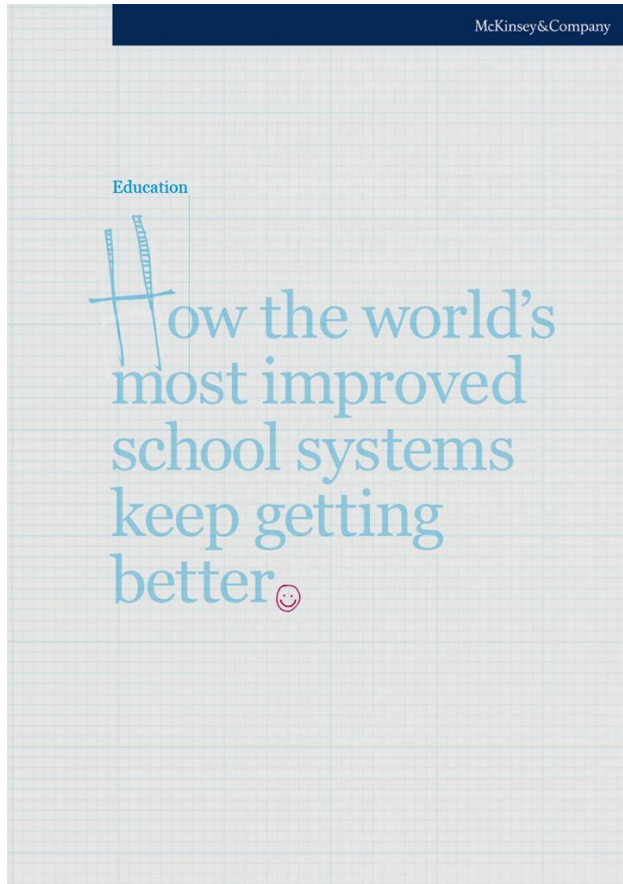




How the world's most  
improved school systems  
keep getting better 😊

CONFIDENTIAL AND PROPRIETARY  
Any use of this material without specific permission of McKinsey & Company is strictly prohibited

# Our report, “How the World’s Most Improved School Systems Keep Getting Better” focuses on global school system performance transformation



## Our research question

How does a system with poor performance become good? How does a good system become great?

- What interventions move a system from poor to fair to good to great to excellent?
- Which aspects of the school system improvement journey are universal and which are context-specific?
- How does a system ignite and sustain system improvement?

# We identified 20 improved systems across the world from which to learn

Each of these systems has achieved an increase in student achievement that is:

✓ Significant

✓ Widespread

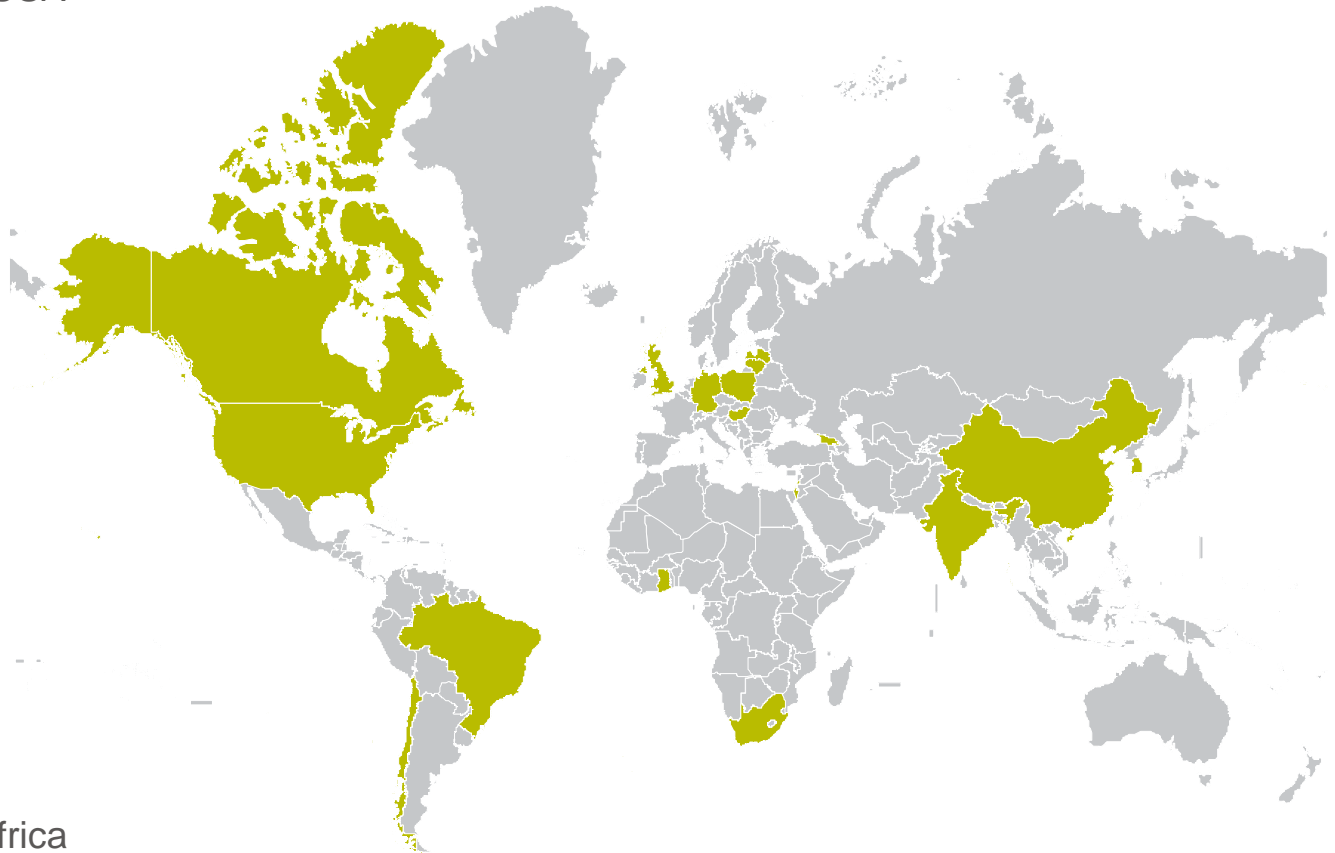
✓ Sustained

## Sustained improvers

1. Aspire Public Schools, USA
2. Boston/Mass, USA
3. England
4. Hong Kong
5. Latvia
6. Lithuania
7. Long Beach, CA, USA
8. Ontario, Canada
9. Poland
10. Saxony, Germany
11. Singapore
12. Slovenia
13. South Korea

