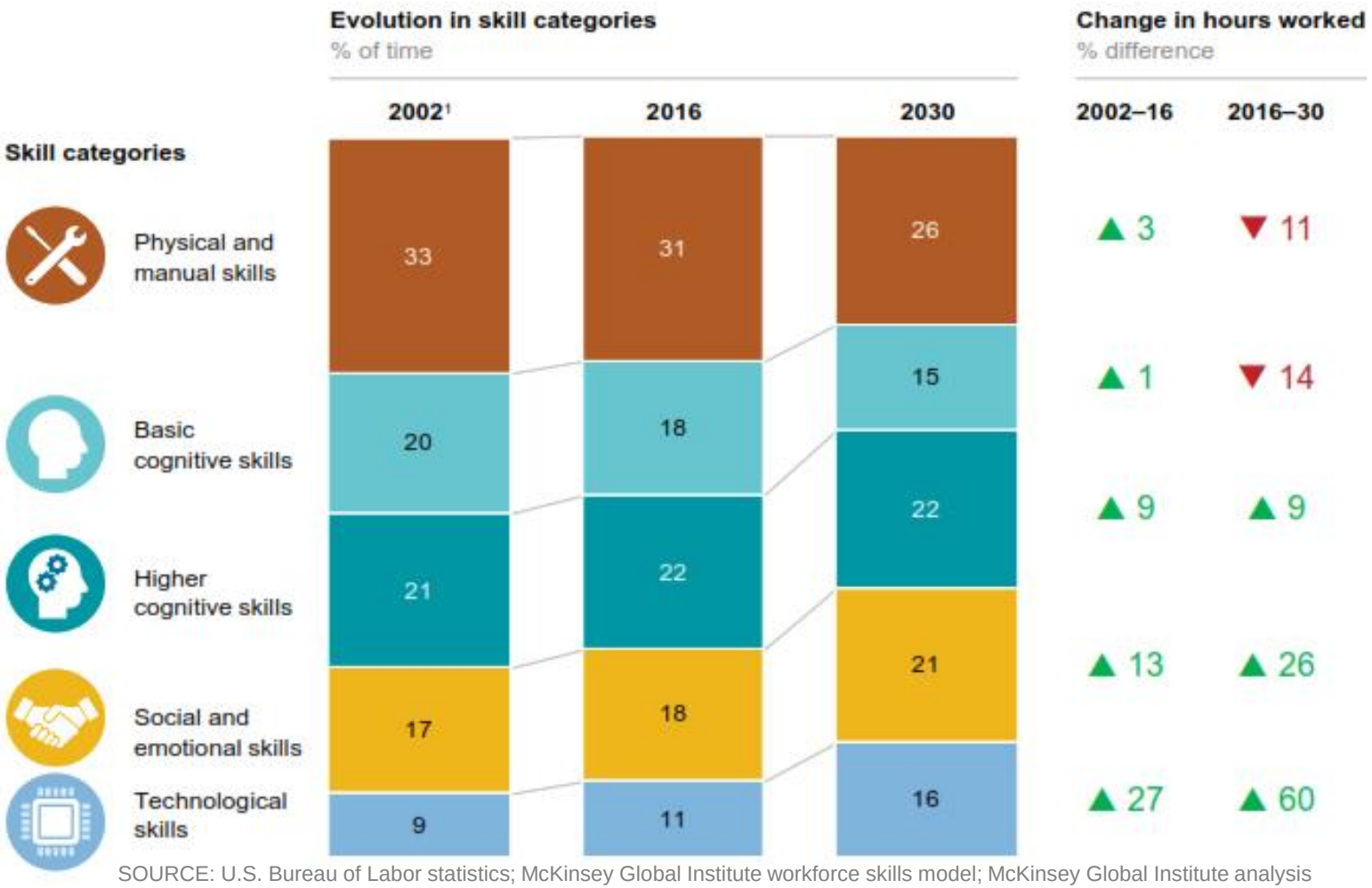
HOW WORKFORCE SKILLS WILL SHIFT



INDUSTRY 4.0 (AND ALL RELATED) IMPLICATIONS FOR TALENTS
COMPETITION, COMPETITION, AND MORE COMPETITIONS …

