

# GROWING SMARTER:

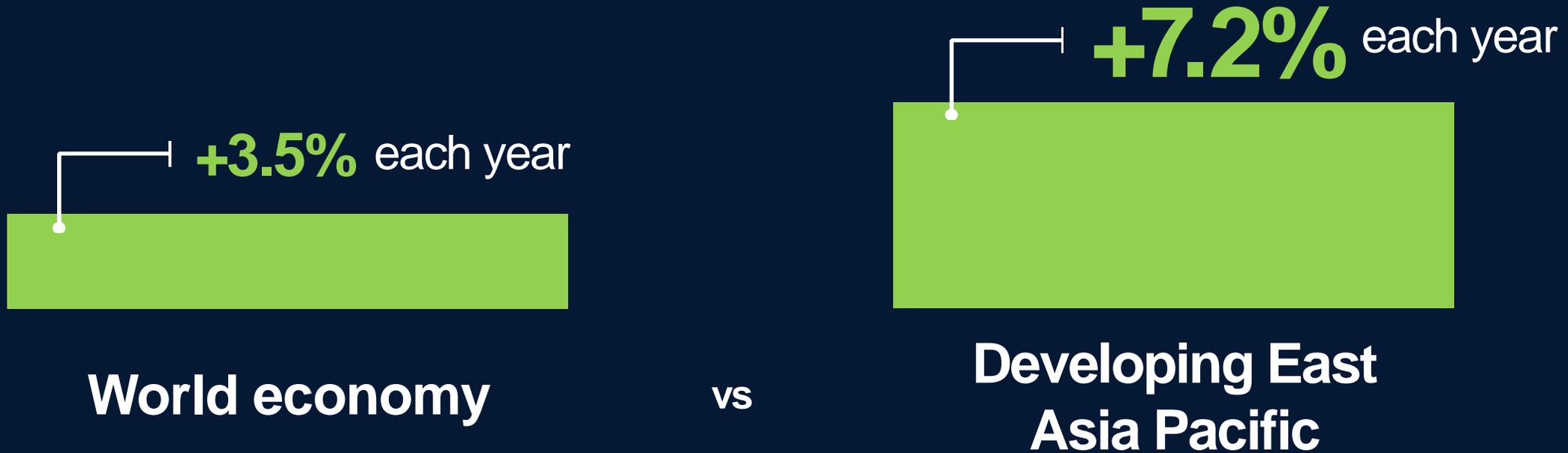
## Learning and equitable development in East Asia and Pacific



World Bank East Asia  
and Pacific Regional  
Flagship Report - 2018

# The EAP region: A half-century of stellar growth

Average economic growth between 1961 and 2015



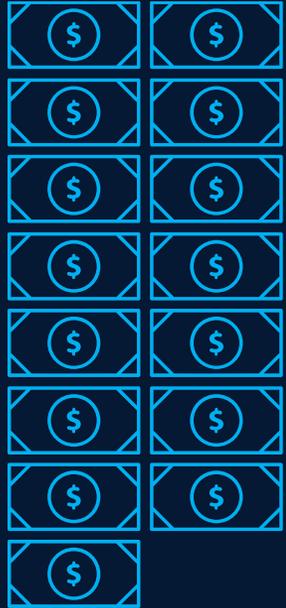
# Size of EAP economy at various growth rates



└─ **\$11.1 trillion**  
EAP with China

Source: Data from World Development Indicators (World Bank, various years).  
Note: Data cover the years 1960-2015. GDP = gross domestic product.

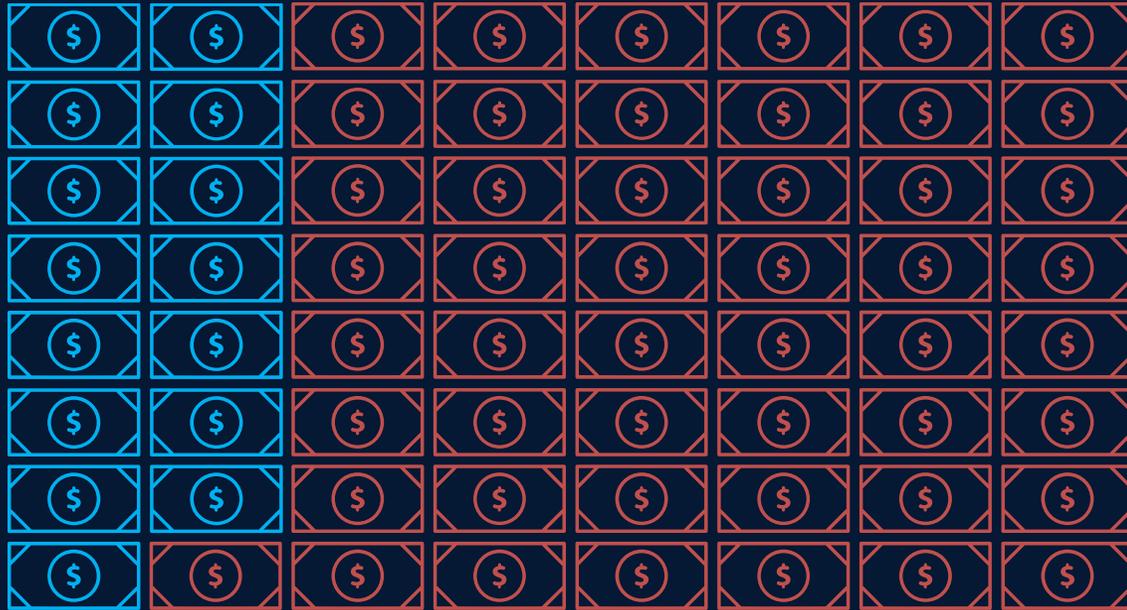
# Size of EAP economy at various growth rates



└─ \$1.5 trillion  
World

Source: Data from World Development Indicators (World Bank, various years).  
Note: Data cover the years 1960-2015. GDP = gross domestic product.

# Size of EAP economy at various growth rates



└─ \$1.5 trillion  
World

└─ \$4.8 trillion  
EAP without China

Source: Data from World Development Indicators (World Bank, various years).  
Note: Data cover the years 1960-2015. GDP = gross domestic product.

# Size of EAP economy at various growth rates



└─ **\$11.1 trillion**  
EAP with China

Source: Data from World Development Indicators (World Bank, various years).