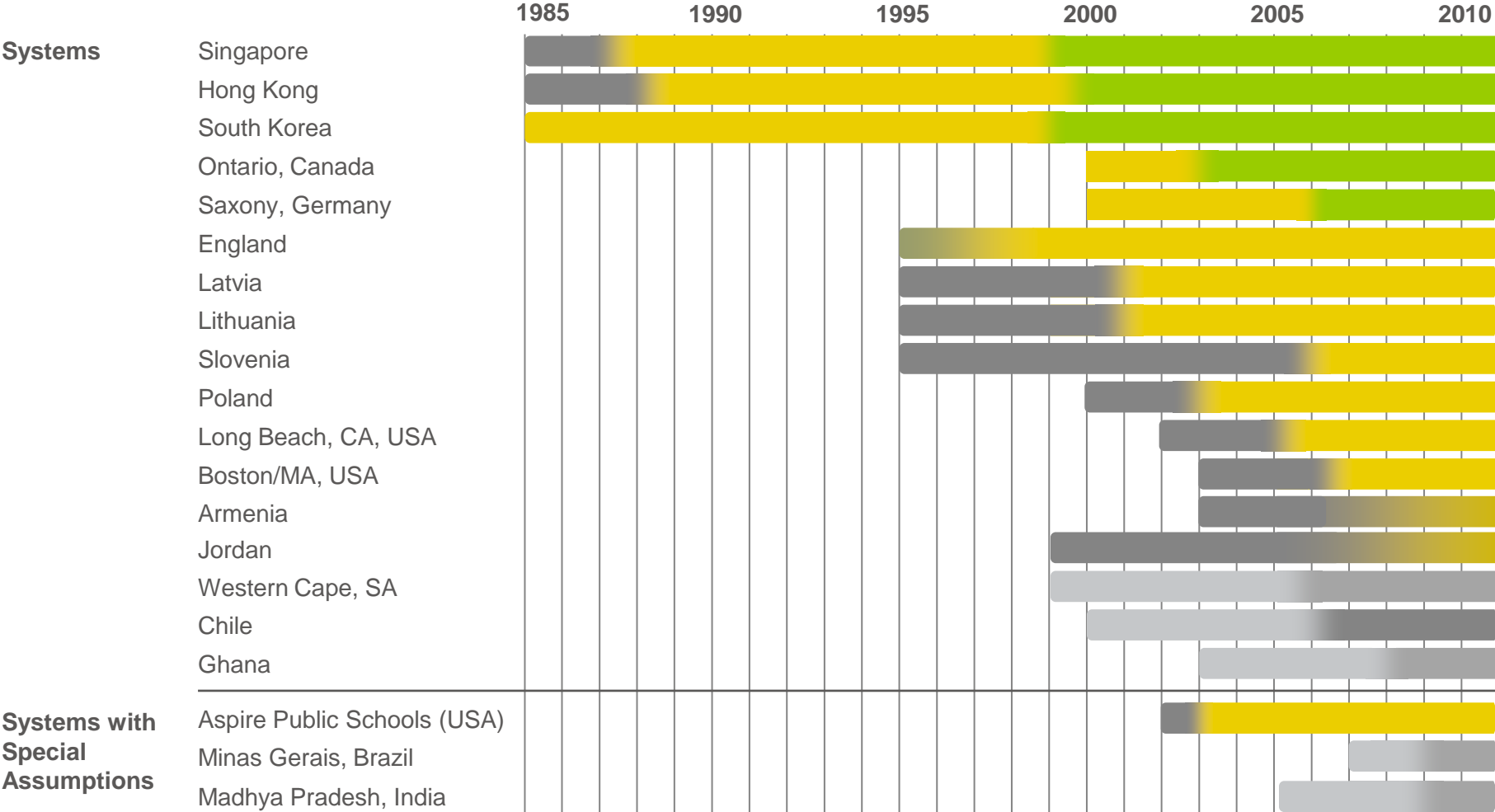
## Promising starts

14. Armenia
15. Chile
16. Ghana
17. Jordan
18. Madhya Pradesh, India
19. Minas Gerais, Brazil
20. Western Cape, South Africa



# Our sample represents a continuum of improvement from poor to fair to good to great

Poor<sup>2</sup>
 Good<sup>2</sup>  
 Fair<sup>2</sup>
 Great



SOURCE: TIMSS, PISA, NAEP, national and provincial assessments; McKinsey & Company interventions database

