Innovation track@WSIS Forum

ITU EVENT

Accelerating Digital Transformation

Building Vibrant ICT Centric Innovation Ecosystems

Monday 19 March 2018
Room C1, ITU, Geneva

More information at innovation.itu.int

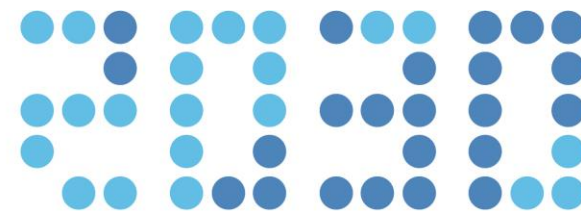ITU REGIONAL INITIATIVE FOR EUROPE ON ICT-CENTRIC INNOVATION ECOSYSTEMS

PORTUGAL
INCoDe.2030

Digital Transformation towards 2030 in Portugal

Digital competences and R&D as drivers for more and better jobs and wellbeing

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FCT Fundação para a Ciência e a Tecnologia

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Digital Transformation towards 2030 in Portugal

Programa Nacional de Reformas

(National Reform Programme)

- Qualification of the Portuguese population
- Promote innovation in the Portuguese economy
- Territorial enhancement
- Modernisation of the State
- Reduction of economy's indebtedness
- Strengthen social cohesion and equality

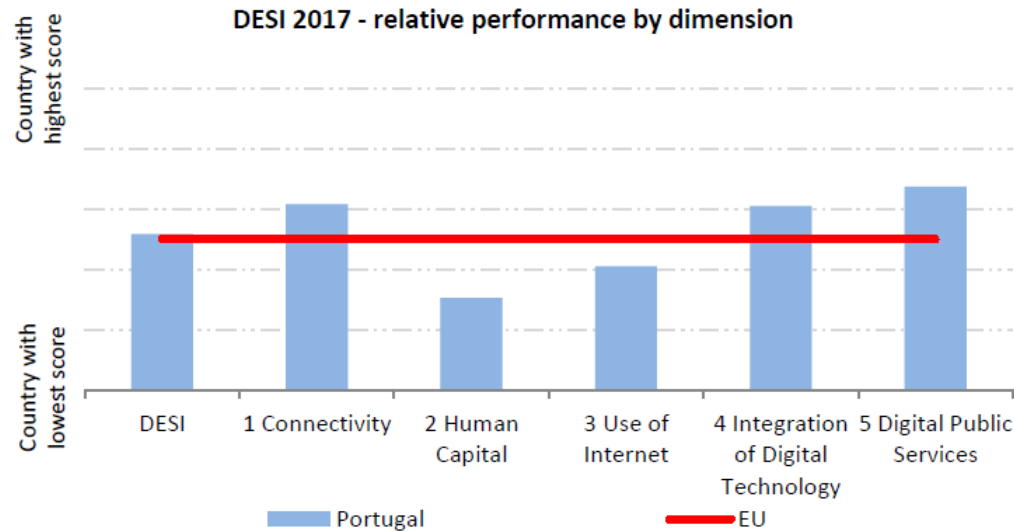StartUP Portugal

Start UP Visa

SIMPLEX+
Ainda mais simples

Pi PROGRAMA INTERFACE

i4.0 INDÚSTRIA 4.0

…

WSIS FORUM 2018

UKE | Office of Electronic Communications

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE

17 PARTNERSHIPS FOR THE GOALS

FCT Fundação para a Ciência e a Tecnologia

Digital Transformation towards 2030 in Portugal

… but a fully digital transformation implies citizens with digital competences:

digital competences are both essential for the exercise of full citizenship and to facilitate employability, by responding to the needs of an increasing digitalisation of the labour market