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# The share of people in EAP working in agriculture has fallen and the share working in services has risen

Share of population in 1991

● Agriculture ● Services ● Other

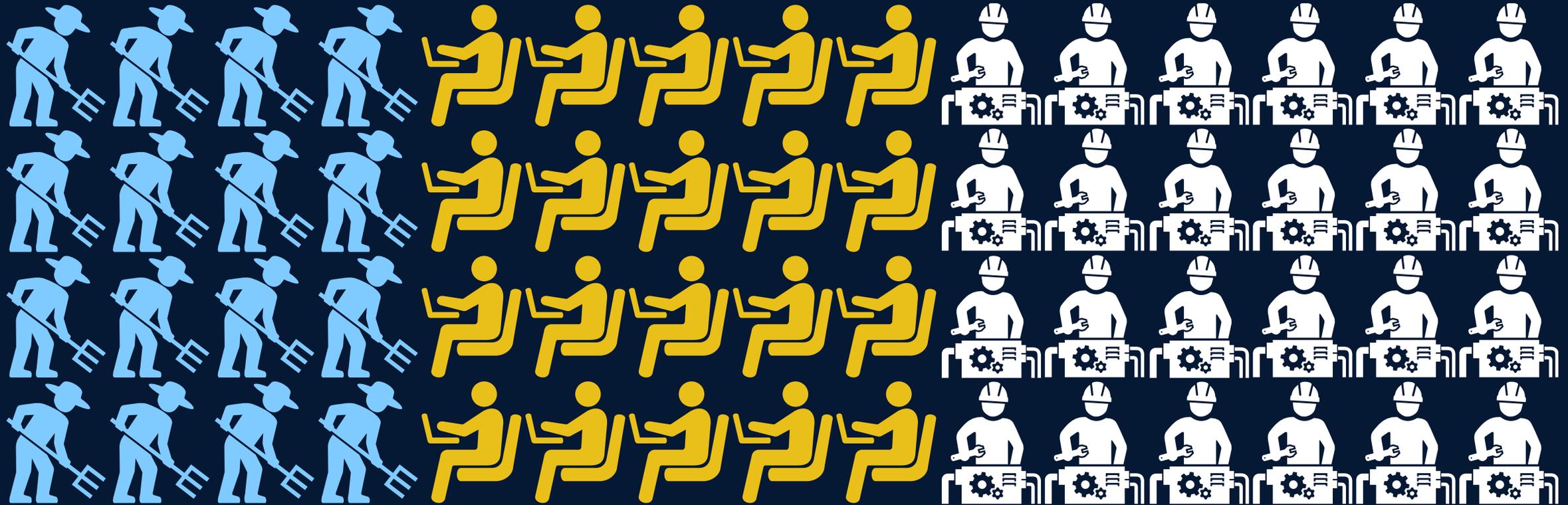


Source: Data from International Labor Organization. Author's calculations.

# The share of people in EAP working in agriculture has fallen and the share working in services has risen

Share of population in 2016

● Agriculture ● Services ● Other



Source: Data from International Labor Organization. Author's calculations.

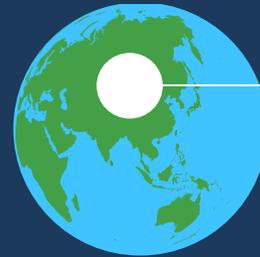
# Regional snapshot

The East Asia and Pacific region is home to:



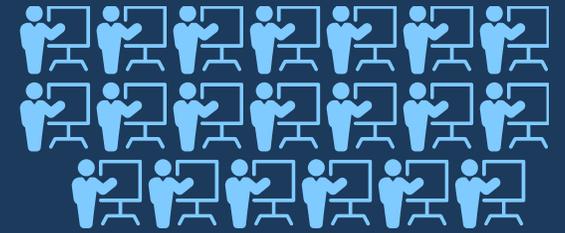
**29**

countries and economies



**26%**

of the world's school  
age children



**20 million**

public school teachers



**7/10**

of the world's top  
educational systems

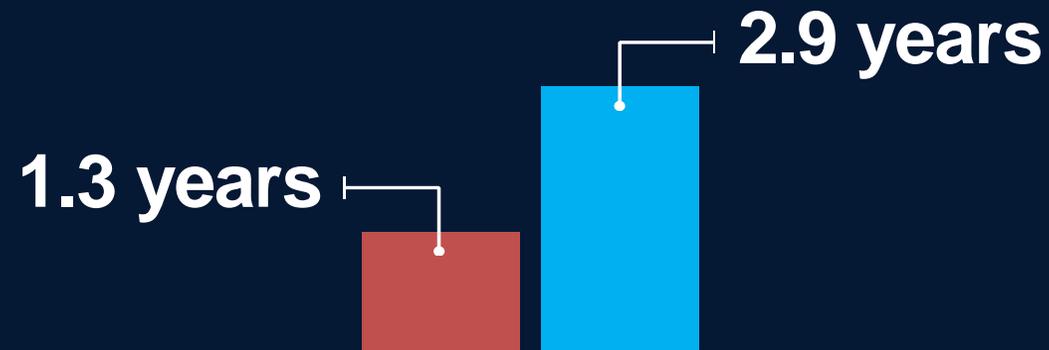


**Tens of millions of children**  
in school but not learning

# Education attainment grew rapidly and steadily in EAP since 1950

Average years of schooling for adults aged 25+ in EAP compared to world average in 1950