INDUSTRY 4.0 – PARTICULARLY AUTOMATION – IS LIKELY TO ACCELERATE SKILLS SHIFT

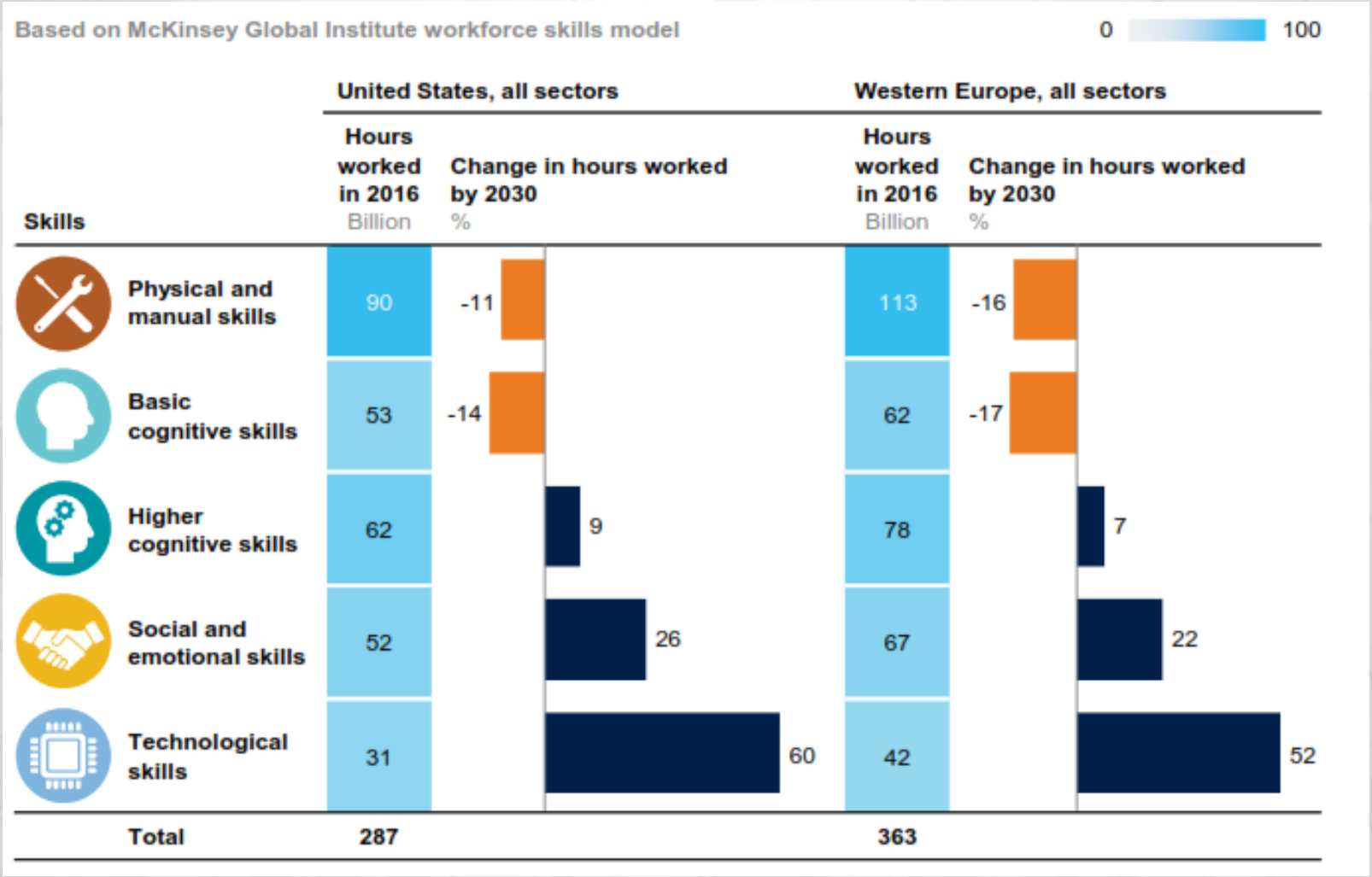
Based on McKinsey Global Institute workforce skills model
United States, all sectors, 2002–30