## Lesson I

---

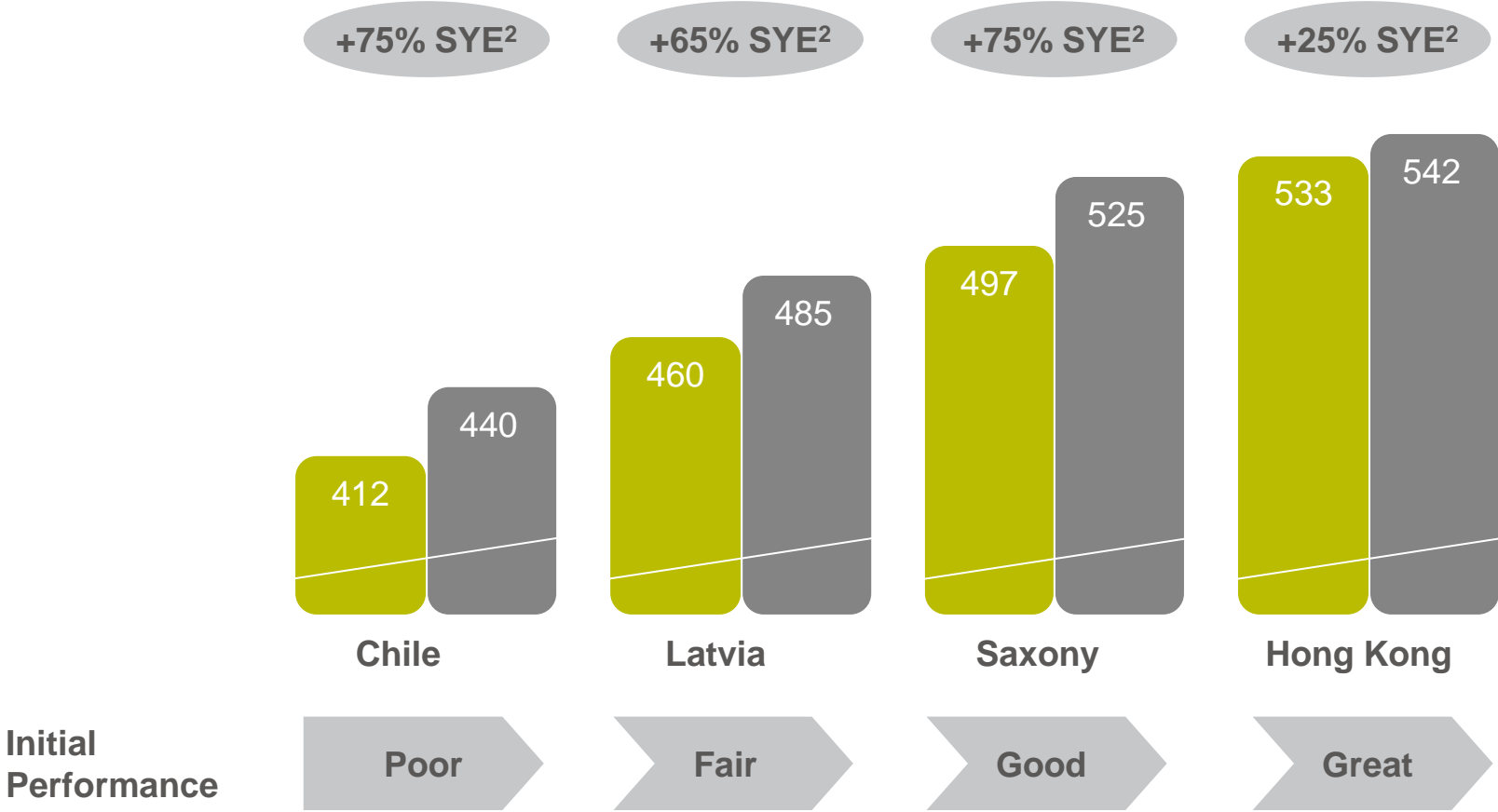
A system can make significant gains from wherever it starts – and these gains can be achieved in as short as six years

---

# Systems at all performance levels can improve outcomes substantially in as short as six years

2000  
2006

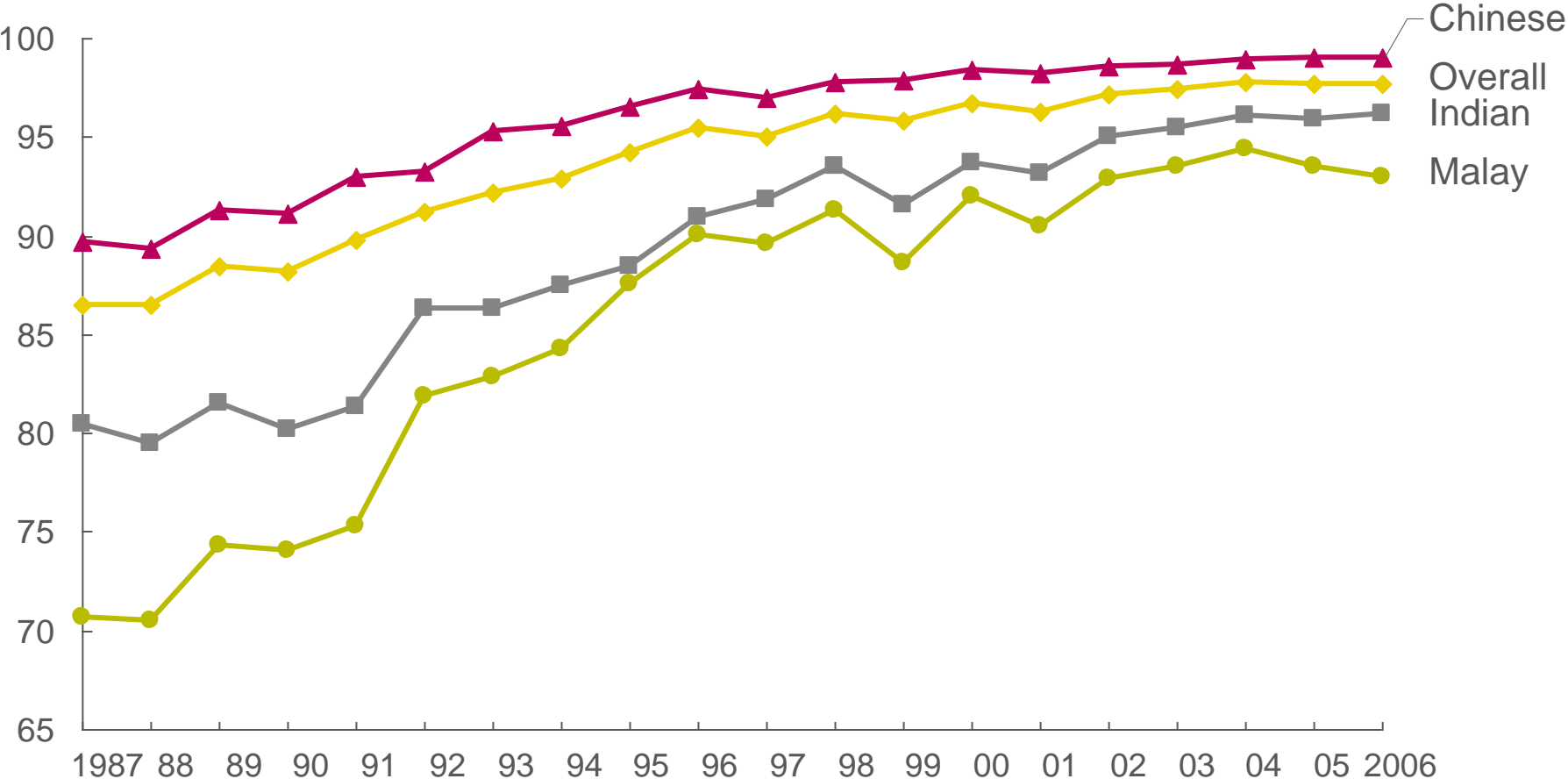
PISA scores, average<sup>1</sup>; 2000–06



