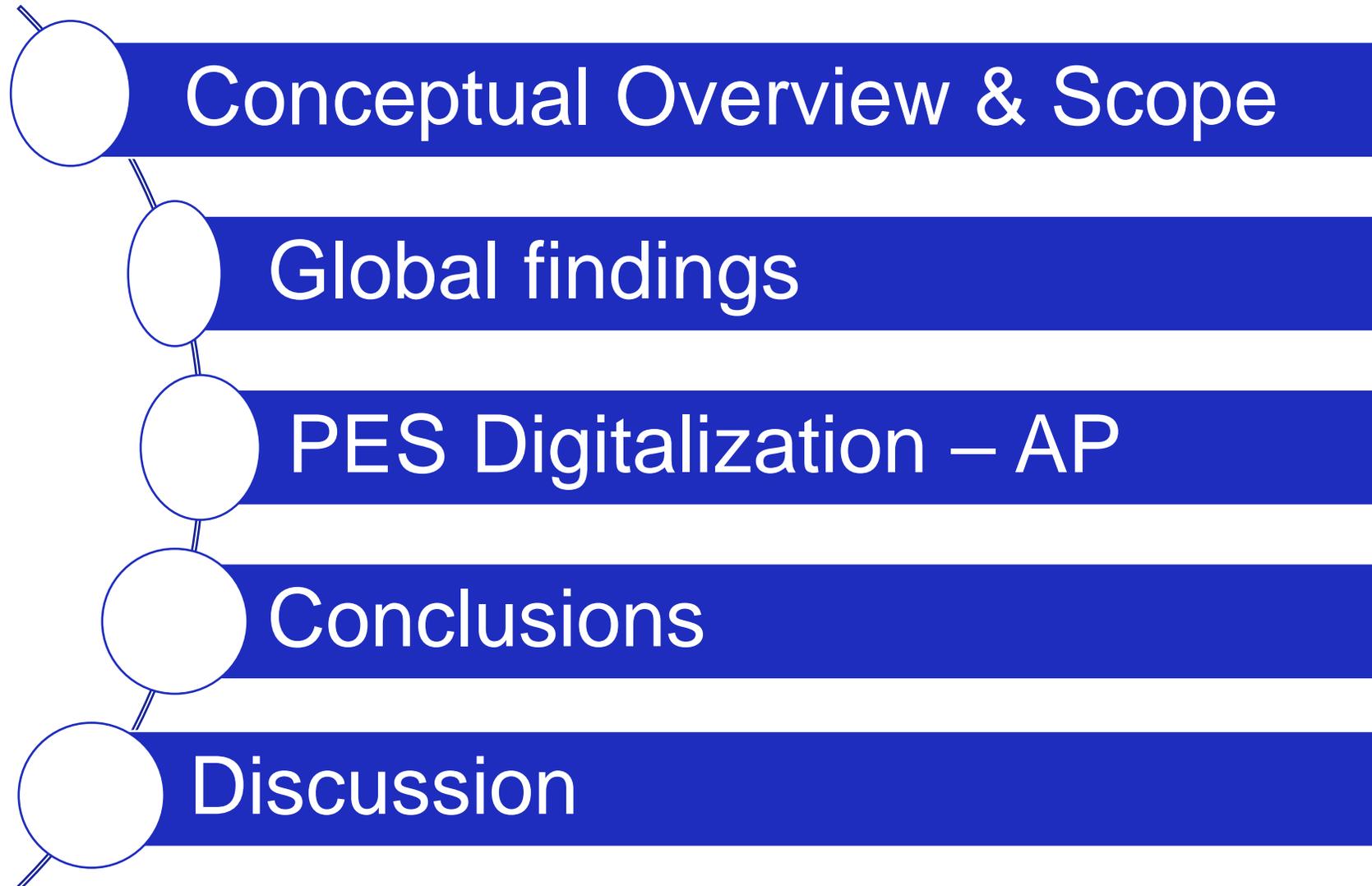


Overview of Asia-Pacific digitalisation policies and trends
WAPES/KEIS PES Digitalization Webinar

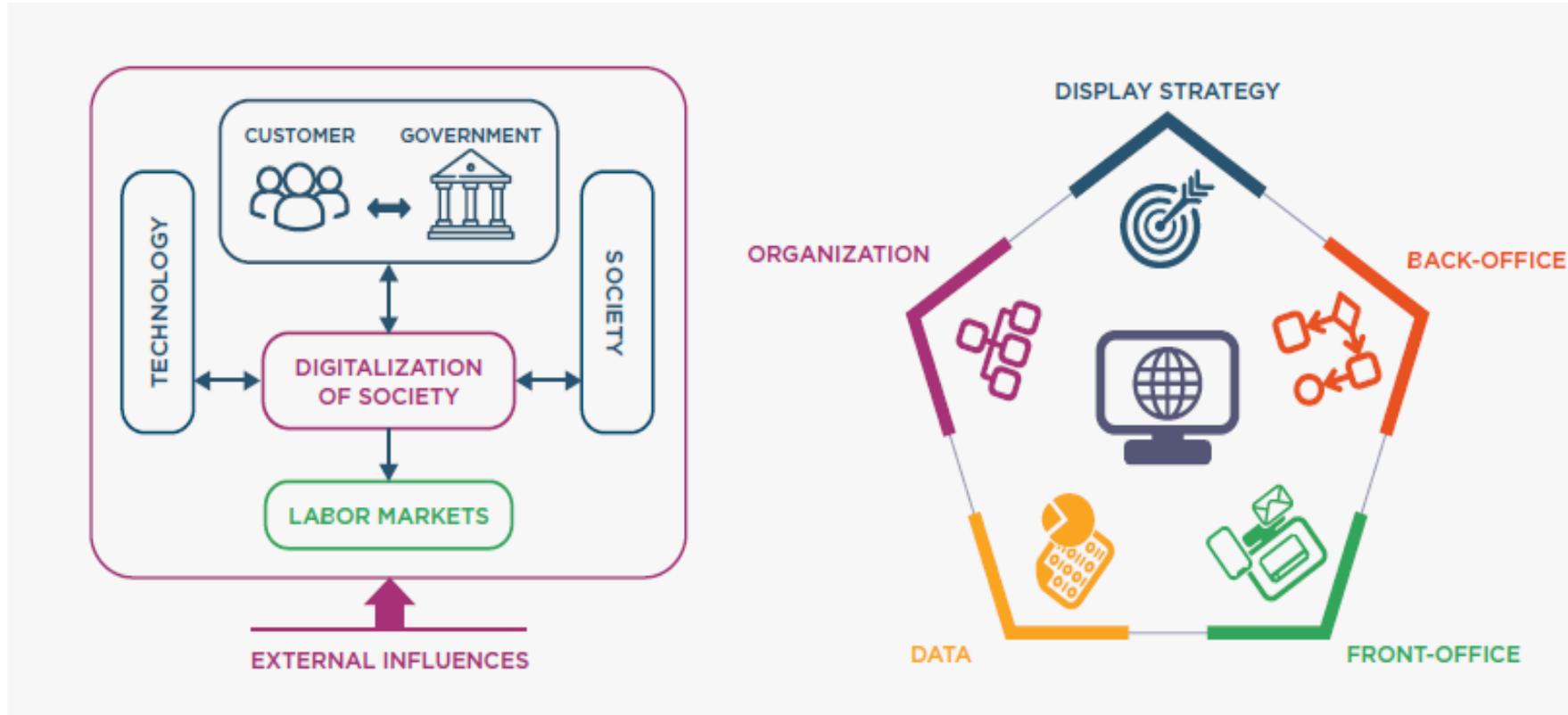
Michael Mwasikakata

Head, Labour Market Services for Transitions Unit
EMPLAB, ILO Employment Policy Department