DESI 2017 - relative performance by dimension

2 Human Capital	Portugal					EU
	DESI 2017			DESI 2016		DESI 2017
	value		rank	value	rank	value
2a1 Internet Users	68%	↑	24	65%	23	79%
% individuals	2016			2015		2016
2a2 At Least Basic Digital Skills	48%	→	21	48%	21	56%
% individuals	2016			2015		2016
2b1 ICT Specialists[5]	2.3%	↓	22	2.5%	21	3.5%
% individuals	2015			2014		2015
2b2 STEM Graduates	20	↓	8	21	7	19
Per 1000 individuals (aged 20-29)	2014			2013		2014

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Digital Transformation towards 2030 in Portugal

- The **National Program for Support Training in Digital Skills in Higher Education** was set up in 2016 to promote digital skills in the active population, namely, by increasing the number of Higher Education trainers;

- The **National Initiative for Digital Competences e.2030 (Portugal INCoDe.2030)** was launched by the Portuguese Prime Minister, on the April 3rd 2017 (revised and strengthened in March 2018), to strengthen digital competences in the Portuguese population and intends to place Portugal at the top of the European countries in digital competences.

Portugal INCoDe.2030

Higher Education, Research and Innovation in Portugal

to fully achieve European convergence by 2030 and to boost knowledge and innovation, together with skilled job creation and wellbeing

- Achieve a level of **overall R&D investment of 3% by 2030**, with a relative share of 1/3 public and 2/3 business expenditure, corresponding to achieve an overall R&D investment of 1.8% of GDP by 2020 (while 1.3% in 2016);

- Achieve a level of **40% of tertiary education graduates in the 30-34 years old age group by 2020** (while only 35% in 2016), and **50% by 2030**, with **60% of those aged 20 participating in higher education by 2030**;

- **Achieve an European *leadership level of digital skills by 2030* in association with Internet access and usage, as well as market demand, business development and specialized skills development.**

Portugal INCoDe.2030

The Programme relies on the "**Digital Competences**" concept in a broader manner:

> *the ability to access digital media and ICTs, understand and critically assess contents, and communicate effectively (digital literacy), as well as the production of new knowledge through research, which involves processing information, and communicating, interacting with and producing digital content.*

it has three main goals:

- Promote **digital literacy for all**, to guarantee the full exercise of citizenship and inclusion in a society with increasingly dematerialized practices and in which many social interactions happen on the Internet and are increasingly mediated by electronic devices;

- Stimulate **employability and skills training and professional specialization** in digital technologies and applications, to respond to the growing market demand and to promote the qualification of employment in a higher value-added economy;

- Foster **new knowledge** in digital areas and ensure a strong participation in international R&D&I networks.

… and is structured in five axis:

1. **Inclusion**: To give access to digital technologies, to everyone, promoting competences to obtain information, communicate and interact ⟹ Short-Medium-Long terms

2. **Education**: To stimulate and reinforce digital literacy and competences in all study cycles and as part of lifelong learning ⟹ Medium-Long terms

3. **Qualification**: To professionally qualify the active population by providing it with the necessary knowledge to integrate into a labour market that depends heavily on digital skills ⟹ Short-Medium terms

4. **Specialisation**: To promote (advanced) specialisation in digital technologies and applications for job qualification and creation of higher added value in the economy ⟹ Medium Term

5. **Research**: To assure the conditions to develop new knowledge in emerging technologies; to actively participate in international R&D programmes and networks ⟹ Short-Medium-Long terms

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Portugal INCoDe.2030

Implementation through Flagship Projects:

- an integrated network of public communication services that facilitates access to the Internet by everyone (*axis 1*);

- a network of creative communities for digital inclusion (*axis 1*);

- qualification of teachers in ICT areas (*axis 2*);

- digital qualification and specialisation of active, employed and unemployed population, in the private sector, commerce, services, industry and agriculture, to leverage the digital transformation of enterprises (*axis 3*);

- qualification and digital specialisation in the Public Administration (*axis 3*);

- higher education in ICT both for continuing of studies and as lifelong learning (*axis 4*);

- usage of Data Science in Public Administration, in order to improve the decision-making and formulation of public policies (*axis 5*);