1 Average across math, science, and reading PISA scores  
2 One school-year-equivalent (SYE) corresponds to 38 points on the PISA scale  
SOURCE: PISA, McKinsey & Company interventions database

# Singapore narrowed the achievement gap between its ethnic groups

% of pupils who sat the Primary School Leaving Exam and achieved eligibility for secondary school by ethnicity



SOURCE: Singapore Ministry of Education

## Lesson II

---

Each stage of the school system improvement journey is associated with a unique set of interventions, from poor to fair to good to great to excellent

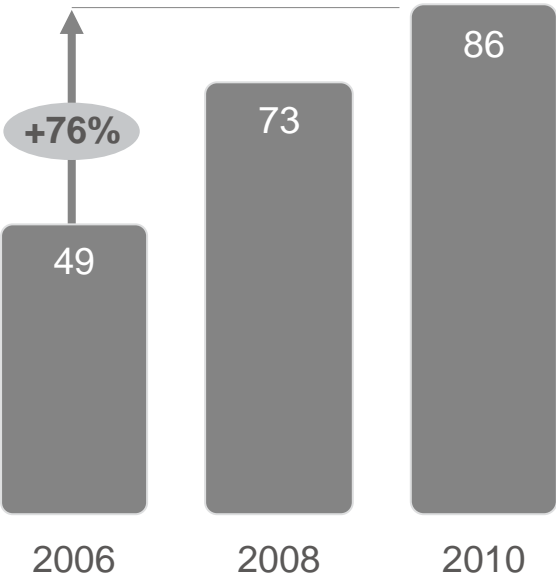
---

# A unique 'intervention cluster' exists for each improvement journey

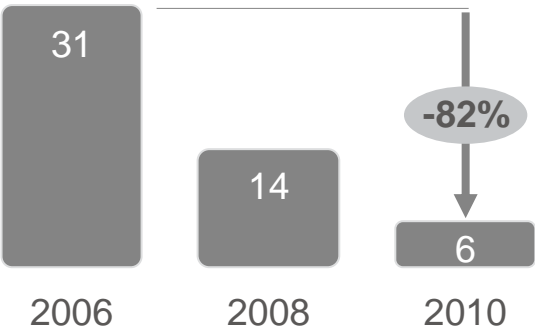


# Following implementation of the literacy reform in 2006, Minas Gerais improved literacy levels and rose to the top of Brazil's national assessment

Percentage of 8 year olds reading at recommended level



Percentage of 8 year olds reading at poor levels<sup>1</sup>



**From 2007 to 2009, Minas Gerais also rose from 5<sup>th</sup> place to 1<sup>st</sup> place among Brazilian states on Brazil's national (IDEB) assessments**

<sup>1</sup> Poor performance level is defined by assessment as students are only able to read words

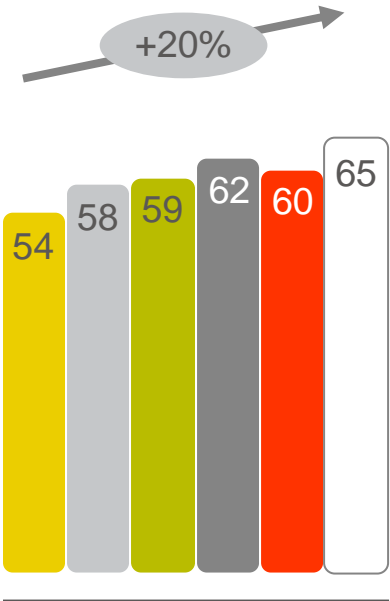
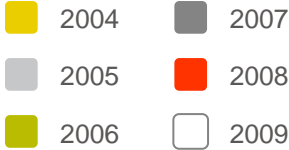
SOURCE: Brazil PROALFA reading assessment