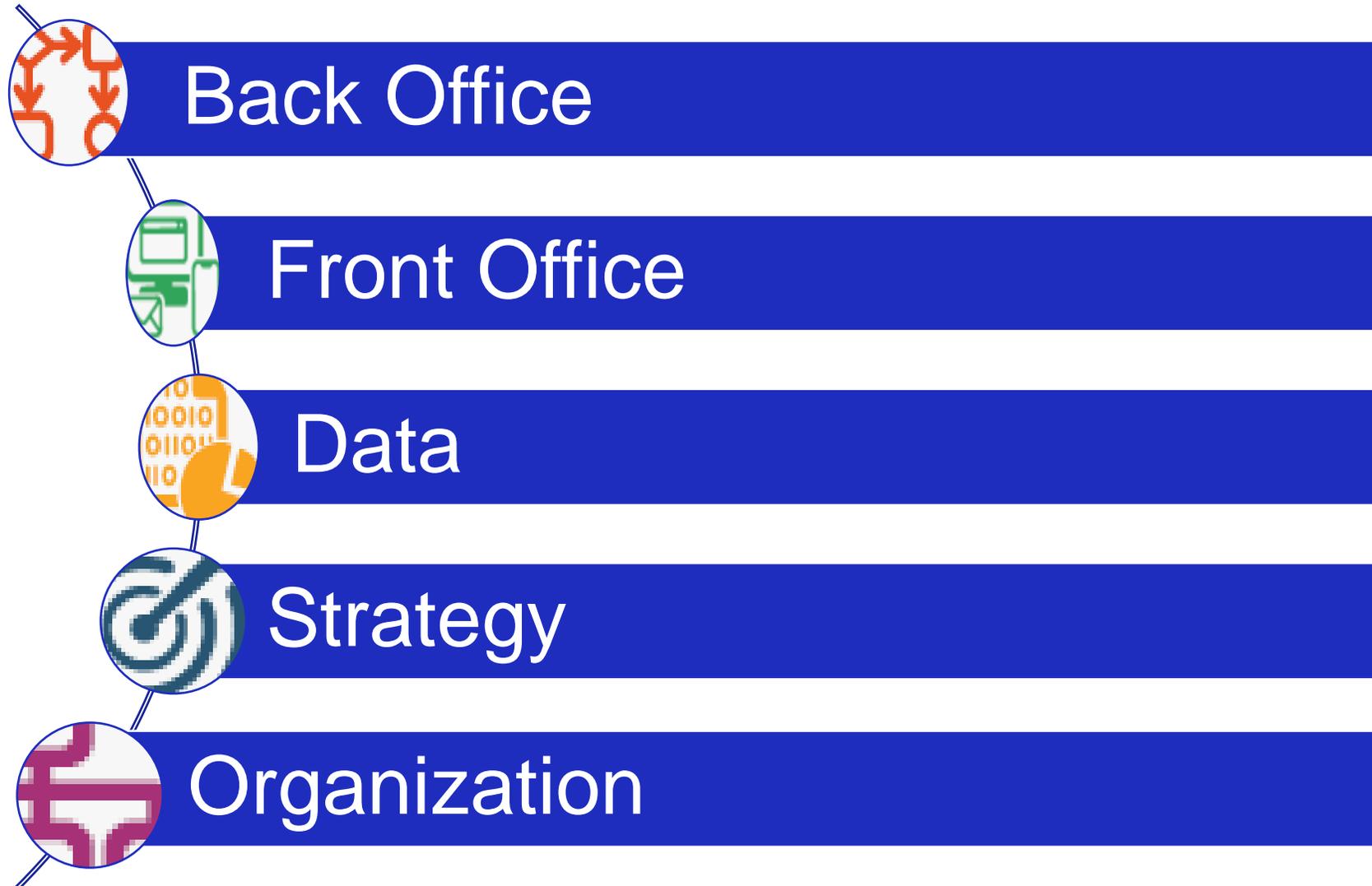


Strategic Digital Maturity Framework

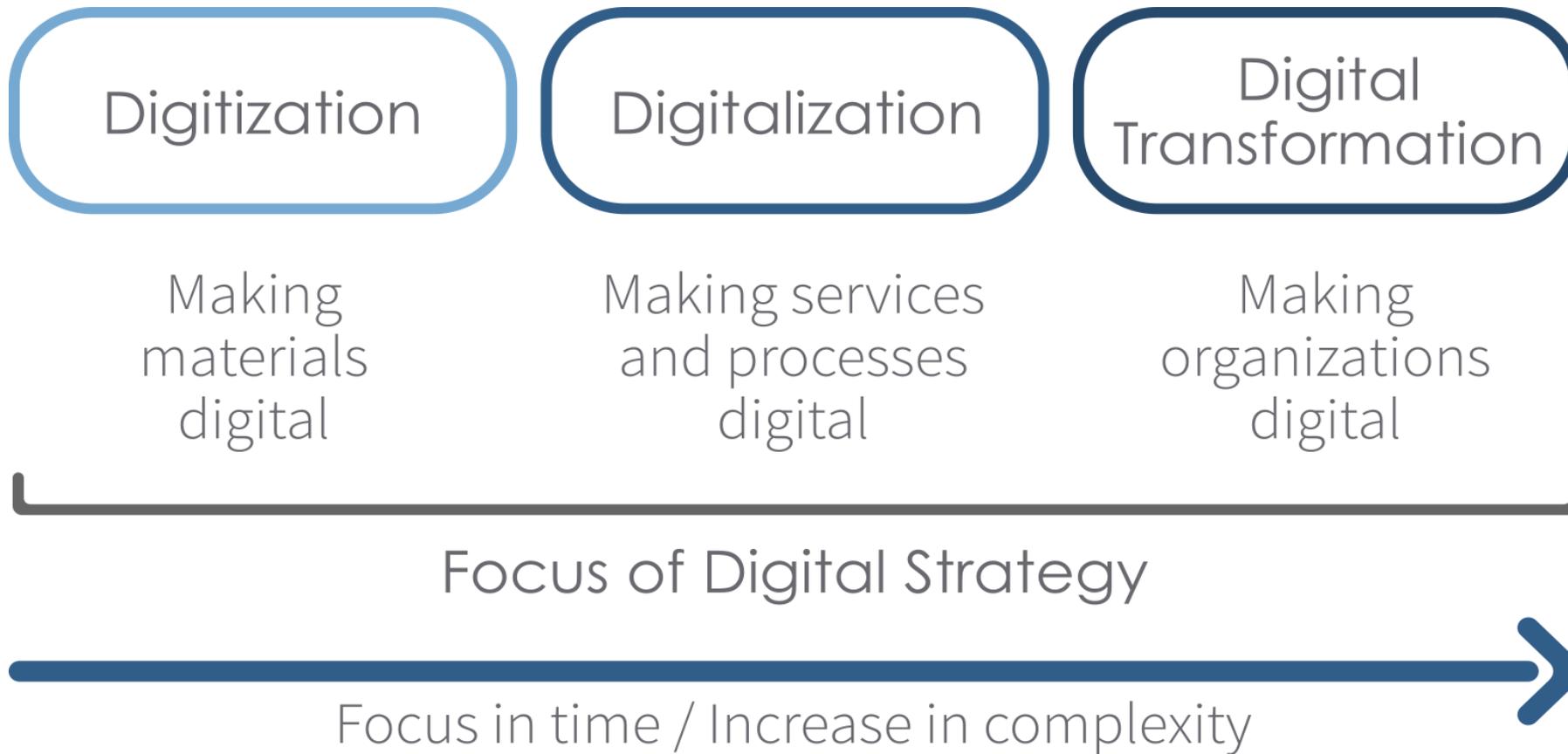


Source: Pieterse et al, 2023

Strategic Digital Maturity Framework- Reality??



Digital adoption journey framework



LAC, IDB

TABLE 2 COUNTRIES SURVEYED IN 2019 AND 2022

	2019	2022
Argentina		X
Barbados		X
Bolivia	X	X
Brazil	X	X
Chile ²³	X	X
Colombia	X	X
Costa Rica	X	X
Ecuador	X	X
Honduras		X
Mexico	X	X
Panama		X
Paraguay	X	X
Peru	X	X
Guatemala		X
Suriname		X
Uruguay		X

Countries surveyed in 2020 and 2022 Global/AP

Country	2020 Global	2022 AP	
Australia	X	X	
Cambodia	X	X	
China	X	X	
India		X	
Indonesia		X	
Japan	X	X	
Nepal		X	
Philippines		X	
Republic of Korea	X	X	
Singapore	X	X	
Vietnam		X	

PES Digital maturity is a function of country's overall tech adoption⁷

It is nonetheless not a one to one relationship!

Table 1. Study countries and their ranking in the United Nations' E-Government Development Index (EGDI)

Country	2022	2020	2018	2016
Australia	7	5	2	2
Cambodia	127	124	145	158
China	43	45	65	63
India	105	100	96	107
Indonesia	77	88	107	116
Japan	14	14	10	11
Nepal	125	132	117	135
Philippines	89	77	75	71
Republic of Korea	3	2	3	3
Singapore	12	11	7	4
Viet Nam	86	86	88	89

TABLE 1 UNITED NATIONS EGOVERNMENT RANKINGS 2016, 2018, 2020 & 2022

Country	Rank 2022	Rank 2020	Rank 2018
Argentina	41	32	43
Barbados	79	62	46
Bolivia	98	97	103
Brazil	49	54	44
Chile	36	34	42
Colombia	70	67	61
Costa Rica	56	56	56
Ecuador	84	74	84
Guatemala	126	121	113
Honduras	155	138	123
Mexico	62	61	64
Panama	82	84	85
Paraguay	94	93	108
Peru	59	71	77
Suriname	108	122	116
Uruguay	35	26	34

▶ **Key findings – Global (2020)**

▶ Findings from ILO 2020 global survey on digital transformation of public employment services (1)

- ▶ All PES in the study had **digitalized or automated at least one core service using technology when COVID-19 crisis hit**
- ▶ **Harnessing technology** to improve service delivery, however, is **not a linear process** and differs across countries.
- ▶ Technology has been critical for PES to **activate, augment and expand support to jobseekers, workers and employers** affected by the COVID-19 crisis.
- ▶ **More intense use of web-based technology is necessary to deliver services.** But not all PES respondents had migrated their full menu of services to online access
- ▶ **Adopting web-based technology is not enough to facilitate service delivery.** There are **multiple factors** to consider, including the ability to leverage the systems already in use, accessibility by clients through different service touch points, data governance and investment.

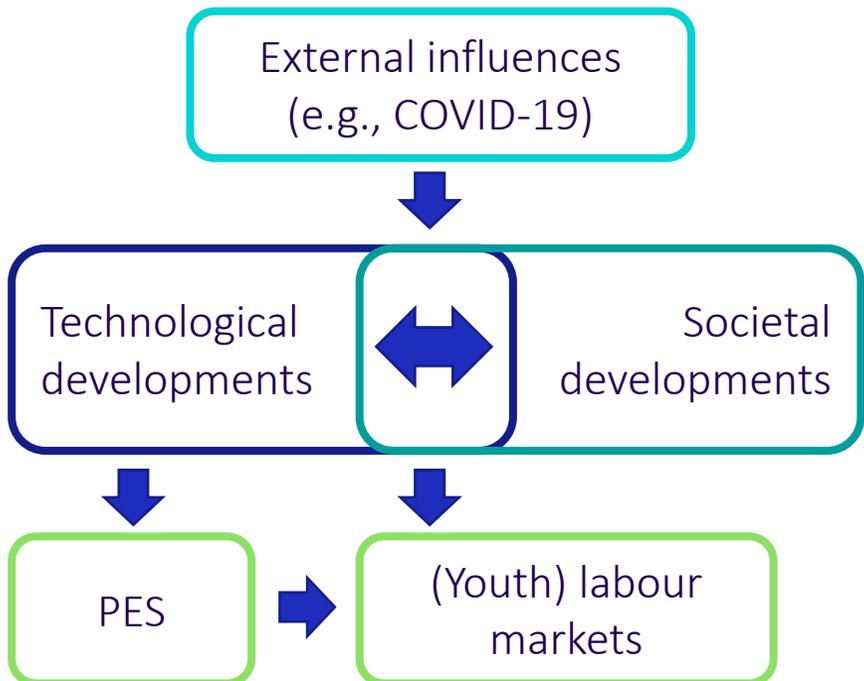
▶ Findings from ILO 2020 global survey on digital transformation of public employment services (2)

- ▶ Technology and digital tools in particular offer **great potential for improved targeting, evidence-based decision-making and faster response times**. However, there are core capabilities that public employment services need to secure.
- ▶ **Trained and qualified staff** are essential for technology to permeate the daily functioning of employment offices.
- ▶ **Artificial intelligence capabilities are still limited for delivering employment services.**
- ▶ Overall, **PES' modernization goes beyond technology adoption**. The survey findings confirm that technology is a vehicle to streamline, automate and improve operations.
- ▶ The **digital divide makes disparities persist for groups facing disadvantage in the labour market**. Public employment services need to ensure that technology-facilitated services are accessible, secure and easy to use for all.
- ▶ **Advanced technology still needs a human touch to be responsive and inclusive.**

▶ **Key findings – Asia Pacific 2022**

Study background

Study framework



Questions

- ▶ How are PES digitally transforming themselves, especially in the wake of the COVID-19 pandemic
- ▶ How are PES using technology to support youth in the labour market

Public employment services from 11 countries in Asia-Pacific:

Australia, Cambodia, China, India, Indonesia, Japan, Nepal, Philippines, Republic of Korea, Singapore and Viet Nam

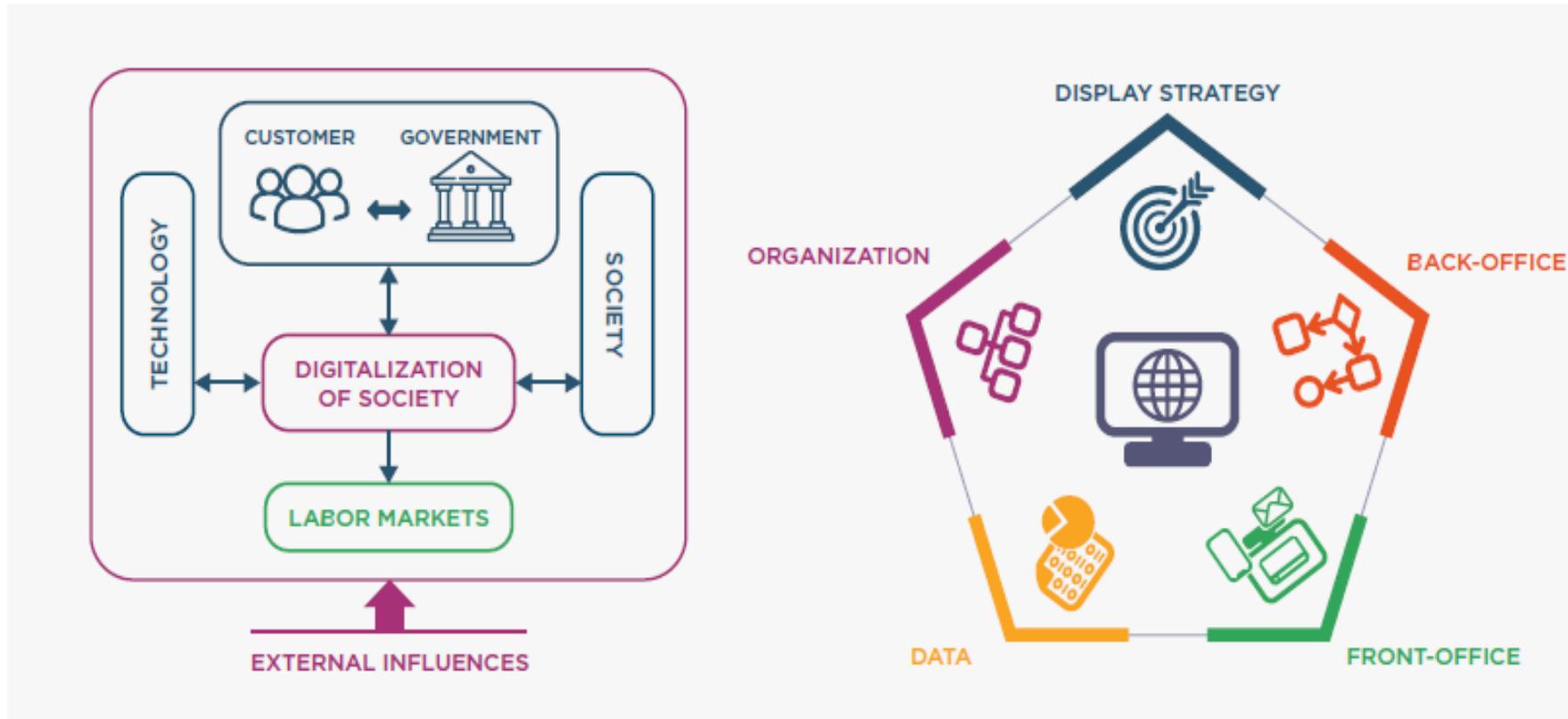
Approach

- ▶ Multi-country study led by ILO in collaboration with the World Association of Public Employment Services (WAPES)
- ▶ Mixed methods: 2022 survey followed by written input or interview
- ▶ Building on global ILO survey in 2020 on digital transformation of PES

Survey – Three parts

- ▶ Role of (digital) technologies in PES in general
- ▶ Youth services and programmes
- ▶ Role of technologies for youth