- a National Network for Advanced Computing (*axis 5*);

Portugal INCoDe.2030

Governance structure:

- **Government level**

  Presidency and Administrative Modernisation; Science, Technology and Higher Education; Education; Labour, Solidarity, and Social Security; Planning and Infrastructure; Economy

- **Permanent Forum for Digital Competences**

  Mobilisation of different stakeholders and stimulate its engagement with the Programme, including the organisation of an annual public conference, to discuss and assess in a comprehensive manner the accomplishment of the different goals and to discuss next steps;

- **Coordination team**

  The Coordination team comprises a global coordinator and coordinators for each axis in order to implement the planned activities;

- **Technical Secretariat**

  Supports the Coordination team

- **Digital Competences Observatory**

  Follow-up and report (through indicators)

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Portugal INCoDe.2030

- **The annual assessment is made by a panel of independent experts**

- **With detailed 2020, 2025 and 2030 goals**
  (http://data.dre.pt/eli/resolconsmin/26/2018/03/08/p/dre/pt/html)

Portugal INCoDe.2030

Know more:

Web Site

http://www.incode2030.gov.pt/

Facebook

https://www.facebook.com/incode2030/

Twitter

https://twitter.com/incode2030

Instagram

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E-mail

incode2030[at]fct.pt

PRACTICE

National Initiative for Digital Competences e.2030, Portugal INCoDe.2030 (*Programa «Iniciativa Nacional Competências Digitais e.2030»*)

The National Initiative for Digital Competences e.2030 (Portugal INCoDe.2030) is a programme aiming to strengthen digital competences in the Portuguese population and to place Portugal at the top of the European countries in digital competences.

• Name / Organization • Country • Tagline, 1-3 sentence description

TYPE

Guiding Innovation Dynamics	Building Innovation Capacity	ICT Integration into Key Sectors
X	X	X

Indicate main focus area / type

GOVERNANCE

- **Government level** (*Presidency and Administrative Modernisation; Science, Technology and Higher Education; Education; Labour, Solidarity, and Social Security; Planning and Infrastructure; Economy*)

- **Permanent Forum for Digital Competences**

- **Coordination team**

- **Technical Secretariat**

- **Digital Competences Observatory**

• Organiz. structure • Management & Institutional framework • Competencies

RESOURCES

- The INCoDe.2030 Programme is financially supported by the Programme "Portugal 2020" (2014 Partnership Agreement between Portugal and the European Commission)

- The governance structure is supported by FCT (logistic, technical, administrative and financial support)

• Financial • Non-financial • Sources • Partners

KEY ACTIVITIES

- Activities are being developed by different governmental bodies through Flagship Projects and broad participation platforms, including private sector stakeholders, and are structured in five main axis:

- **Inclusion**: To give access to digital technologies, to everyone, promoting competences to obtain information, communicate and interact

- **Education**: To stimulate and reinforce digital literacy and competences in all study cycles and as part of lifelong learning

- **Qualification**: To professionally qualify the active population by providing it with the necessary knowledge to integrate into a labour market that depends heavily on digital skills

- **Specialisation**: To promote (advanced) specialisation in digital technologies and applications for job qualification and creation of higher added value in the economy

- **Research**: To assure the conditions to develop new knowledge in emerging technologies; to actively participate in international R&D programmes and networks

• Mechanisms • Processes • Activities • Events

GOALS

- The main goals of this Programme are to continue to broaden and improve digital competences and enhance the capacity to better explore the social and economic potential of emerging digital markets, and to place Portugal at the top of the European countries in digital competences.

- Specific goals for Broadband Access, Human Capital, Use of Internet and R&D Investment (2020, 2025 and 2030) are available at http://data.dre.pt/eli/resolconsmin/26/2018/03/08/p/dre/pt/html

• Objective • Target stakeholders • Desired outcome for ecosystem

ACHIEVEMENTS

- The annual assessment will be made by a panel of independent experts

• Results • Evidence of impact • Scalability • Replicability