# Poor to fair journeys focus on achieving basic literacy and numeracy

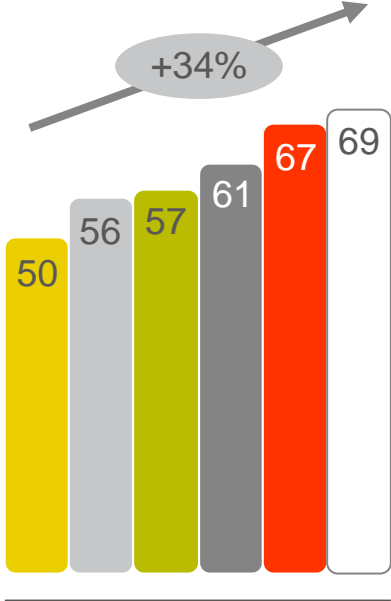
Theme	Intervention types
<b>Providing scaffolding and motivation for low skill teachers and principals</b>	<ul style="list-style-type: none"><li>▪ Scripted lessons</li><li>▪ Instructional time on task</li><li>▪ Coaching on curriculum</li><li>▪ School visits by center</li><li>▪ Incentives for high performance</li></ul>
<b>Getting all schools to minimum quality standard</b>	<ul style="list-style-type: none"><li>▪ Targets, data, and assessments</li><li>▪ Infrastructure</li><li>▪ Textbooks and learning resources</li><li>▪ Supporting low performing schools</li></ul>
<b>Getting students in seats</b>	<ul style="list-style-type: none"><li>▪ Expand seats</li><li>▪ Fulfill students' basic needs</li></ul>
<b>Systems included</b>	Chile (2001–05) Madhya Pradesh (2006+) Minas Gerais (2003+) Western Cape (2003+) Ghana (2003+)