SOURCE: U.S. Bureau of Labor statistics; McKinsey Global Institute workforce skills model; McKinsey Global Institute analysis

1 Calculated using the 2004 to 2016 CAGR extrapolated to a 14-year period.
NOTE: Based on difference between hours worked per skill in 2016 and modeled hours worked in 2030. Numbers may not sum due to rounding.

AUTOMATION AND AI WILL ACCELERATE THE SHIFT IN SKILLS THAT THE WORKFORCE NEEDS



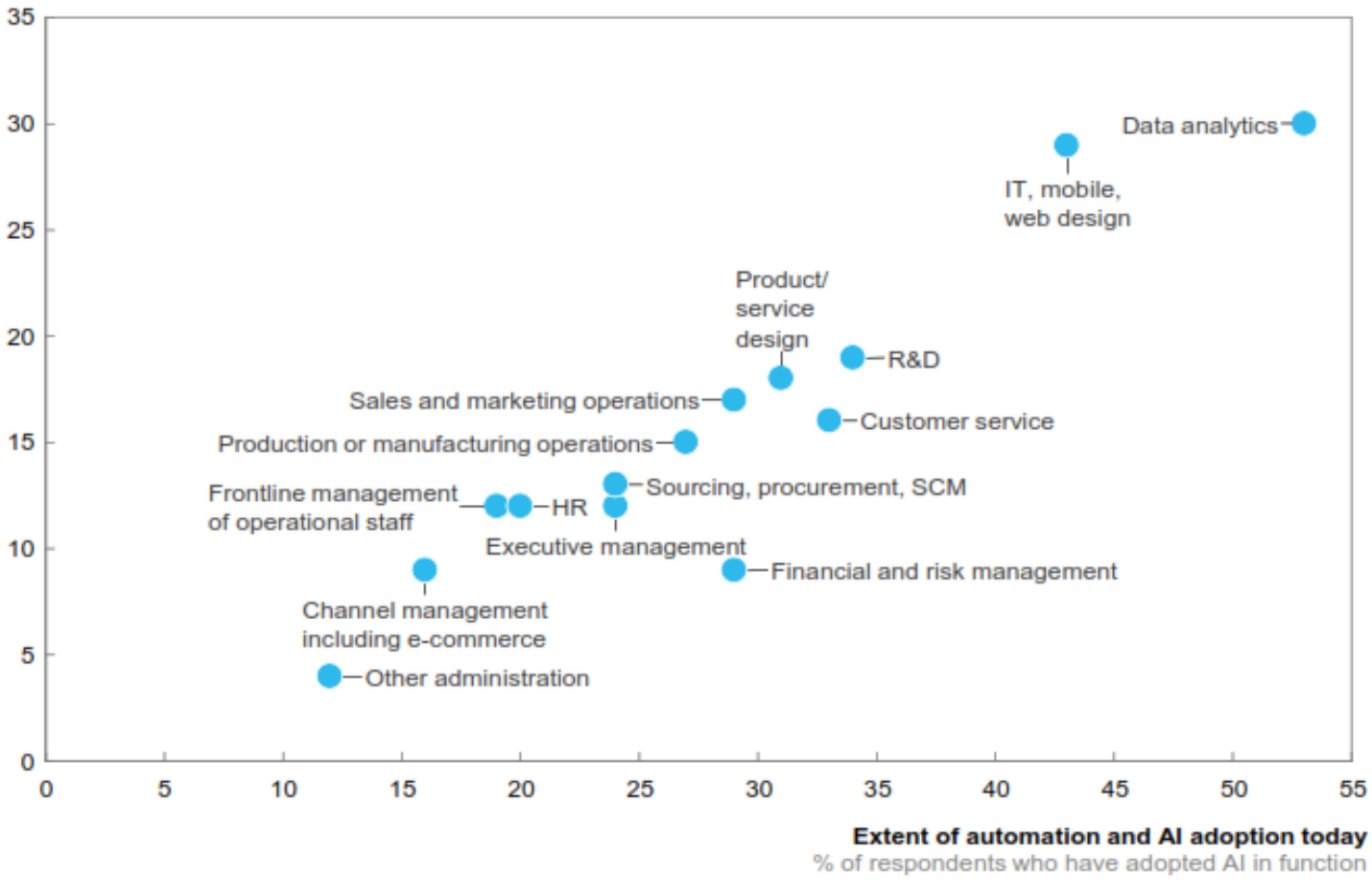
SOURCE: McKinsey Global Institute workforce skills model; McKinsey Global Institute analysis