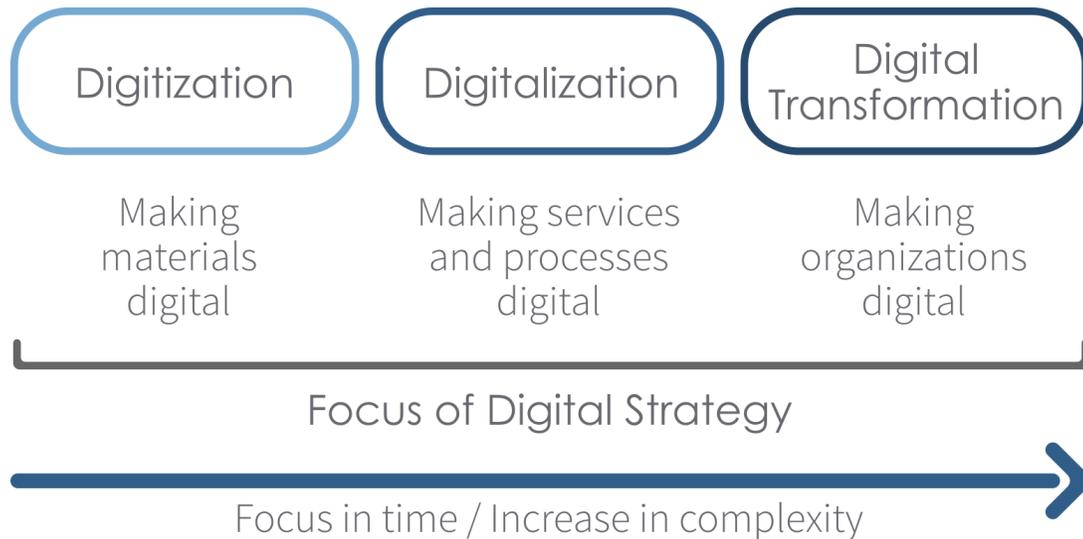
Recall: Strategic Digital Maturity Framework



Source: Pieterse et al, 2023

Role of digital technologies | Strategic level

In 2022, all participating PES have some form of digital strategy ...



A digital strategy in the context of PES is the application of information and technology to provide value for jobseekers, employers, and other stakeholders as defined in the PES mission and within the context of its vision.

Nature of PES digital strategies in 2022

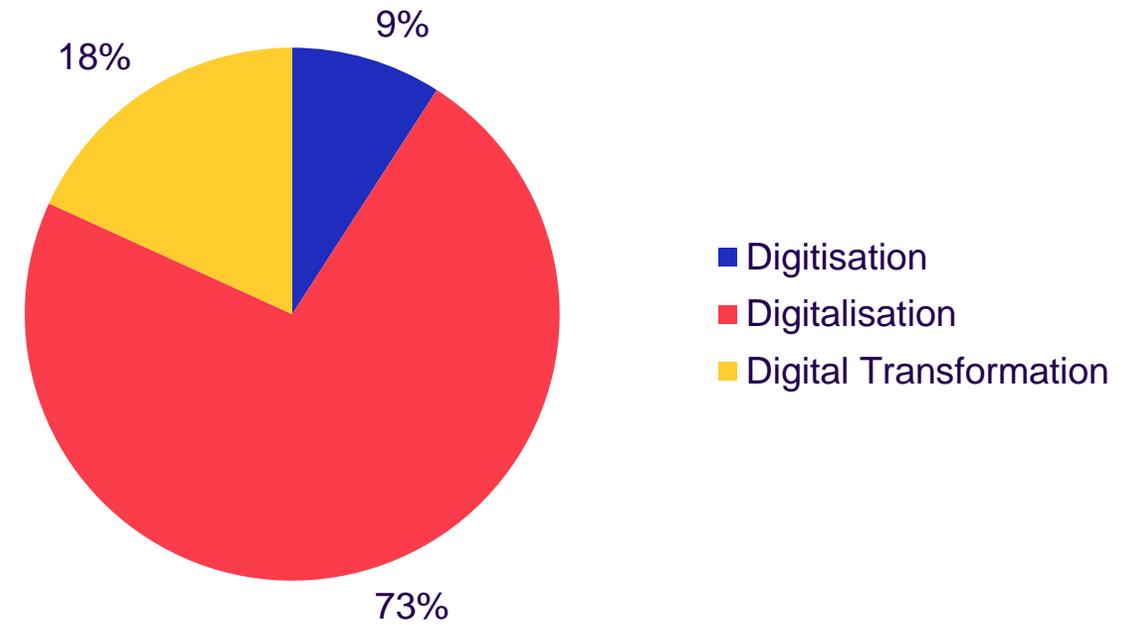


FIGURE 9 FOCUS OF DIGITAL STRATEGIES IN 2019 AND 2022

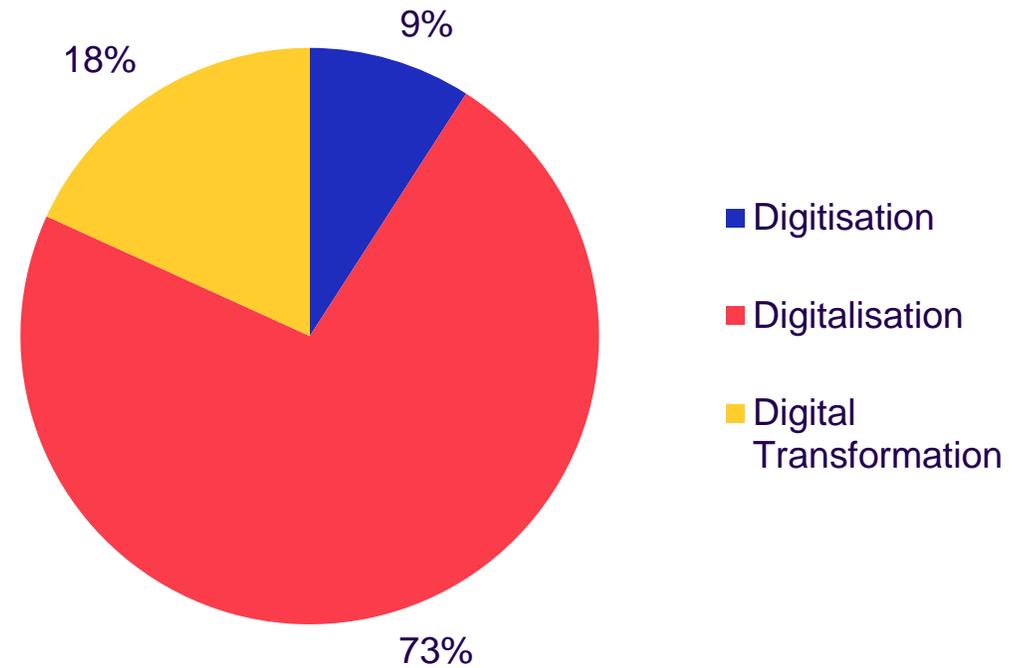
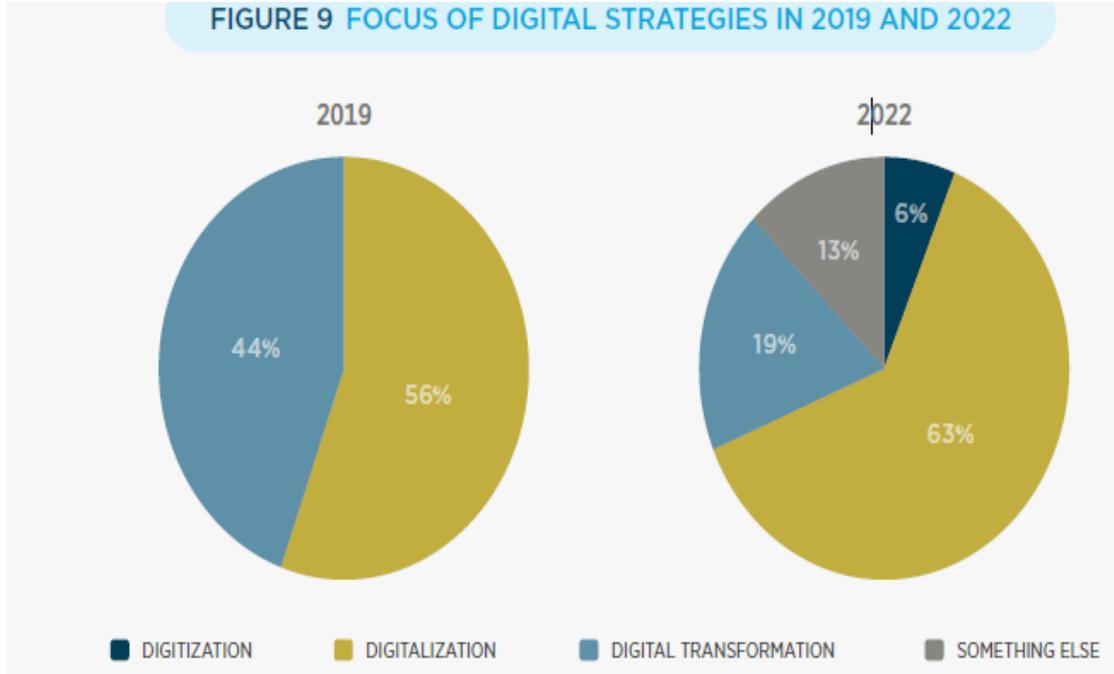