# Long Beach math scores on the California STAR examinations improved significantly between 2004–09

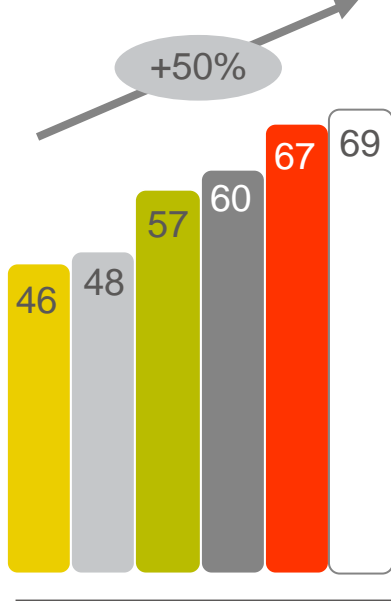
% of students proficient and advanced



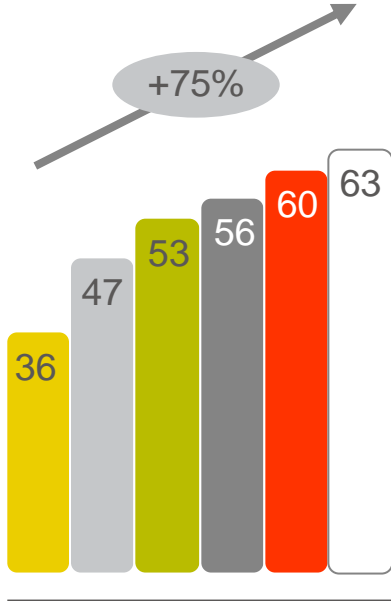
Grade 2



Grade 3



Grade 4

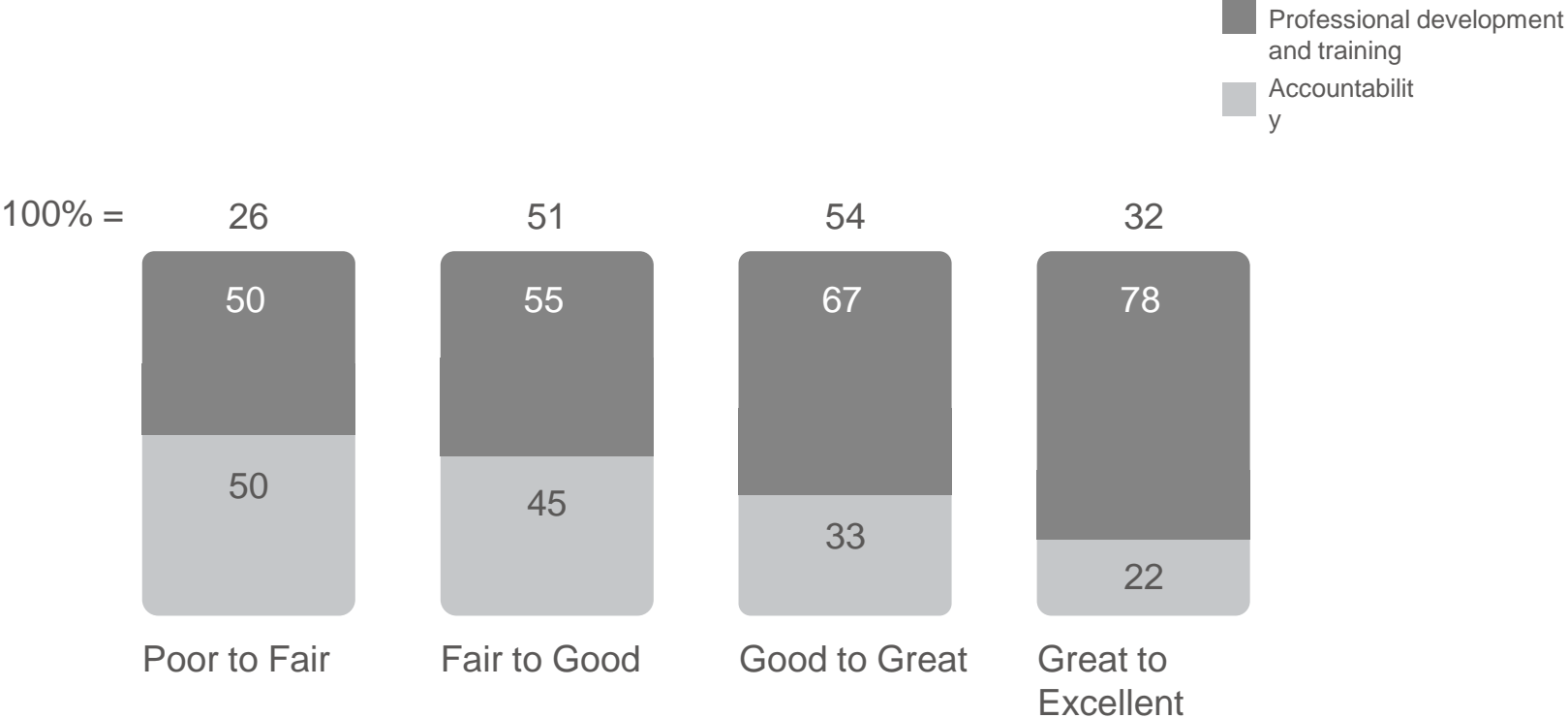


Grade 5

# Good to great journeys emphasize shaping the professional

Theme	Intervention types	
<b>Raising calibre of entering teachers and principals</b>	<ul style="list-style-type: none"> <li>▪ Recruiting</li> <li>▪ Preparation and induction</li> </ul>	
<b>Raising calibre of existing teachers and principals</b>	<ul style="list-style-type: none"> <li>▪ Professional development</li> <li>▪ Coaching on practice</li> <li>▪ Career pathways</li> </ul>	
<b>School-based decision-making</b>	<ul style="list-style-type: none"> <li>▪ Self-evaluation</li> <li>▪ Curriculum flexibility</li> </ul>	
<b>Systems included</b>	Aspire (2003+) Boston (2006+) England (1995+) Hong Kong (1989–99) Long Beach (2005+) Latvia (2001+)	Lithuania (2001+) Poland (2003+) Saxony (2000–05) Singapore (1988–98) Slovenia (2006+) South Korea (1983–98)

# The balance of capability-building and accountability shifts as systems improve their performance



**Capability building vs. formal accountability**  
Share of professional development & training interventions relative to accountability interventions

SOURCE: McKinsey & Company interventions database

# Lesson VII

---

Six interventions occur equally at every performance stage for all systems

---

# There were 6 interventions that we found to be common across all performance journeys...but they manifest different at each stage



I

Revising curriculum and standards



II

Reviewing reward and remunerations structure



III

Building technical skills



IV

Assessing student learning

Impact of School Grades on the School Scale

Scale	All Grades	Grade 4	Grade 5
A	X	X	↓
B	X	X	↓
D	↑	X	↑

V

Utilizing student data to inform delivery



VI

Establishing policy documents and education laws

# Our research highlights nine lessons about school system improvement

- 1 A system can make significant gains from wherever it starts – and these gains can be achieved in as short as six years
- 2 Each stage of the school system improvement journey is associated with a unique set of interventions
- 3 While ‘structure’ and ‘resource’ interventions dominate the debate, ‘process’ deserves as much attention
- 4 A system’s context might not determine what needs to be done, but it does determine how it is done
- 5 Leadership continuity is essential – the median tenure of new strategic leaders is six years and that of new political leaders is seven years
- 6 Prescribe adequacy and unleash greatness, with collaborative practice as the engine of continuous improvement
- 7 Six interventions occur equally at every performance stage for all systems but manifest differently
- 8 Ignition occurs due to socio-economic crisis, a critical report about system performance, or the installation of a new political or strategic leader
- 9 The middle layer plays a crucial role in delivering and sustaining improvement – compliance, communication, collaboration, and insulation

# Most U.S. States are in the “Fair” and “Good” categories

“**Bold**” = State names  
 “*Italicized*” = District names

Great Fair Good Poor

## Great

- **Massachusetts**
- **Minnesota**
- **Montana**
- **New Hampshire**
- **New Jersey**
- **North Dakota**
- **Vermont**