NOTE: Western Europe: Austria, Belgium, Denmark, Finland, France, Germany, Greece, Italy, Netherlands, Norway, Spain, Sweden, Switzerland, and the United Kingdom. Numbers may not sum due to rounding.

INDUSTRY 4.0 – IMPLICATIONS FOR TALENTS MANAGEMENT
SKILLS MISMATCH

Executives expect skills mismatches to occur in functions that have already started adopting automation and AI technologies.

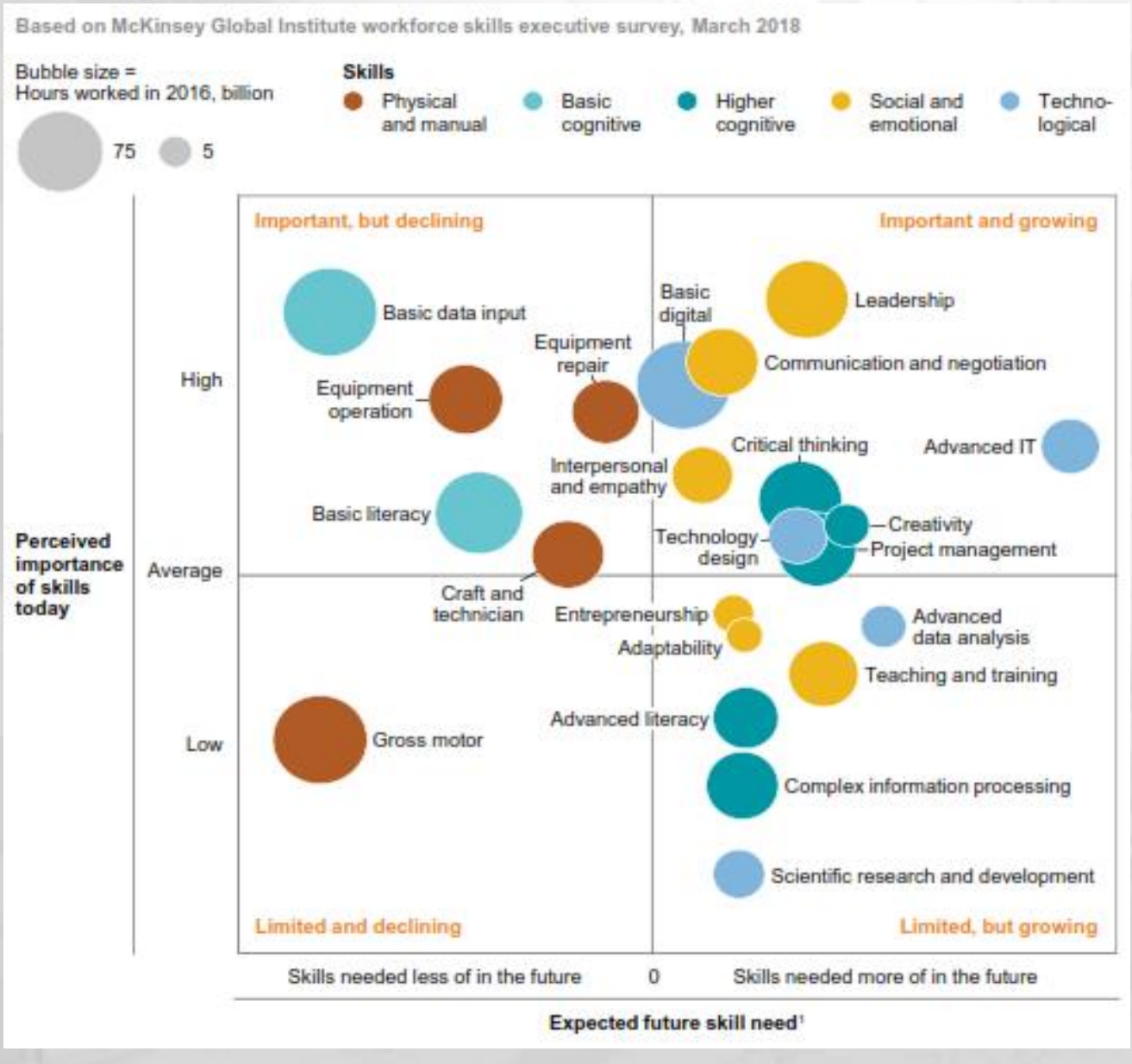
Based on McKinsey Global Institute workforce skills executive survey, March 2018