FIGURE 4 SELF-REPORTED OVERALL MATURITY STATUS

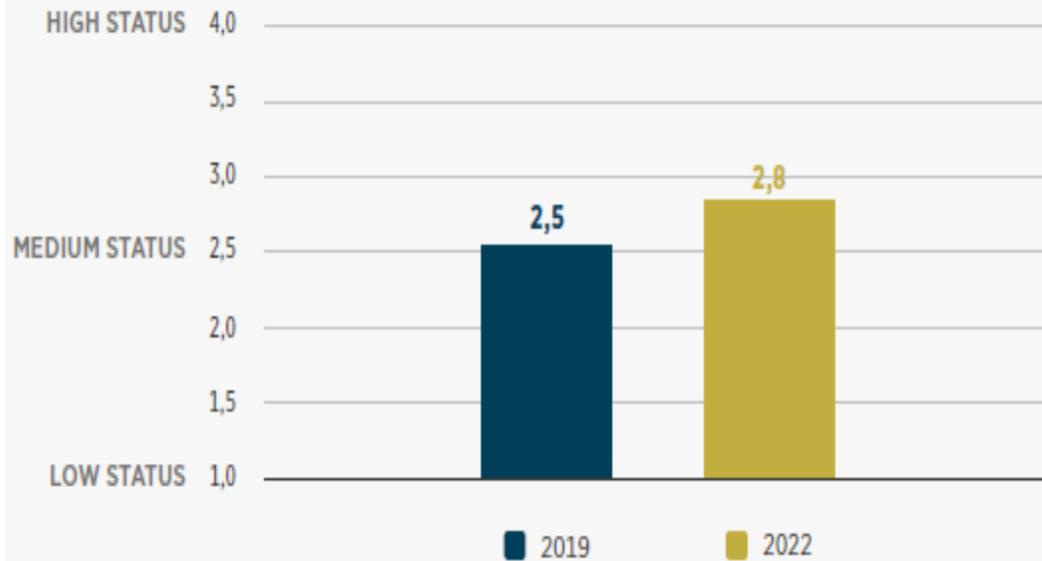
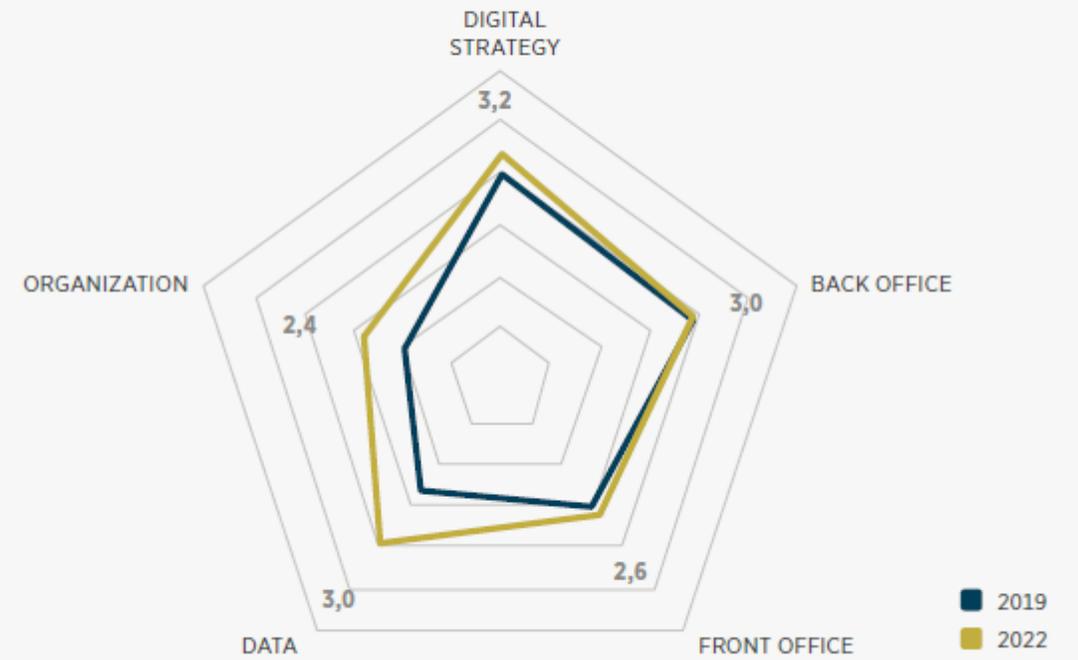
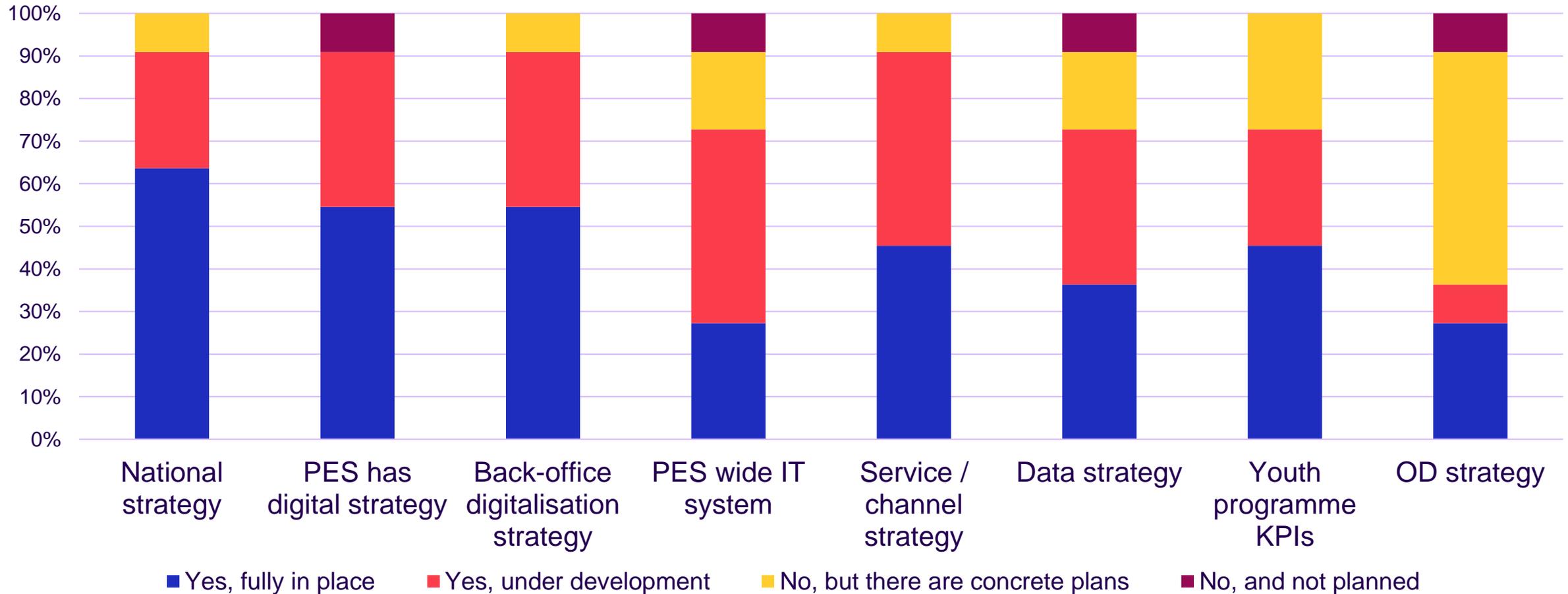


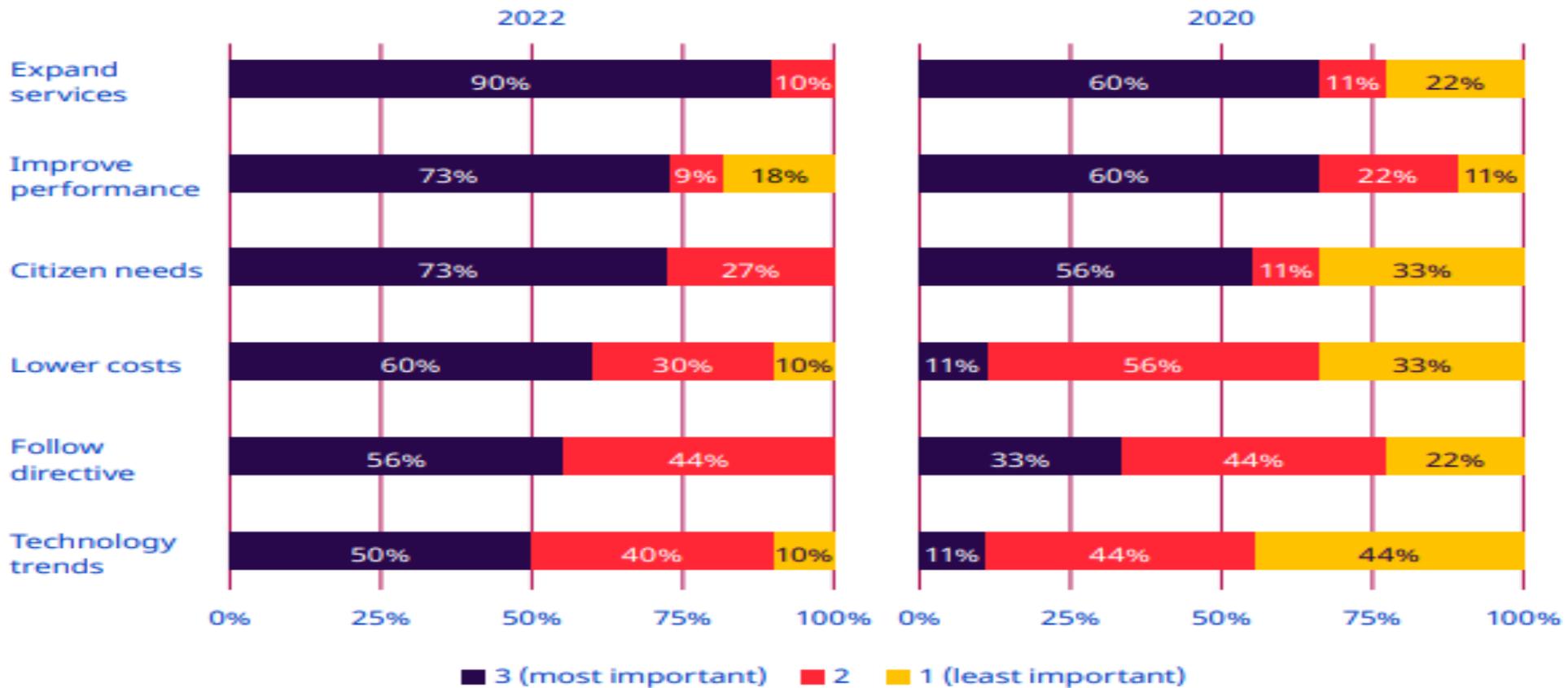
FIGURE 5 SELF-REPORTED OVERALL MATURITY STATUS PER DIMENSION





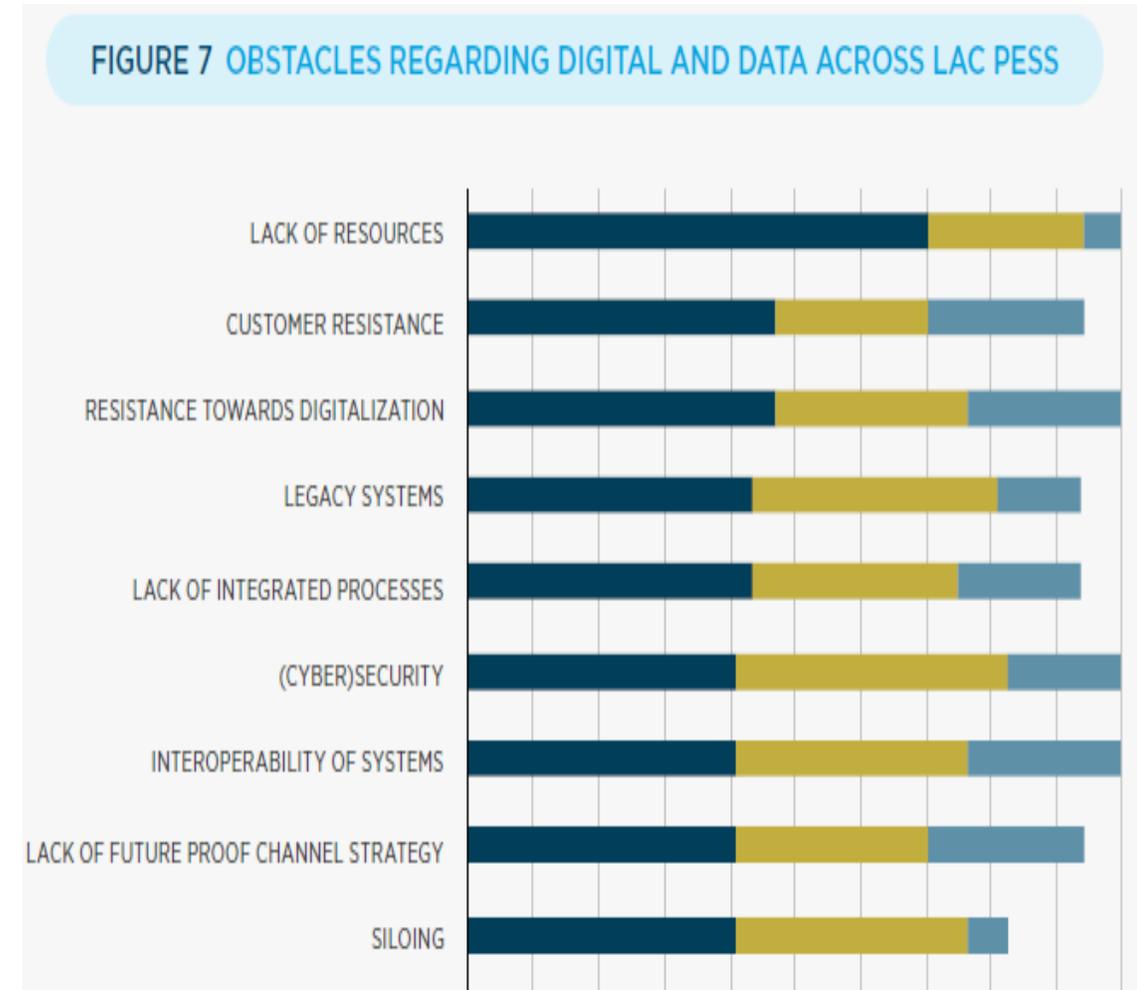
► **Figure 7. Factors driving the adoption of digital technologies in PES, 2020 and 2022**

Factors ranked from most (3) to least (1) important:

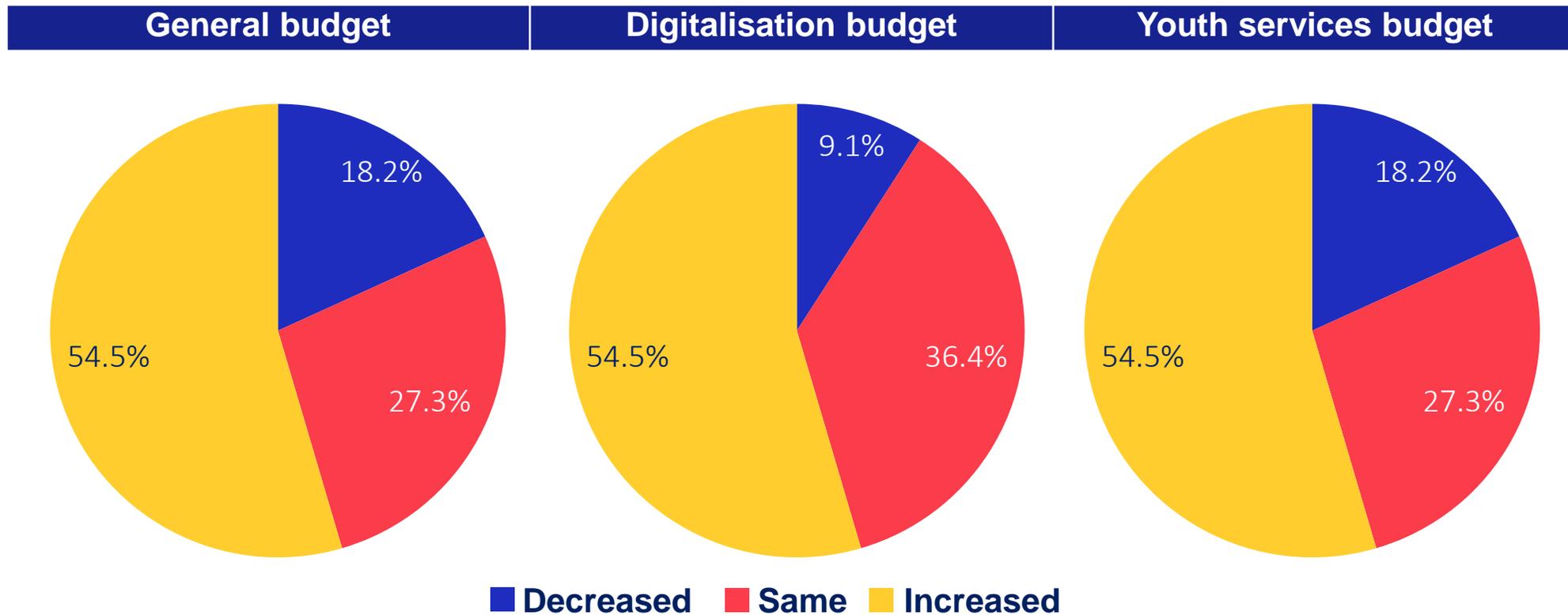


Note: 2020 data based on ILO 2020 survey and consists of n=9 countries that also participated in 2022.