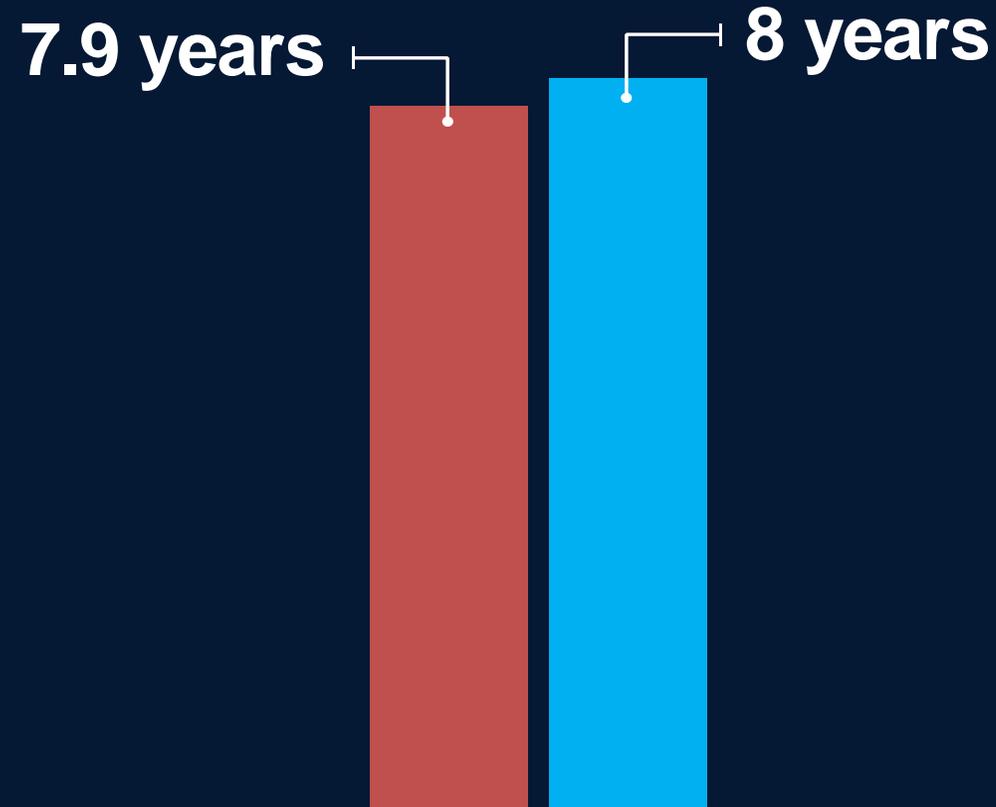
● World ● EAP



# Education attainment grew rapidly and steadily in EAP since 1950

Average years of schooling for adults aged 25+ in EAP compared to world average in 2010

● World ● EAP



# Every year of schooling raises earnings by 10%



Source: Montenegro and Patrinos 2014.

# There are rising returns to higher levels of education, despite increases in supply

Vietnam 1992



Share of workers  
with tertiary  
education



Wage premiums to tertiary  
education

# There are rising returns to higher levels of education, despite increases in supply

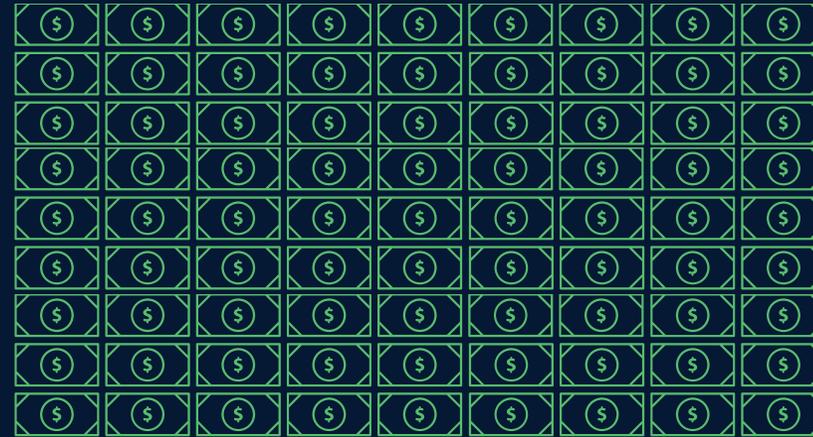
Vietnam 2006

**+94%**



Share of workers  
with tertiary  
education

**+273%**



Wage premiums to tertiary  
education

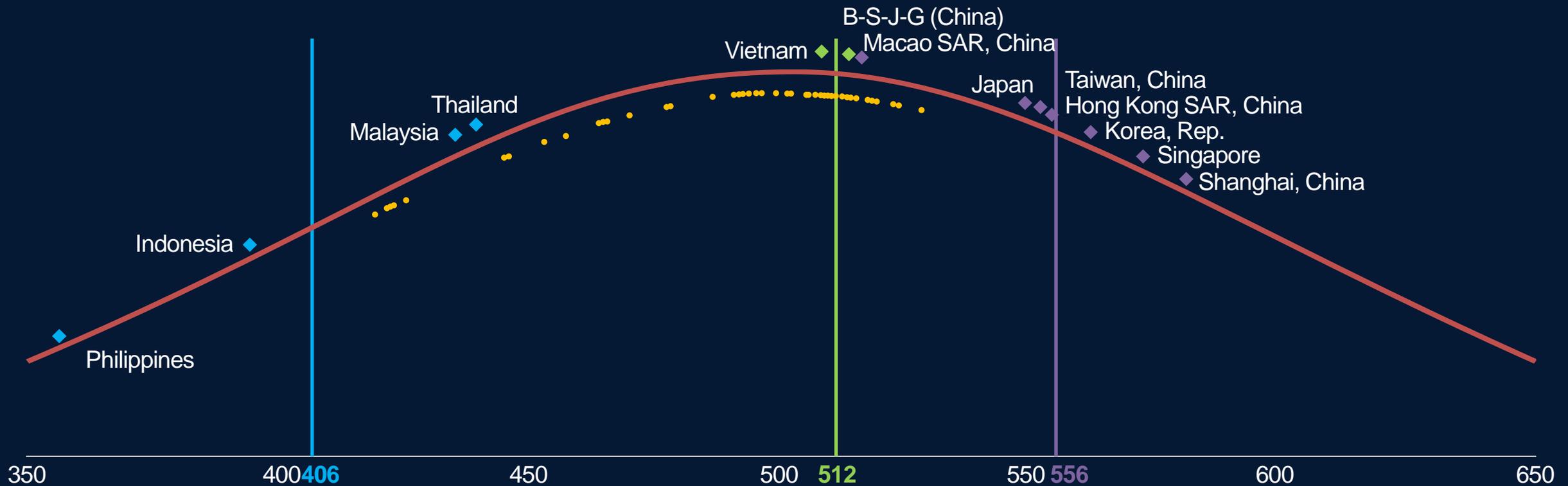
# Developing countries cluster at bottom of global scale

Mean scores for selected developed and developing countries (1965-2015)



Source: Harmonized Learning Outcomes (HLO) database.