## Poor

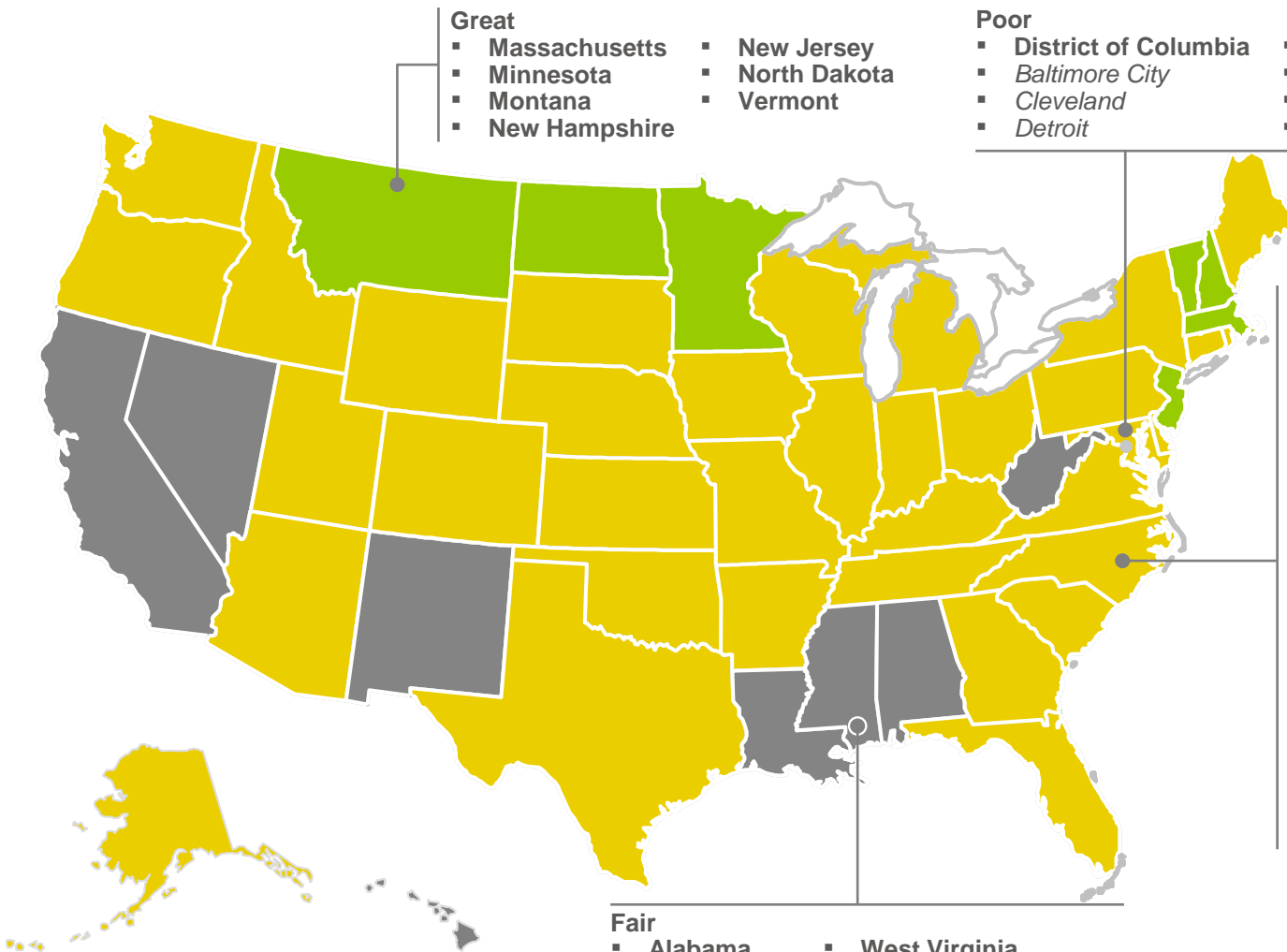
- **District of Columbia**
- *Baltimore City*
- *Cleveland*
- *Detroit*
- *District of Columbia (DCPS)*
- *Fresno*
- *Los Angeles*
- *Milwaukee*

## Good

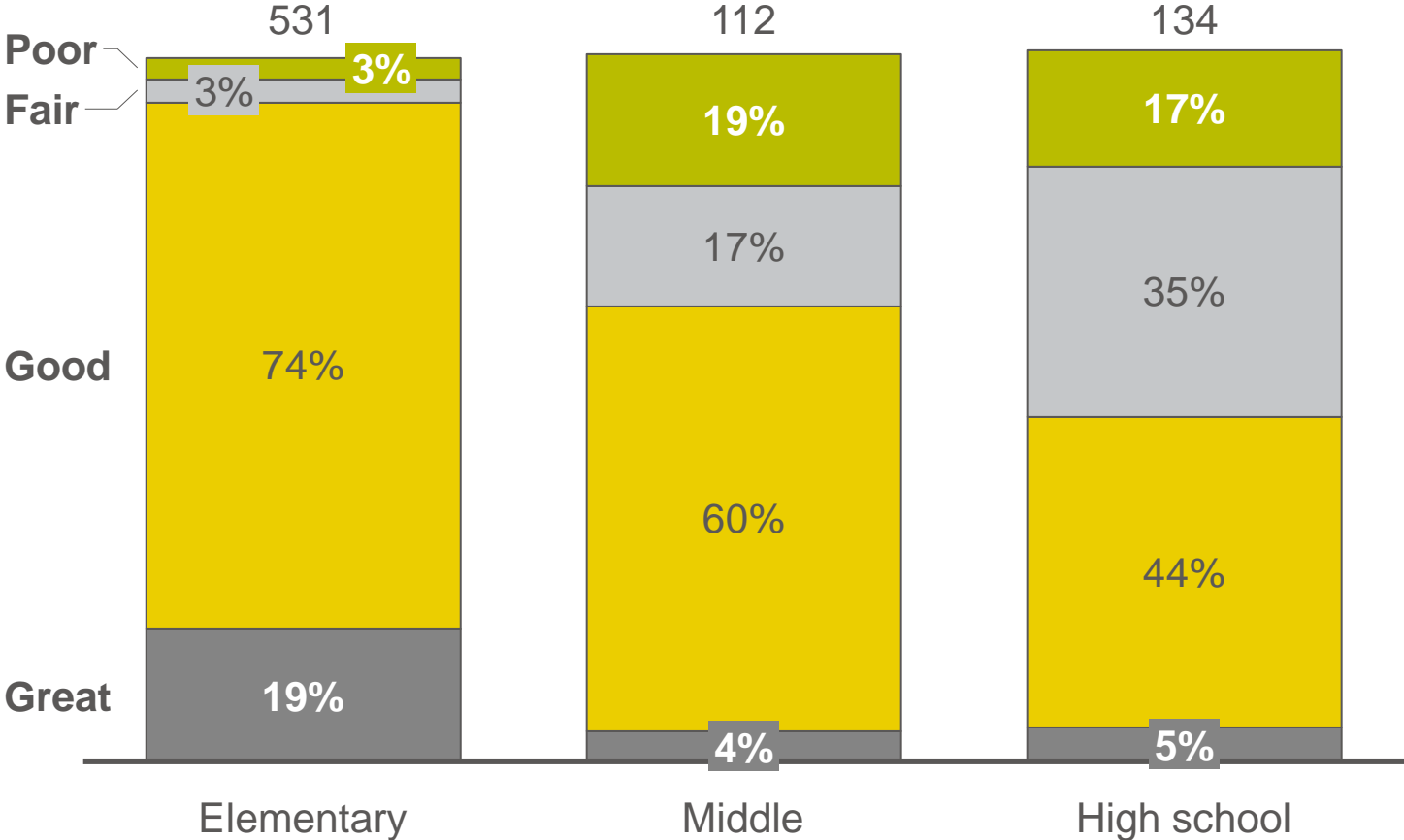
- **Alaska**
- **Arizona**
- **Arkansas**
- **Colorado**
- **Connecticut**
- **Delaware**
- **Florida**
- **Georgia**
- **Idaho**
- **Illinois**
- **Indiana**
- **Iowa**
- **Kansas**
- **Kentucky**
- **Maine**
- **Maryland**
- **Michigan**
- **Missouri**
- **Nebraska**
- **New York**
- **North Carolina**
- **Ohio**
- **Oklahoma**
- **Oregon**
- **Pennsylvania**
- **Rhode Island**
- **South Carolina**
- **South Dakota**
- **Tennessee**
- **Texas**
- **Utah**
- **Virginia**
- **Washington**
- **Wisconsin**
- **Wyoming**
- *Austin*
- *Boston*
- *Charlotte*
- *Miami-Dade*
- *San Diego*