Main obstacles towards digitalisation (top 8)



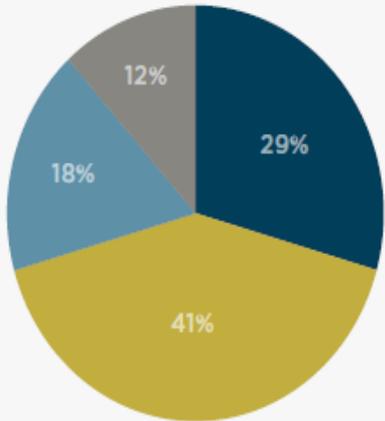
Impact of COVID-19 on budgets of the PES



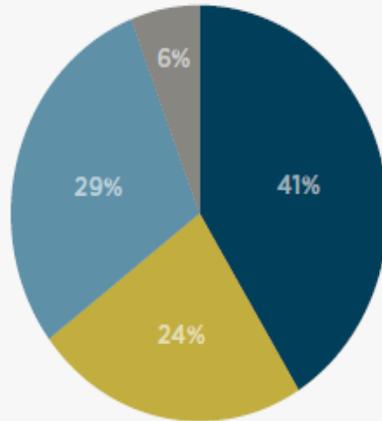
Operational aspects: Increase in digitalization budgets often used for the introduction of online meetings and virtual job fairs. China: Acceleration of digital strategy, Australia: transition into other modes of delivery through technology

FIGURE 10 IMPACT OF COVID-19 ON PES BUDGETS

GENERAL BUDGET

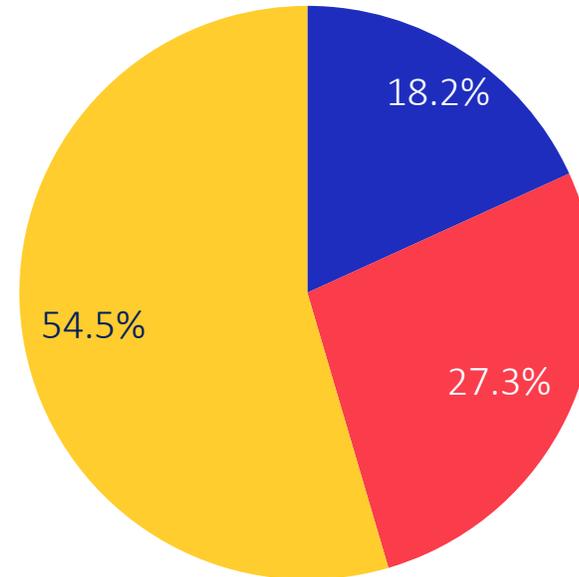


DIGITALIZATION BUDGET

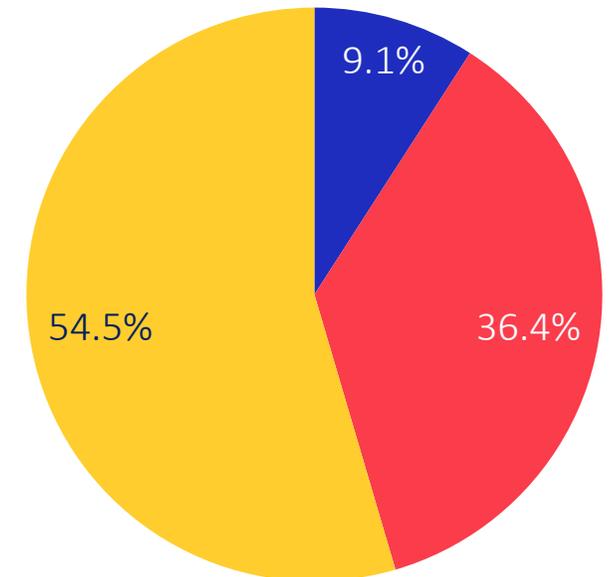


■ DECREASED ■ STAYED THE SAME ■ INCREASED ■ DON'T KNOW / NOT APPLICABLE

General budget



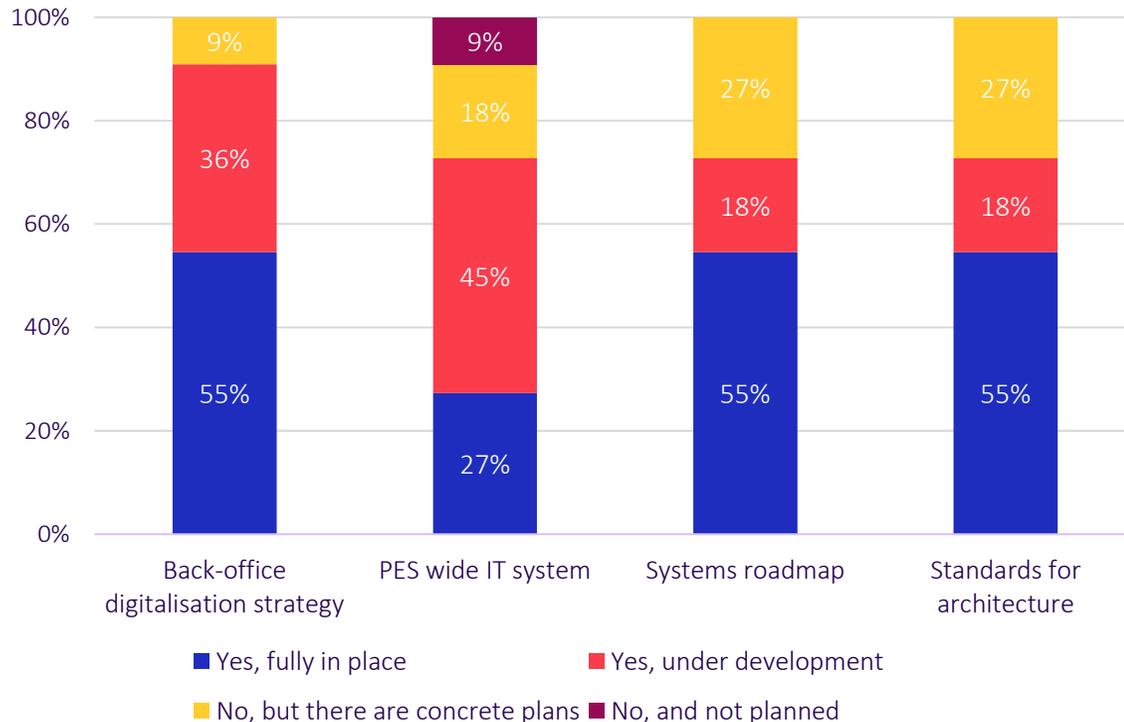
Digitalisation budget



■ Decreased ■ Same ■ Increased

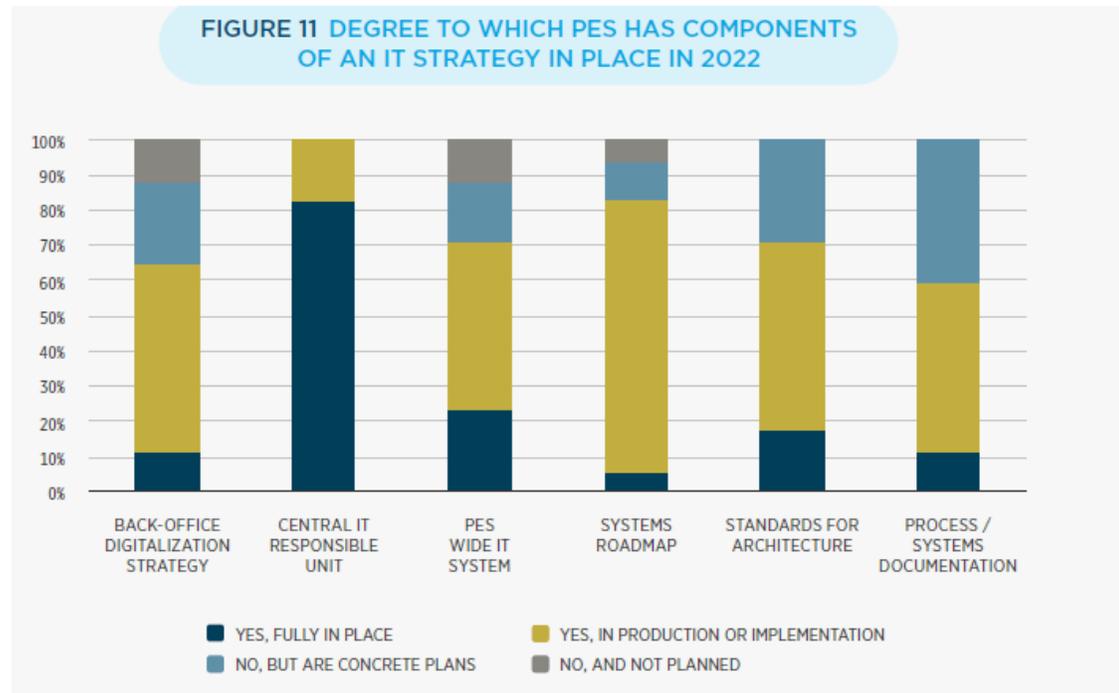
▶ Back-office and IT developments

Key back-office and IT developments

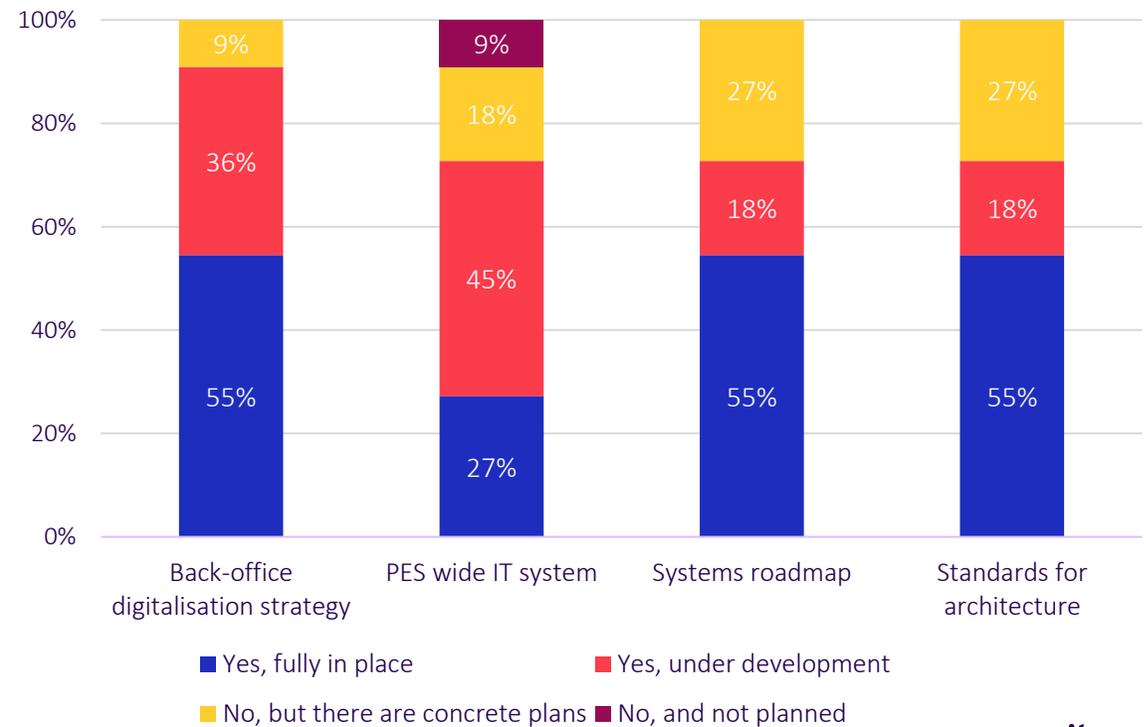


- ▶ Overall positive impact from application of digital technologies on efficiency, effectiveness and coverage.
- ▶ Better diagnose the needs of young people and improve targeting and profiling, using biometric and spatial data and connecting it to real-time labour market information.
- ▶ Improve matching and counselling by complementing online interactions with face-to-face counselling when necessary.
- ▶ Use new technology to improve programme monitoring and coordination with other service providers.