# EAP has some of the best education systems in the world, but also some that struggle to perform well



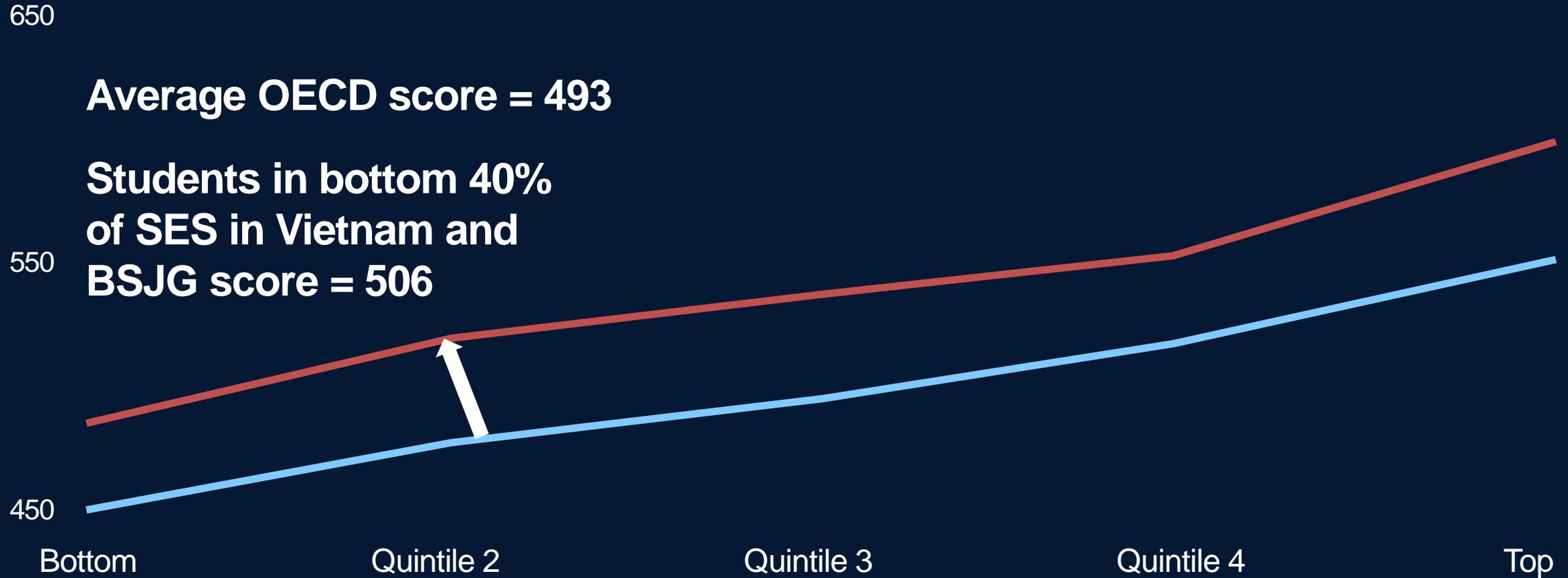
Note: Composite constructed average of PISA and TIMSS performance over all available iterations. Calculations based on PISA and TIMSS scores on nine assessments since 2000 for PISA, and 2003 for TIMSS.

# In Above-Average Performing Systems, learning is 2+ years above predicted levels



# Scores are not only high, they are also equitable

● OECD ● Vietnam and B-S-J-G (China)

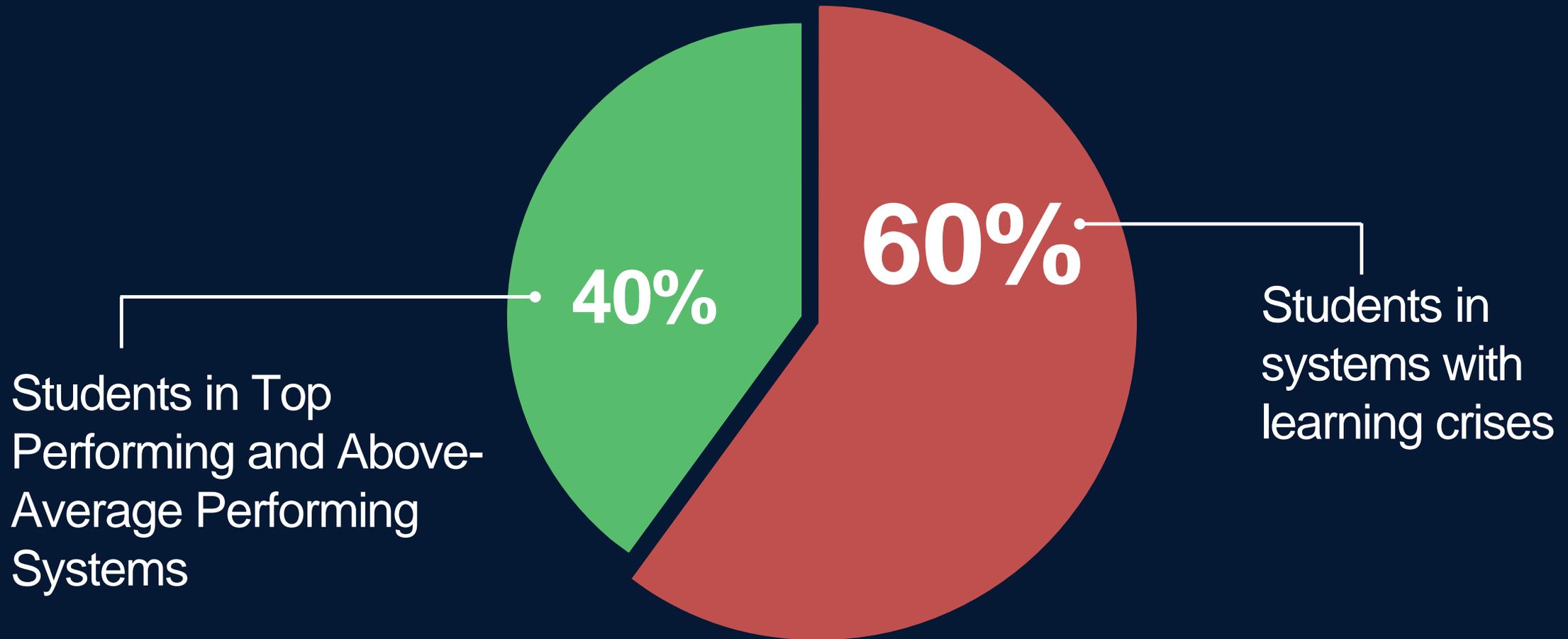


**Average OECD score = 493**

**Students in bottom 40%  
of SES in Vietnam and  
BSJG score = 506**

Source: PISA 2015 (OECD 2016).