## Fair

- **Alabama**
- **California**
- **Hawaii**
- **Louisiana**
- **Mississippi**
- **Nevada**
- **New Mexico**
- **West Virginia**
- *Atlanta*
- *Chicago*
- *Houston*
- *Jefferson County (KY)*
- *New York City*
- *Philadelphia*



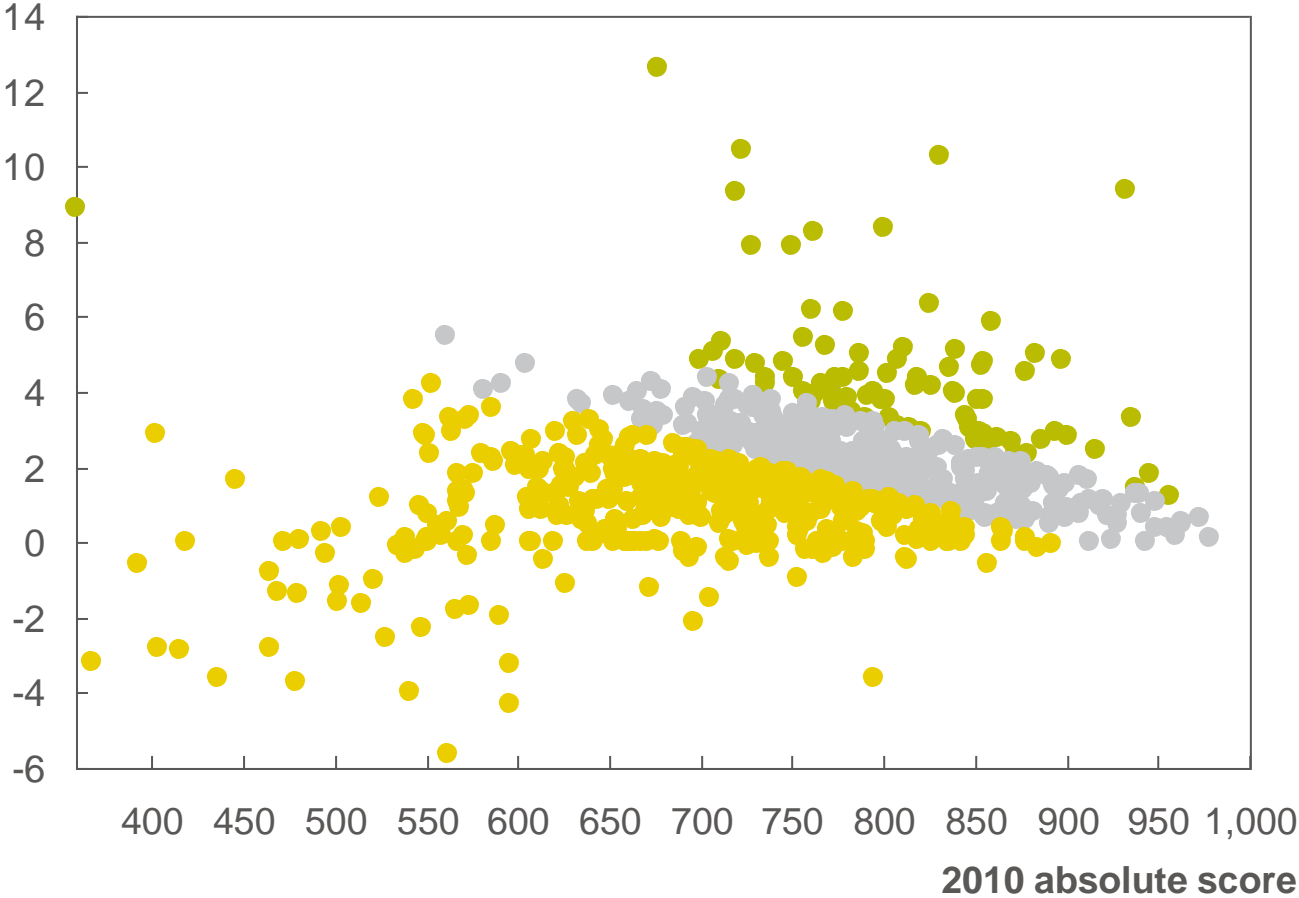
# Performance tier vs. school level



SOURCE: US School District

# 2010 absolute vs. 5-year change in performance





5-year change  
CAGR



- Group**
- A
  - B
  - C

# School systems decide whether to mandate or persuade stakeholders to change based on four contextual considerations

Factors governing the decision of how to implement the change

	Mandate		Persuade
 What is the desired <i>pace of change</i> ?	Rapid	↔	Gradual
 Is the change <i>'non-negotiable'</i> ?	Yes	↔	No
 Will there be stark <i>winners and losers</i> ?	No	↔	Yes
 How much <i>political capital</i> does the leadership have?	High	↔	Low