Back IT Developments AP vs LAC



Key back-office and IT developments



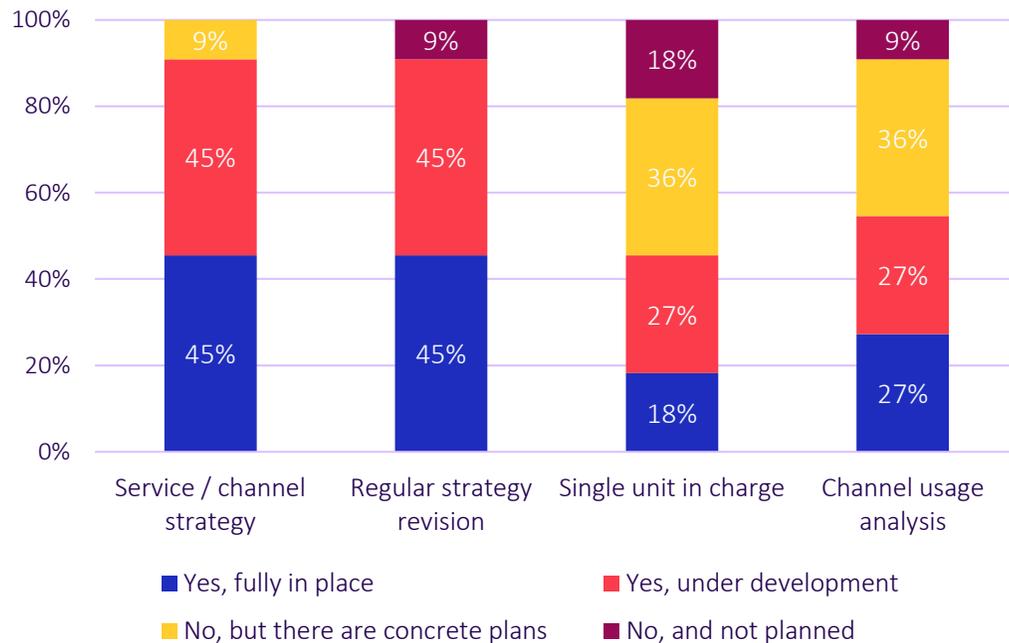
▶ Business and process transformation in Singapore

Workforce Singapore has set up a **Transformation Support Group to catalyse business and process transformation efforts in the organization**, such as by making greater use of business process re-engineering, ops-tech collaboration, and innovation. Some initiatives spearheaded by the Transformation Support Group include:

- ▶ The launch of a Cloud-based, one-stop platform which empowers staff to manage their human resources / finance / procurement needs in real time, coupled with educational efforts to help staff ease into using the platform.
- ▶ Alternative approaches to traditional work undertaken by the organization: for example, instead of conducting physical job fairs, the Group experimented with virtual interview platforms which allowed employers to efficiently shortlist suitable candidates for interviews.

▶ Role of digital technologies | Front office, services and channels

The role of technology in PES front offices, services, and channels



- ▶ PES across the Asia-Pacific tend to have digital back-office strategies in place, **most do not have such digital strategies in place for front-office development.**
- ▶ Just a quarter of PES **analyse the usage of existing channels**
- ▶ While PES do have **strategies regarding their services and/or channels**, they could benefit from centralizing responsibility for them and collecting channel data (usage) to evaluate behaviours

Front Office channel strategies, LAC, 2022

FIGURE 12 PRESENCE OF A SERVICE AND/OR CHANNEL STRATEGY WITHIN LAC PESS

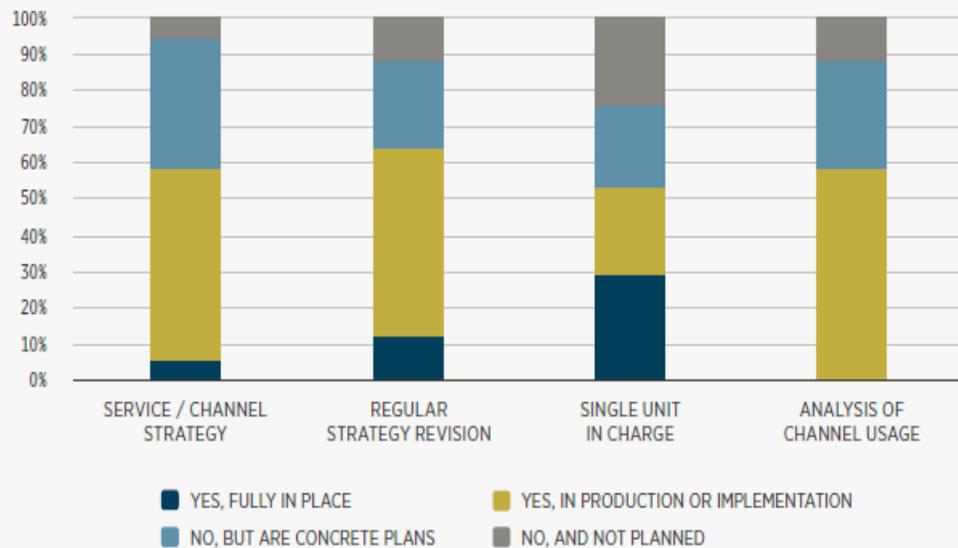
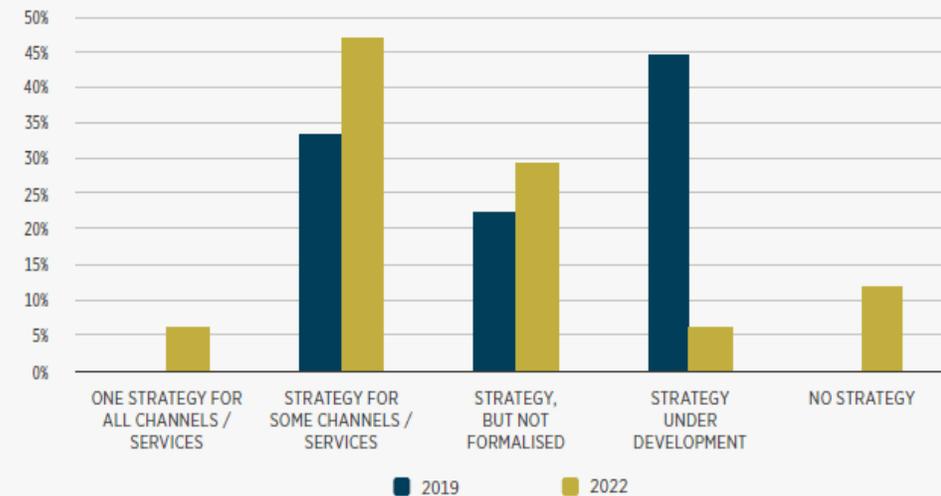


FIGURE 13 APPROACH TOWARD SERVICE CHANNELS WITHIN LAC PESS IN 2019 & 2022



▶ Which channels to use?

PES channel landscape is evolving

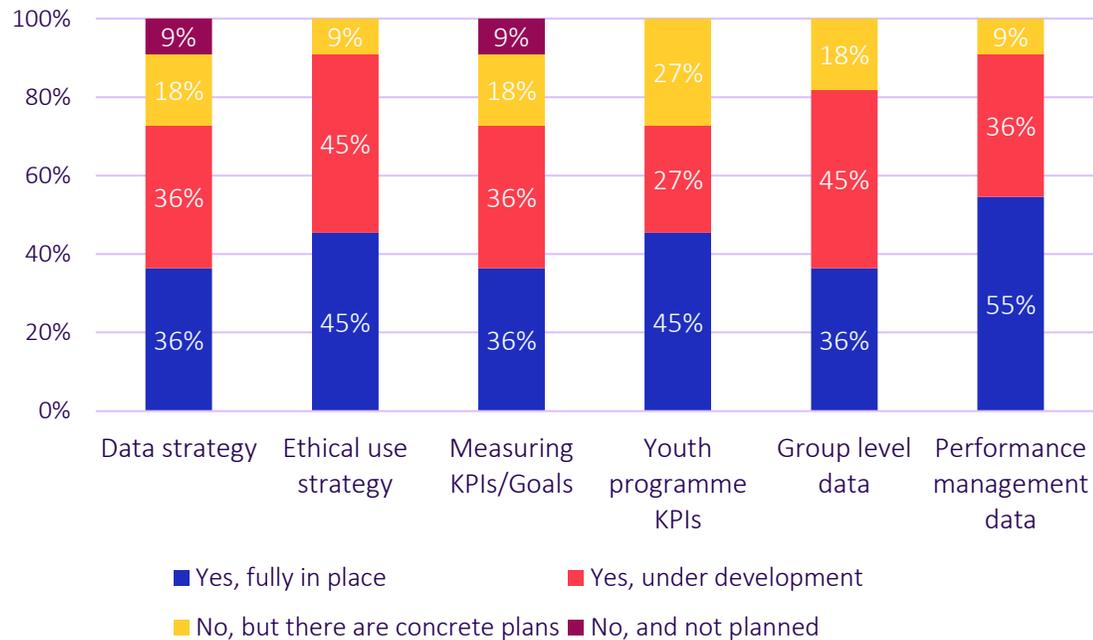
- ▶ PES websites vary from simple information provision-oriented applications towards full-blown portals that include the option to perform transactions, e.g. India's National Career Service portal.
- ▶ Newer channels: to serve new clients and/or improve the effectiveness and/or efficiency of service delivery.
- ▶ Social media in China: WeChat for several parts of the PES process, such as customer service, counselling, and labour mediation
- ▶ Social robot in Australia: 'Digital Assistant' on its website using artificial intelligence

Decisions about which channels to deploy, for which types of services, for what client groups (e.g. youth) and in which situations

- ▶ Significant costs involved with the deployment of each channel. PES need to consider the cost-effectiveness of developing new channels and/or maintaining existing channels.
- ▶ The creation of evidence-based business cases that prove the value of the new channels, e.g. by studying the adoption of channels by market segment and demand for new channels by conducting surveys.
- ▶ The regular evaluation of the success of existing channels by reviewing channel usage and evaluation by PES clients.

▶ Role of digital technologies | Data

Role of data and measurement within PES

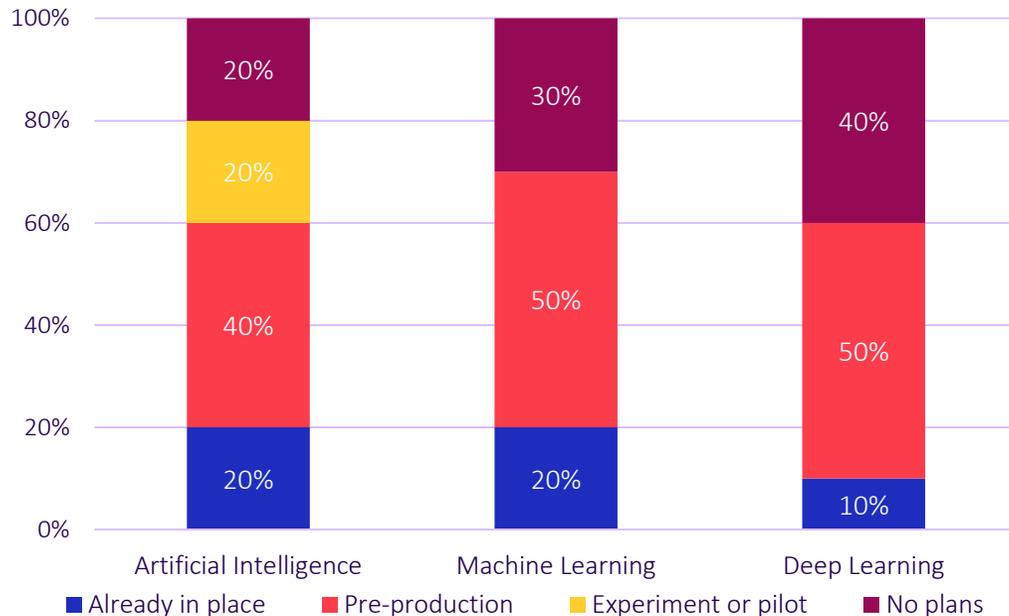


Data is becoming the core resource processed by PES, including as a means to measure performance and drive innovation

- ▶ Only a minority of PES in this study have an integrated and cohesive data strategy in place
- ▶ Same applies to most elements concerning data, such as having an ethical use-of-data strategy, measuring the progress towards goals using Key Performance Indicators (KPIs) and collecting data at group level and having specific youth KPIs.
- ▶ China, Japan, the Philippines and Singapore report having most elements of a comprehensive data strategy in place.