# Up to 60% of students in EAP are in systems in which learning outcomes are low or unknown

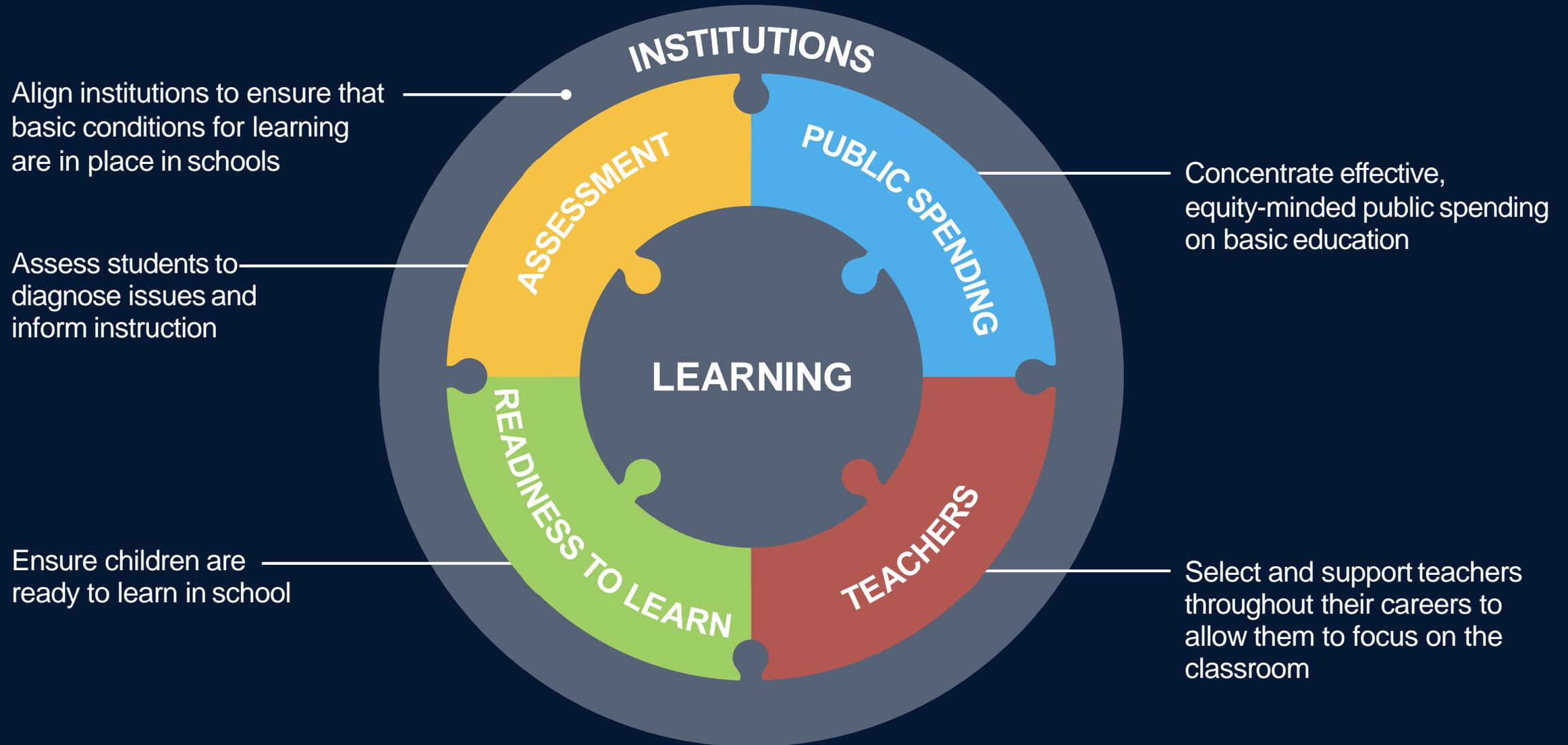


Source: Calculations based on a composite constructed average of PISA and TIMSS performance on the nine iterations of these assessments since 2000 (for PISA) and 2003 (for TIMSS).