NOTE: Based on results of March 2018 survey of 3,031 business leaders in Canada, France, Germany, Italy, Spain, United Kingdom, and the United States. Chart based on survey questions "When you think about how automation and AI will change your workforce skill needs, in which functions do you think skills mismatches will be largest over the next 3 years? (Select up to 3)" and "Which of your organization's functions have adopted automation and AI technologies to date? (Select all that apply)."

SOURCE: McKinsey Global Institute workforce skills executive survey, March 2018; McKinsey Global Institute analysis

INDUSTRY 4.0 – IMPLICATIONS FOR TALENTS MANAGEMENT
SKILLS MISMATCH



1. Difference between % of survey respondents that expect to need a skill more and % of survey respondents that expect to need it less.
NOTE: Based on results of March 2018 survey of 3,031 business leaders in Canada, France, Germany, Italy, Spain, the United Kingdom, and the United States. Chart based on % of survey respondents. Skills descriptions were shortened. Chart does not include fine motor skills, inspecting and monitoring, and quantitative and statistical skills. Bubble sizes are based on number of hours worked.

SOURCE: McKinsey Global Institute workforce skills executive survey, March 2018; McKinsey Global Institute analysis

MANAGING TALENTS IN THE DIGITAL ERA:
THE CONTEXTS, NECESSARY CONDITIONS, AND POLICY DIRECTIVES

CONTEXT	NECESSARY CONDITIONS	POLICY DIRECTIVES
80% of investment in R&D is mainly from the government. The remaining is from the private sectors	Private sectors need to drive R&D and innovation. In advanced countries, private sectors account for 60% or more investment in R&D	Need to incentivize private sectors to be more involved in R&D- PP45/2019 was signed on 25 June 2019 to give incentives in a form of tax holiday for private sectors who are involved in R&D and Vocational Training (PP45/2019)
There is an increase in women's participation in workforce from 50.22% (2014) to 51.88%(2018). However, the difference between men and women's participation is sharp. Men's participation in workforce is 82.7%	We need innovations/breakthroughs to allow women to work without having to leave behind their roles as mothers	Need to push through innovation by leveraging on technology and the growing digital economy to provide more access to asset, training and capitals for women.