Advanced analytics

Role of advanced analytics within PES



Relevant areas in PES where advanced analytics are being applied currently:

- ▶ Fraud detection, prediction and prevention, for example whether benefit seekers are rightfully claiming unemployment benefits;
- ▶ Personalization of services, for example through segmentation and profiling approaches by PES and recommender systems
- ▶ Vacancy matching (by going beyond traditional variables, methods and models used for matching); and
- ▶ Better Labour Market Information (LMI) through improved prediction of labour market developments

Advanced analytics AP vs LAC

FIGURE 15 DEGREE TO WHICH LAC PESS HAVE A DATA AND MEASUREMENT STRATEGY IN PLACE

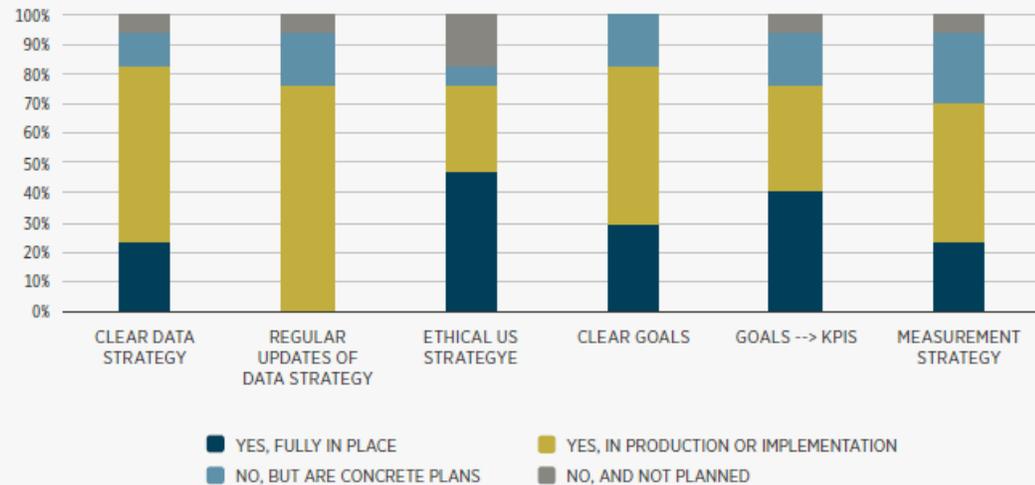
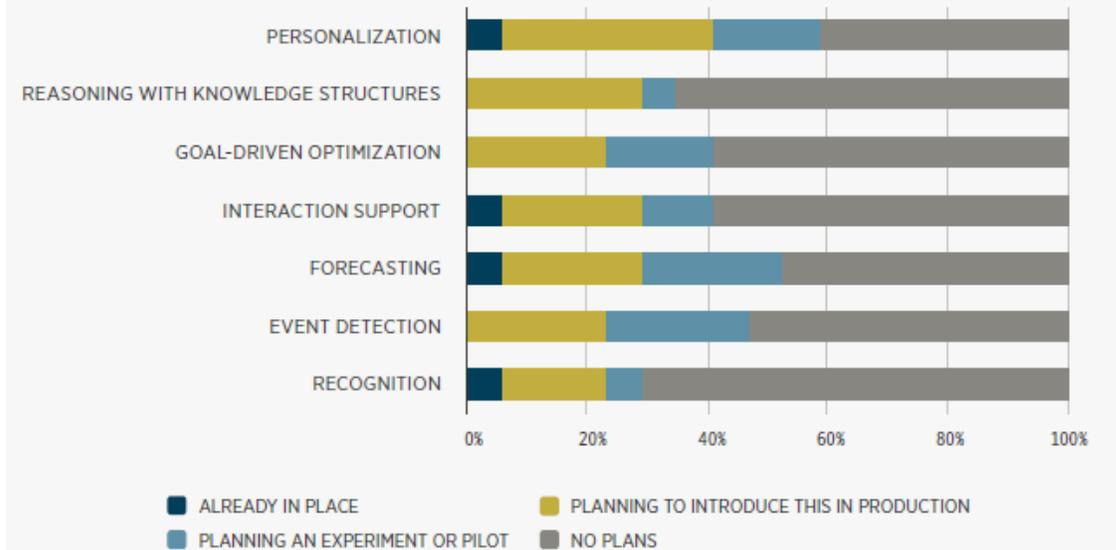
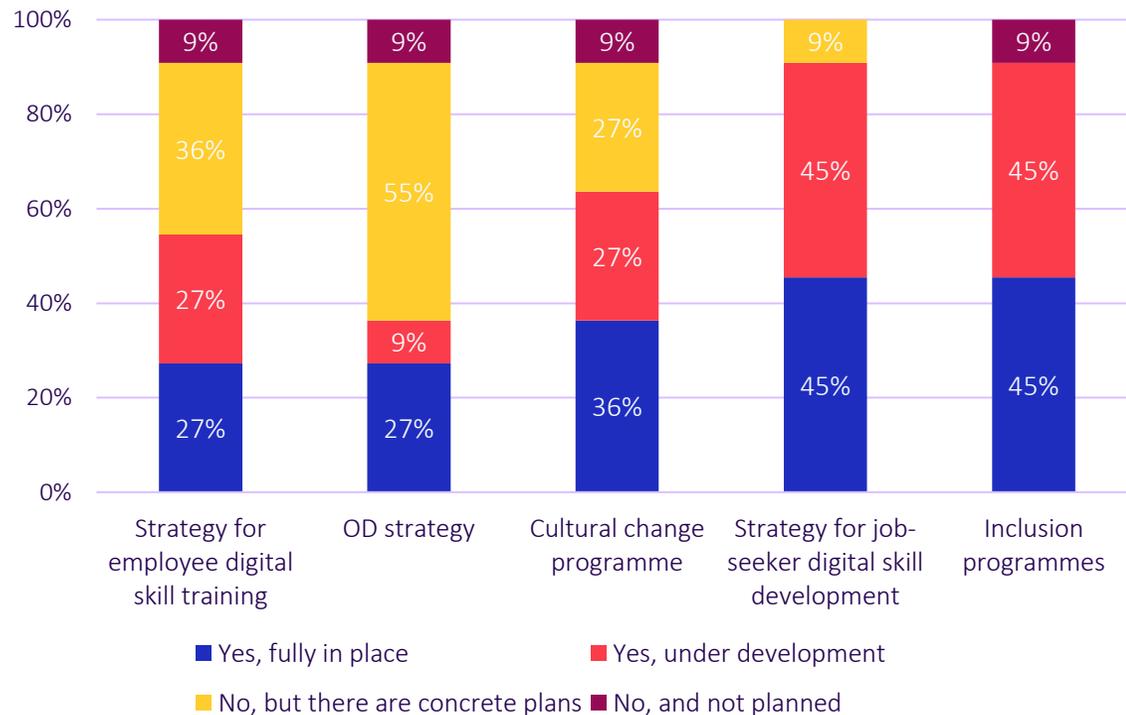


FIGURE 16 DEGREE TO WHICH LAC PESS HAVE AI APPLICATIONS IN PLACE



Innovation

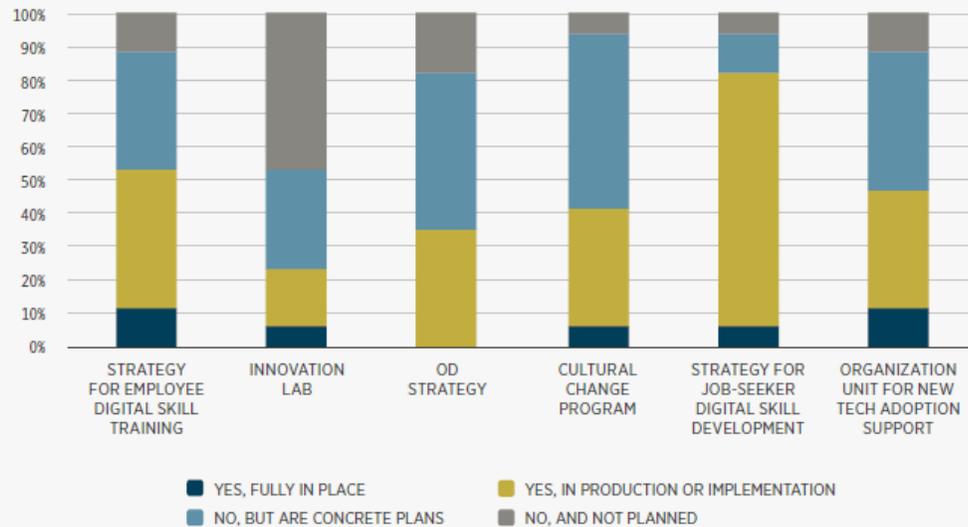
Role of the organization, its people and innovation within PES



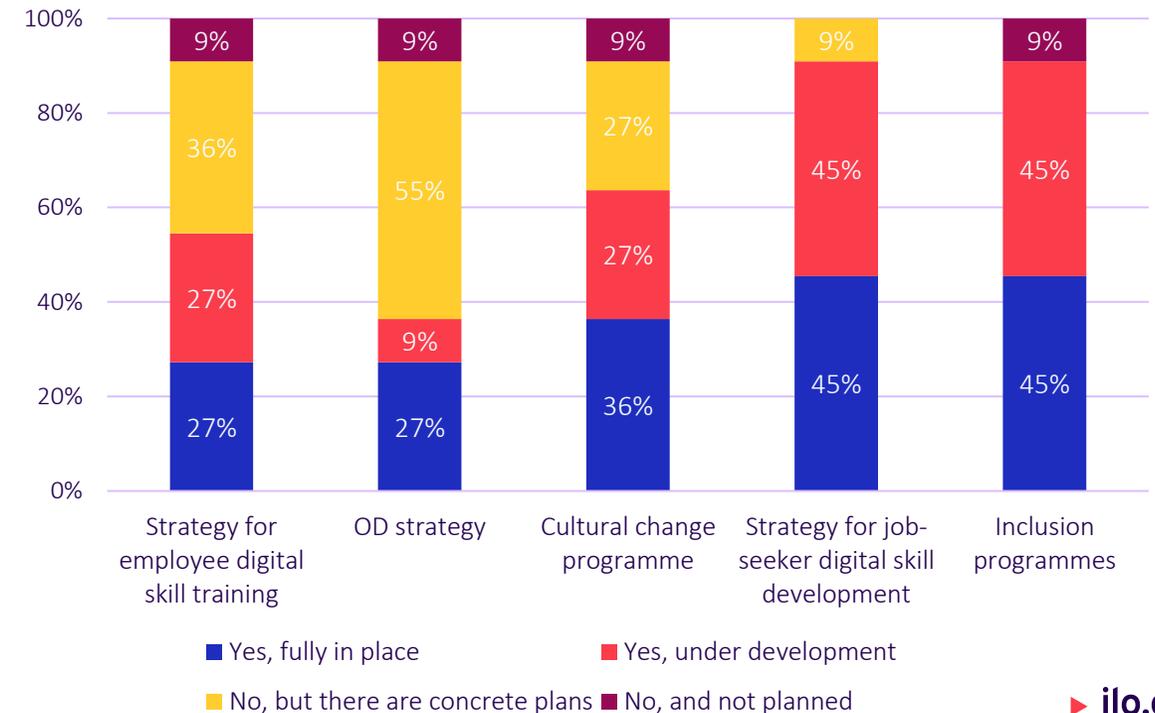
- ▶ Most PES in the region have no organizational development (OD) strategy, the Republic of Korea, China and India being notable exceptions.
- ▶ Similarly, the majority of PES do not focus on cultural change, digital skills development and inclusion.