**What can be learned from  
successful systems?**



# 5 key policy domains

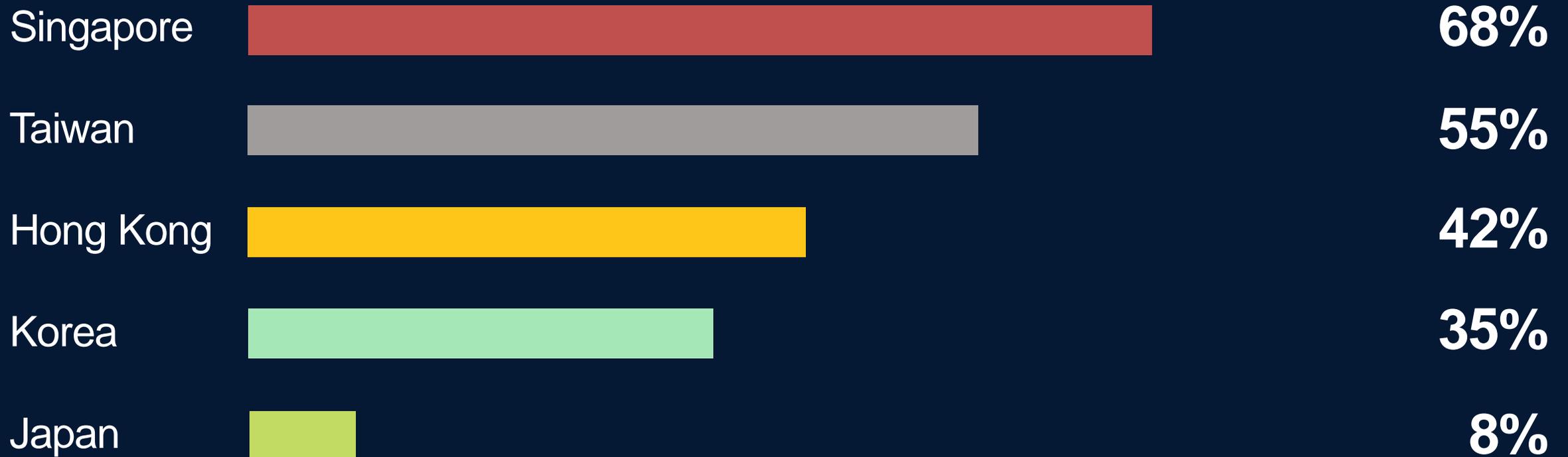


# 1 Align institutions to ensure basic conditions for learning



# Top Performing systems had an unshakeable commitment to developing skills for prosperity

## Percent of population with no schooling in 1950



# Top Performing systems had an unshakeable commitment to developing skills for prosperity

## Percent of population with no schooling in 2010



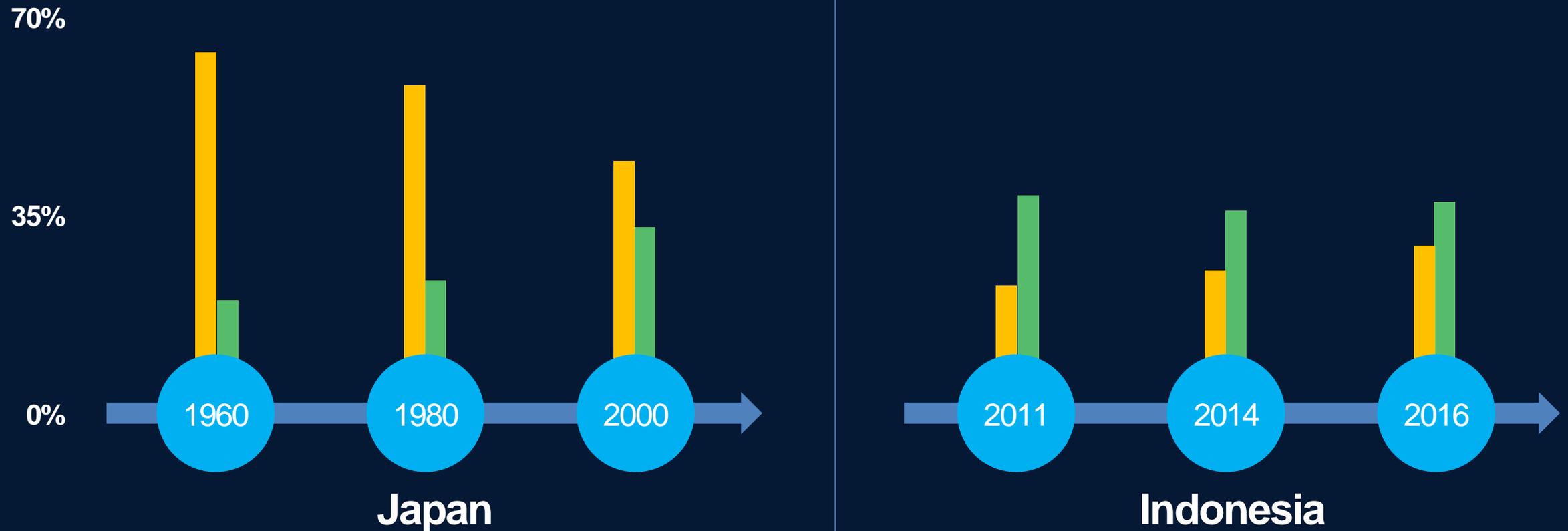
## ② Concentrate effective, equity-minded public spending on basic education



# Unlike Top Performing Systems, Below-Average Performing Systems still struggle to focus spending on basic education

Percent of government education spending

● Elementary ● Tertiary



Source: Japan Ministry of Education.

Source: Indonesia Ministry of Education and Culture.

**3 Select and support teachers throughout their careers to allow them to focus on the classroom**



# Successful systems recruit and develop the best to become teachers



In **Japan**, only 14% of applicants to education programs are accepted; only about 30–40% of graduates are hired annually



In **Singapore**, the government recruits the top one-third of university graduates to become teachers



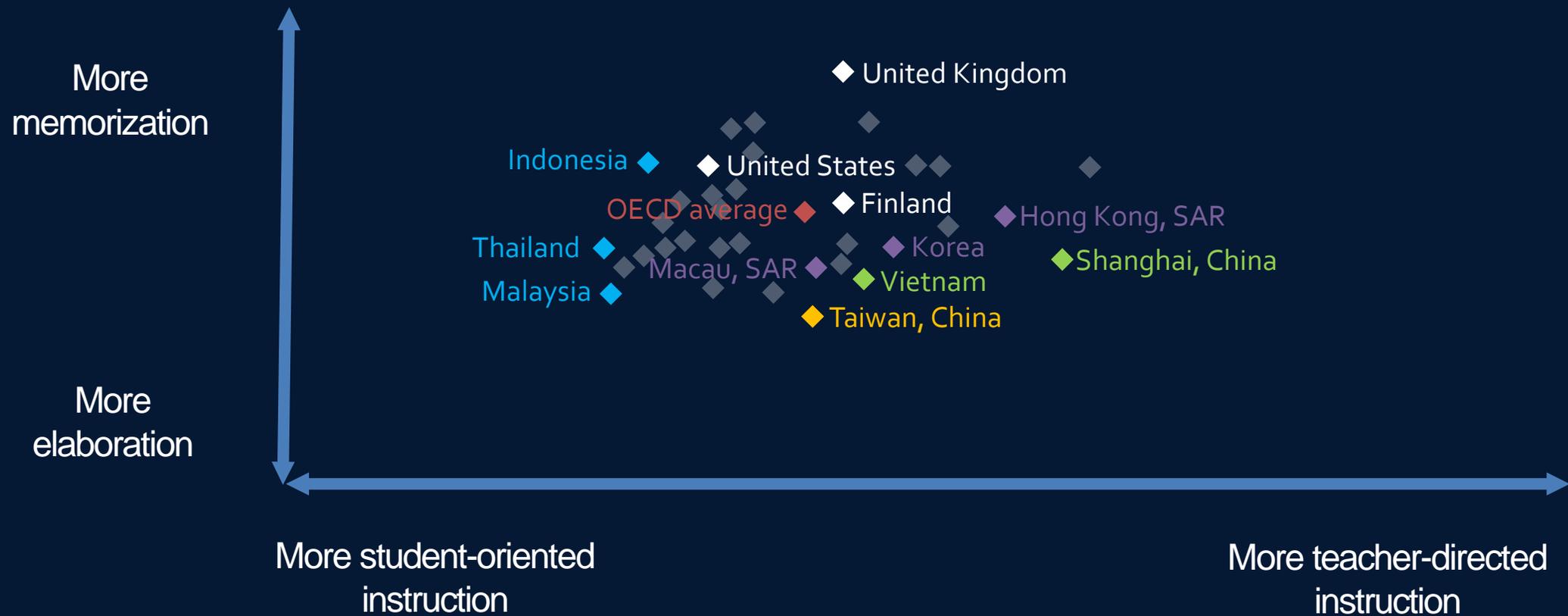
In **Korea**, only 1 in 20 passes the exams for employment to become a teacher