HUMAN CAPITAL IN THE DIGITAL ERA:
MORE IT-RELATED SKILLS AND CAPABILITY

Digital literacy is also required by IT users, especially by decision makers and users in specific contexts (e.g.: digital for productivity, inclusivity, and governance)

IT 'Doers'

The need to enhance IT resources capacity so that the nation can tap the most cutting edge technology at the moment

Digital for Growth

Digital for Inclusive Society

Digital Government

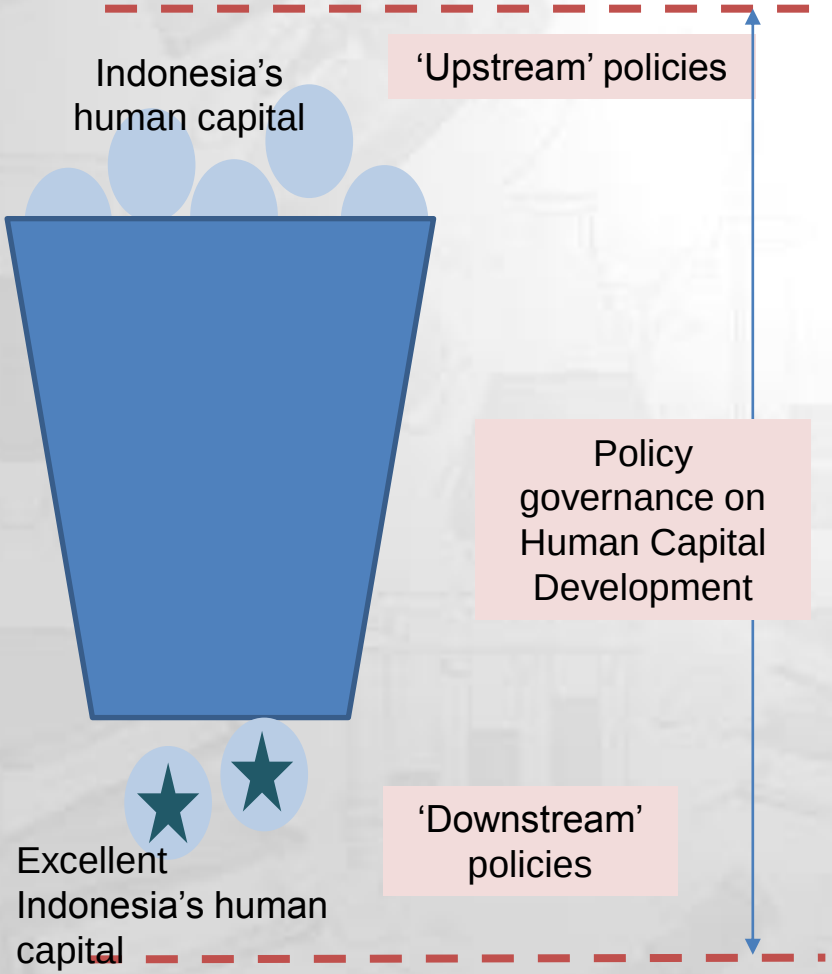
IT 'Users'

Decision and policy makers need to enhance their intellectual capacity in order to optimise informed decision kaing

The ample space for managing digital talents induce urgency for government, academia and private sector to collaborate