Organization and Innovation, LAC vs AP

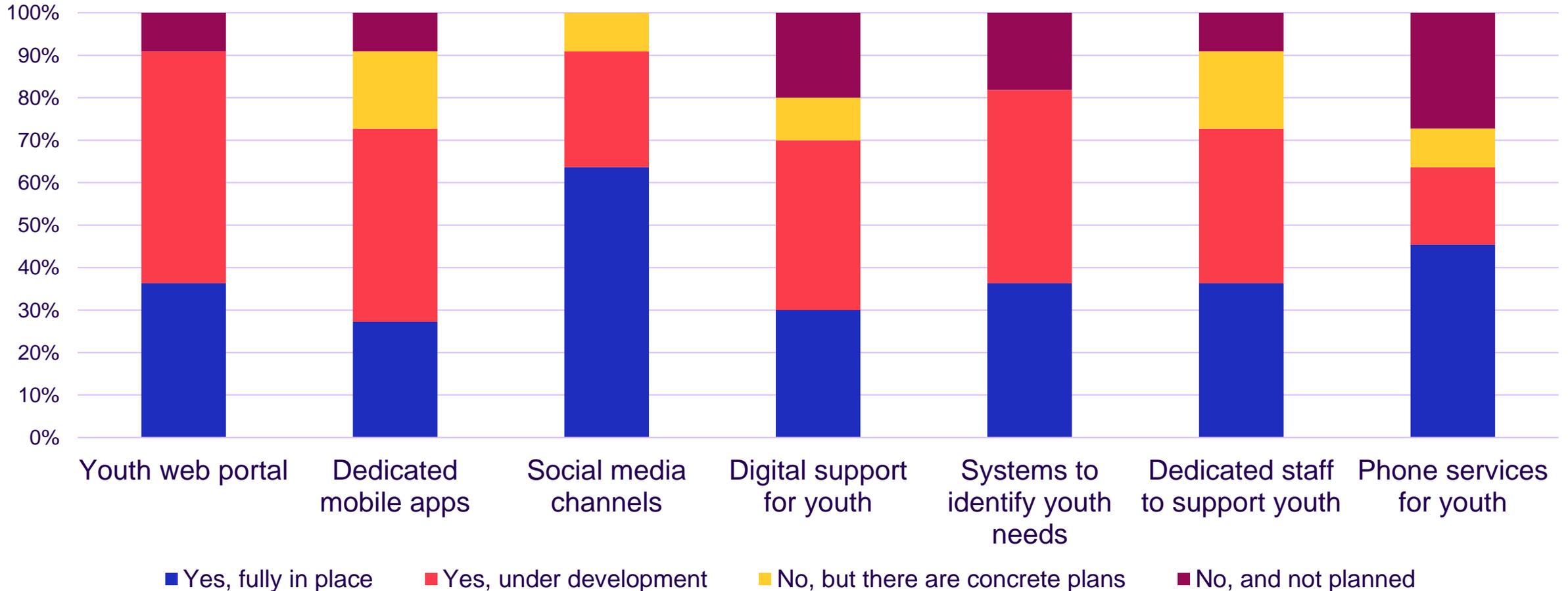
FIGURE 17 STRATEGIES PERTAINING TO ORGANIZATION AND INNOVATION IN LAC PESS



Role of the organization, its people and innovation within PES

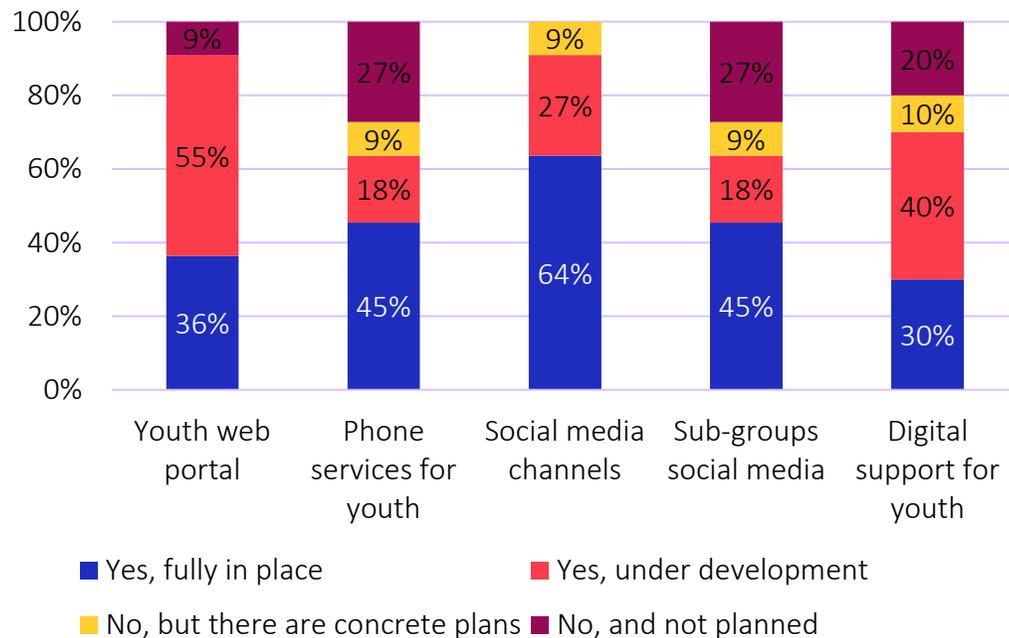


Technologies for youth



Youth front-office technologies

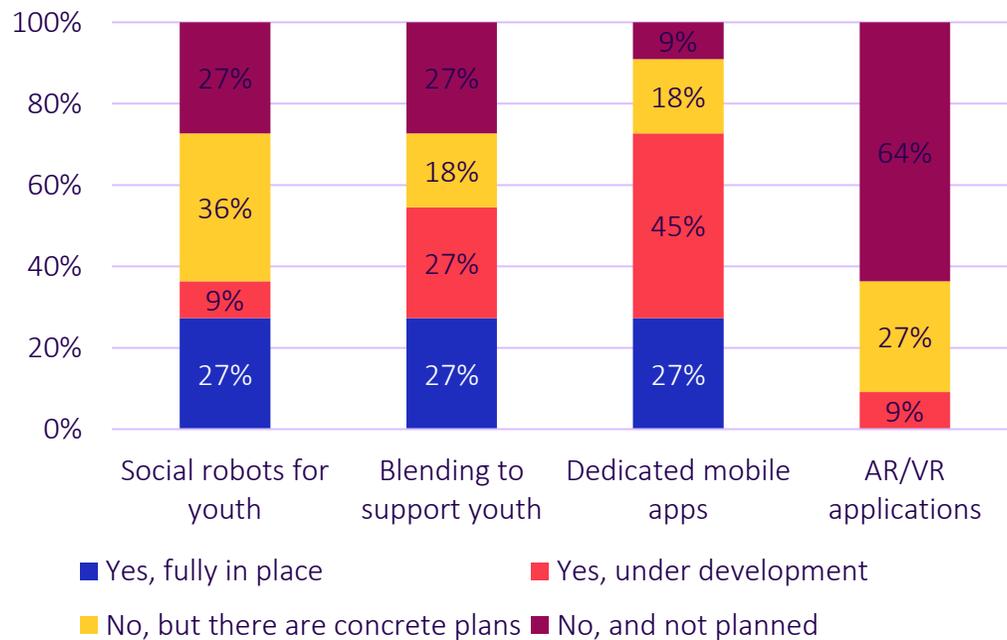
The use of common youth focused front-office technologies



- ▶ Social media most commonly used type of channel to reach young people: to send information to a wide audience, and as a tool to support jobseekers
- ▶ Fewer PES have dedicated social media channels to interact with youth subgroups or provide dedicated phone services to young people.
- ▶ Even fewer PES have a dedicated portal for youth and the ones that do typically provide dedicated youth services through their main portal

Innovative youth-focused front-office technologies

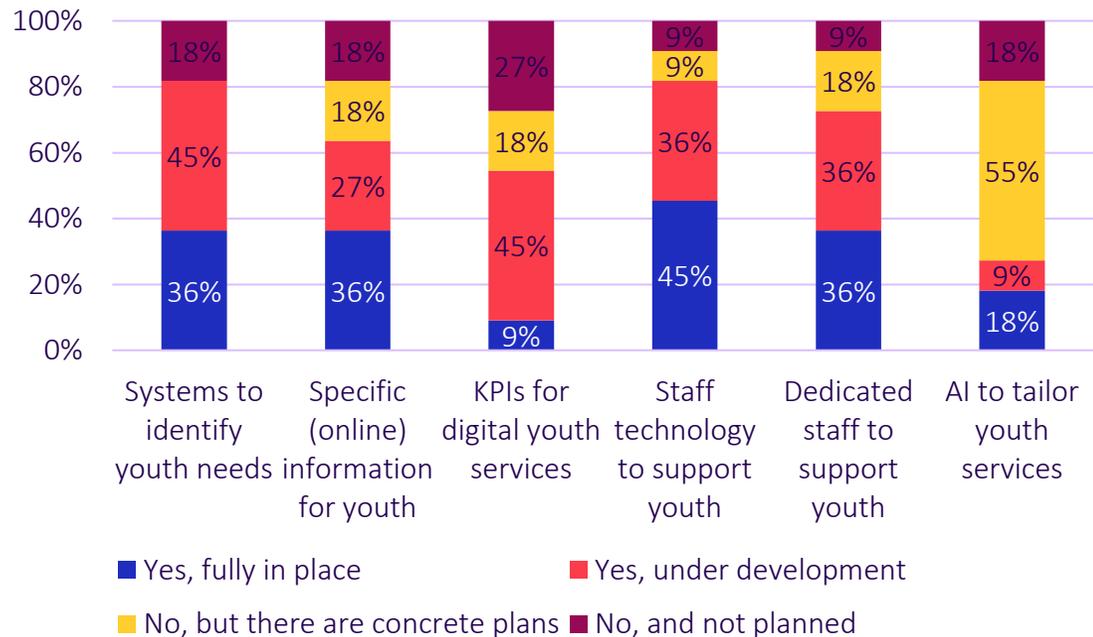
The use of innovative youth-focused front-office technologies



- ▶ Use of newer types of technologies such as social robots and having dedicated mobile apps to support youth is typically low
- ▶ Not many other PES have plans to deploy such channels

▶ Youth back-office technologies

The role of youth back-office and staff technologies



- ▶ Use of these technologies not yet very well advanced
- ▶ While nearly 45% of PES have technologies for staff to support young people, fewer PES have other elements in place.
- ▶ Only 36% have dedicated systems to identify youth needs and provide them with specific online information.

► **Conclusions and recommendations**

▶ Conclusions and recommendations - Status of PES' digital transformation

1. PES in the eleven countries in Asia and the Pacific – regardless of country-income level – **recognize the role of technology development** and express interest in more targeted approaches
2. PES have **digital strategies** that focus on digitalization of their processes. **Resources and low digital capacity and awareness of staff and organizations** constrain a full digital transformation
3. PES could benefit from increased attention to the **organizational aspects of digital transformation** such as breaking through silos and cultural change
4. PES recognize the **relevance of advanced analytics** (such as artificial intelligence), but could benefit from integrated approaches, a solid data foundation and measurement of progress towards smart goals to improve delivery

► Conclusions and recommendations - Youth policies and programmes to support and enable youth employment

5. **Inclusive approaches** are lacking and client approaches are too generic in the PES covered by this study. A focused approach on youth in PES processes and on subgroups is needed to improve inclusion.
6. PES are part of a complex system of organizations executing government policies, laws and regulations and organizations that provide labour market services. PES could benefit from **enhancing IT integration and partnerships with key stakeholders**

► Conclusions and recommendations - The role of technology in supporting youth labour markets

7. Youth are often targeted through the general social media, yet **dedicated youth channels**, where feasible, can offer possibilities for more effective service delivery
8. **Innovative technologies** for youth are rare, but might provide a stimulus for digital transformation
9. **Back-office technologies and processes** could benefit from an **increased youth focus**

- The focus of digital strategies in most cases is on the digitalization of processes and services and less on the *overall digital transformation* of their organization. Therefore, many obstacles result from organizational (and less technical) factors, such as resistance and siloing.
- The development of standards and documentation is lagging.
- Most LAC PESs have no cohesive service/channel strategies in place, and those under development do not focus on all channels and services.
- There is very little experience with the use of advanced analytics, such as machine learning and artificial intelligence.
- No PES has an organizational development strategy, and less than 10% have programs that focus on cultural change

- **Pieterse W. 2022. Technology in public employment services to promote youth employment in Asia and the Pacific. ILO: Bangkok**
- **ILO 2022. Technology adoption in public employment services: Catching up with the future**
- **Pieterse et al. 2023. The Digital Transformation of Public Employment Services across Latin America and the Caribbean, IDB**

▶ **Thank you**

mwasikakata@ilo.org