In **Taiwan, China** typically only the top third of applications are accepted into education programs which are highly competitive

# Top Performing and Above Average Performing Systems in EAP tend to use more elaboration and less memorization

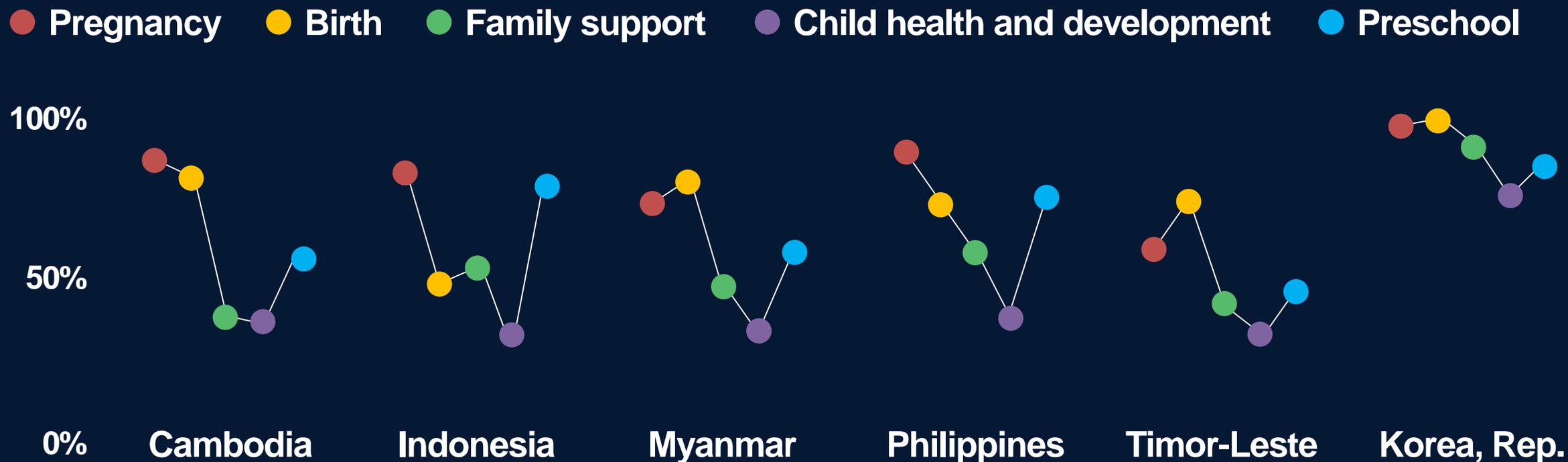
Teaching and learning strategies in mathematics around the world



# 4 Ensure that children are ready to learn in school



# Access to key services varies widely across countries – the largest gaps are between pregnancy and preschool



Sources: Data from Demographic and Health Surveys. Preschool attendance data were supplemented by World Bank EdStats database (various years).

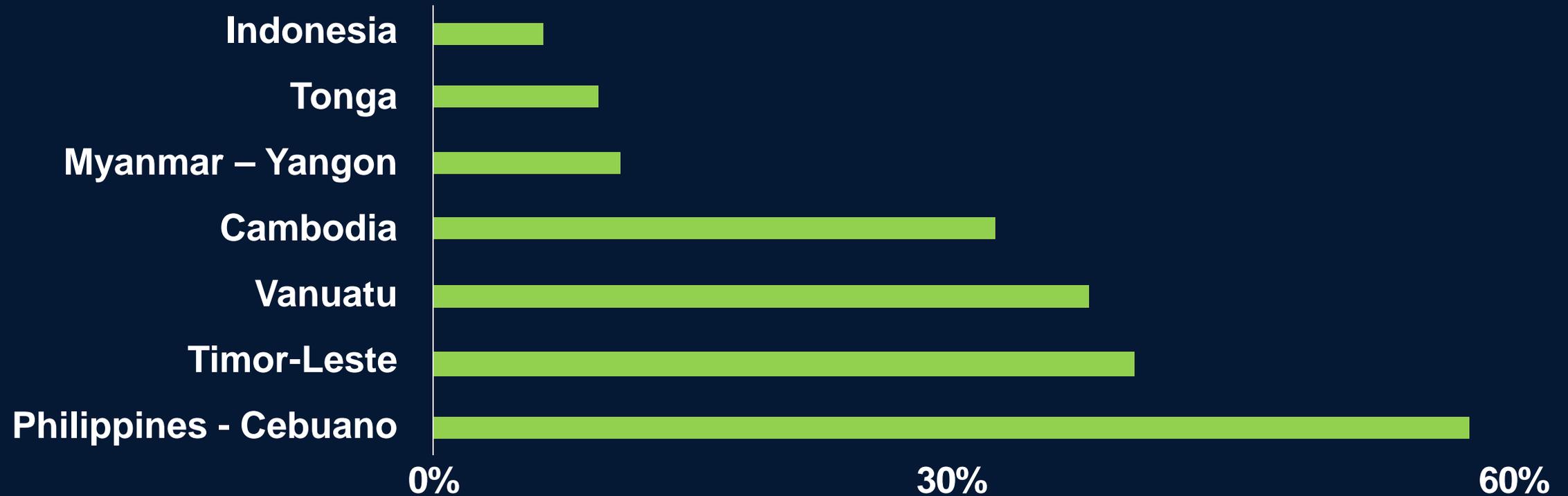
Note: As described in Denboba and others (2014), pregnancy includes at least 4 visits in antenatal care, iron during pregnancy, and diet counseling during pregnancy; Birth includes doctor or nurse present at delivery and breastfeeding; Child health and development includes at least 3 types of food beside breastmilk from 6 months on, zinc supplement in case of diarrhoea, children with weight, height and height/weight ratio less than two standard deviations, and access to deworming medicine; family support includes mother having completed at least primary education, last birth interval greater than two years and last pregnancy desired, at least three types of stimulations, health care facility not too far and visit within 12 months, vitamin A in last 6 months and iron supplementation, safe water source and improved sanitation. Preschool attendance measures enrollment rate in preprimary education. Philippines has no data on non-breastmilk nutrition. Only Cambodia has information on diet counseling during pregnancy and availability of deworming medicine. Preschool attendance data supplemented by EdStats.