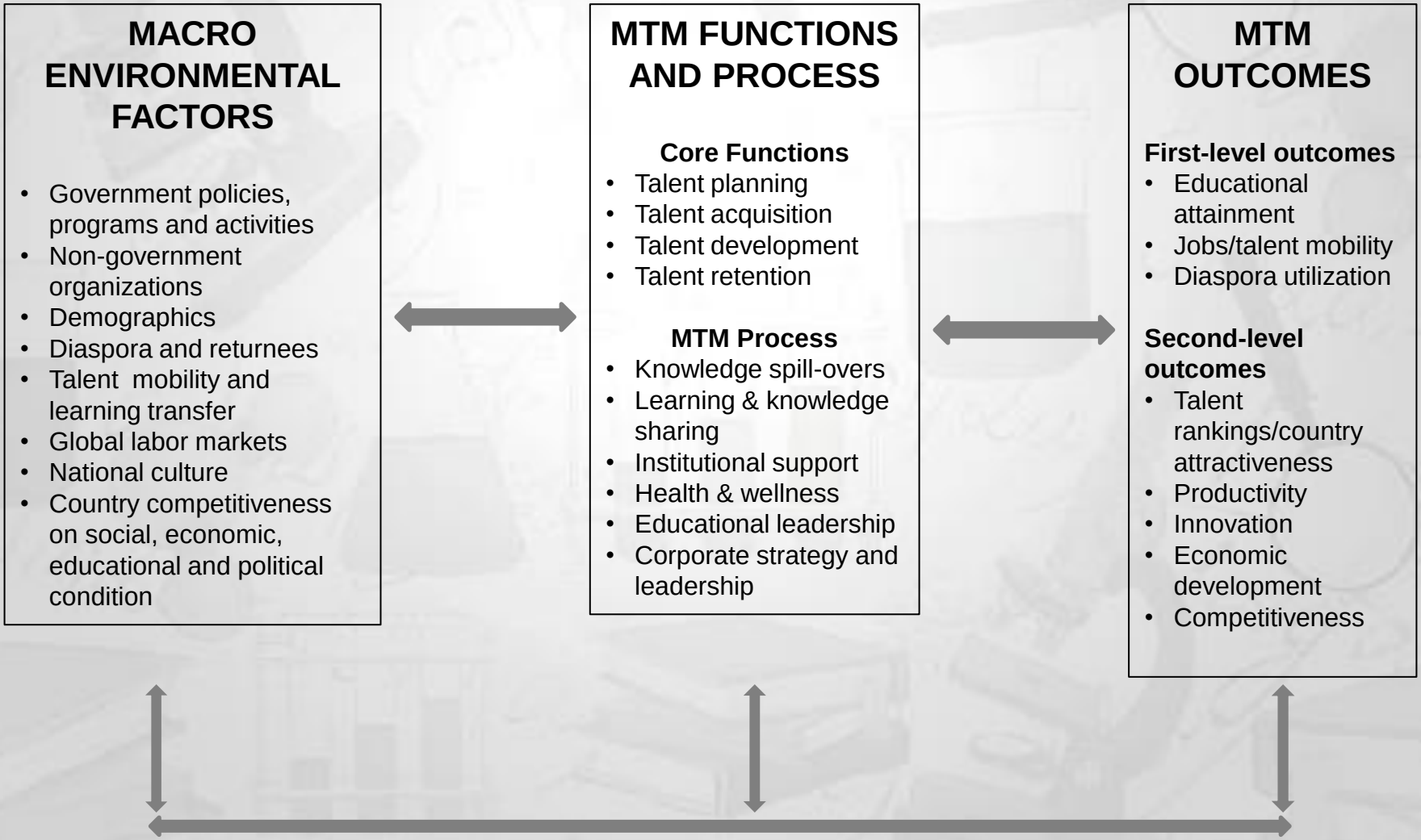
MANAGING INDONESIA'S HUMAN CAPITAL IN THE FUTURE: THE NEEDS –AND DIRECTION TOWARDS– COMPREHENSIVE POLICIES

Policies on Human Capital development and talent management must be thorough from upstream to downstream



- Policy on human capital development has to cover **the provision of access to quaiity services** to **all citizens** – as prerequisite for achieving a level of Indonesia's **human resources** that can contribute in **national and global development.**
- **Upstream policy:** includes optimalisation of basic services such as education, health and social protection. The quality and access to basic services will ensure that talent pools are filled with quality human resources.
- **Downstream policy:** ensures the 'appropriation' or 'matchmaking' of human resources, including absorption of workforce, 'link-and-match', and the ecosystem to realise the potential of human capital.
- **Governance of human-capital policies**: to orchestrate and ensure the achievement of the objective of human capital development.

MANAGING TALENTS IN THE DIGITAL ERA:
POLICY INTERVENTION ACROSS MULTIDIMENSIONAL ASPECTS



Source: Adaptation from Khilji, Tarique & Schuler (2017) in Vaiman, et. al. (2018).

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THANK YOU

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