# 5 Assess students to inform instruction



# Data from assessments have spurred national reforms

EGRA zero-word readers, 2<sup>nd</sup> grade



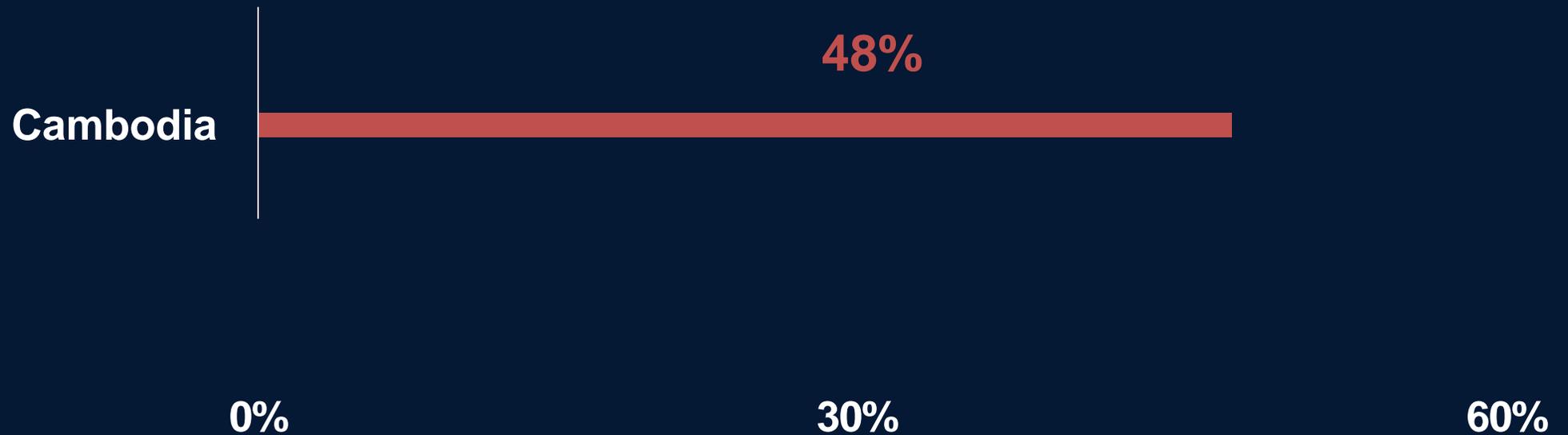
Source: Graham and Kelly 2017.

Note: All data are from nationally representative samples completed in the second half of the school year. Zero-word scores are based on the oral reading fluency subcomponent for all countries except Cambodia and Timor-Leste, for which it is based on the familiar word reading subcomponent.

# Data from assessments have spurred national reforms

EGRA zero-word readers, 2<sup>nd</sup> grade

2010



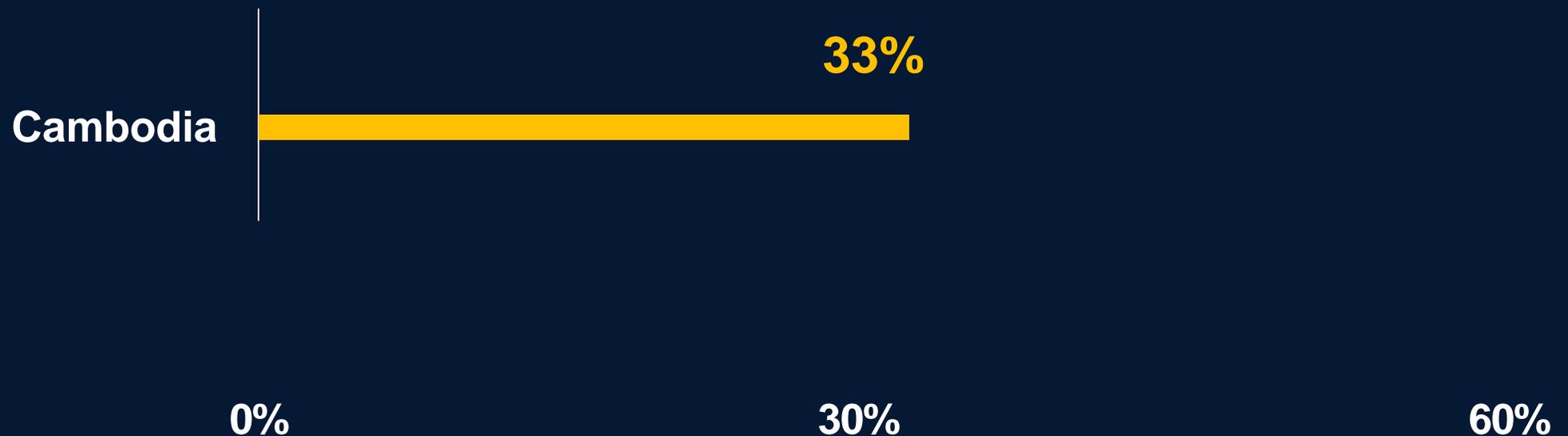
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# Data from assessments have spurred national reforms

EGRA zero-word readers, 2<sup>nd</sup> grade

2012



Source: Graham and Kelly 2017.

Note: Data are from nationally representative samples completed in the second half of the school year. Cambodia scores based on the familiar word reading subcomponent.

# Actions across policy domains drive learning



## Align

institutions to ensure basic conditions for learning



## Concentrate

effective, equity-minded public spending on basic education



## Select and support

teachers throughout their careers to allow them to focus on the classroom



## Ensure

that children are ready to learn in school



## Assess

students to diagnose issues and inform instruction

# Thank you!

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**Raja Bentaouet Kattan**