COUNTRY PROFILE  SWEDEN

IMD World Competitiveness Yearbook 2020, Talent & Digital 2019: summaries
WORLD COMPETITIVENESS RANKING 2020

All data are available from the World Competitiveness Online.

Visit our eShop
SWEDEN

OVERALL PERFORMANCE (63 countries)

<table>
<thead>
<tr>
<th>Capital</th>
<th>Stockholm</th>
</tr>
</thead>
<tbody>
<tr>
<td>Land area</td>
<td>447 2019</td>
</tr>
<tr>
<td>Exchange Rate</td>
<td>9.458 2019</td>
</tr>
<tr>
<td>Population</td>
<td>10.32 2019</td>
</tr>
<tr>
<td>GDP</td>
<td>531.4 2019</td>
</tr>
<tr>
<td>GDP (PPP)</td>
<td>54,715 2019</td>
</tr>
<tr>
<td>Real GDP growth</td>
<td>1.2 2019</td>
</tr>
<tr>
<td>Consumer price inflation</td>
<td>1.70 2019</td>
</tr>
<tr>
<td>Unemployment rate</td>
<td>6.77 2019</td>
</tr>
<tr>
<td>Labor force</td>
<td>5.51 2019</td>
</tr>
<tr>
<td>Current account balance</td>
<td>3.91 2019</td>
</tr>
<tr>
<td>Direct investment stocks inward</td>
<td>322.4 2018</td>
</tr>
<tr>
<td>Direct investment flows inward</td>
<td>4.55 2019</td>
</tr>
</tbody>
</table>

COMPETITIVENESS LANDSCAPE

PEER GROUPS RANKINGS

EUROPE - MIDDLE EAST - AFRICA (40 countries)

<table>
<thead>
<tr>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>6</td>
<td>6</td>
<td>6</td>
<td>4</td>
</tr>
</tbody>
</table>

POPULATIONS < 20 MILLION (34 countries)

<table>
<thead>
<tr>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>4</td>
<td>8</td>
<td>8</td>
<td>8</td>
<td>6</td>
</tr>
</tbody>
</table>
COMPETITIVENESS EVOLUTION

The criteria below highlight the 15 biggest Improvements and the 15 biggest Declines in the overall performance of the economy. They are determined by the largest percentage changes in the value of each criterion from one yearbook to the next.

**IMPROVEMENTS**

<table>
<thead>
<tr>
<th>IMPROVEMENTS</th>
<th>WCY 2019</th>
<th>WCY 2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.2.02 Current account balance</td>
<td>1.95</td>
<td>3.91</td>
</tr>
<tr>
<td>3.2.14 Labor force long-term growth</td>
<td>0.33</td>
<td>0.60</td>
</tr>
<tr>
<td>1.4.08 Long-term unemployment</td>
<td>1.20</td>
<td>0.90</td>
</tr>
<tr>
<td>3.3.10 Stock market capitalization (%)</td>
<td>124.07</td>
<td>153.80</td>
</tr>
<tr>
<td>4.3.18 Number of patents in force</td>
<td>1,091.8</td>
<td>1,337.0</td>
</tr>
<tr>
<td>1.5.01 Consumer price inflation</td>
<td>2.04</td>
<td>1.70</td>
</tr>
<tr>
<td>4.2.18 Cyber security</td>
<td>5.81</td>
<td>6.70</td>
</tr>
<tr>
<td>2.4.03 Public sector contracts</td>
<td>7.45</td>
<td>8.49</td>
</tr>
<tr>
<td>4.3.22 Knowledge transfer</td>
<td>6.65</td>
<td>7.52</td>
</tr>
<tr>
<td>4.4.27 Environmental laws</td>
<td>7.34</td>
<td>8.21</td>
</tr>
<tr>
<td>4.2.12 Public-private partnerships</td>
<td>6.53</td>
<td>7.17</td>
</tr>
<tr>
<td>4.2.10 Digital/Technological skills</td>
<td>8.03</td>
<td>8.75</td>
</tr>
<tr>
<td>3.2.18 Skilled labor</td>
<td>6.08</td>
<td>6.62</td>
</tr>
<tr>
<td>2.4.08 Subsidies</td>
<td>6.81</td>
<td>7.39</td>
</tr>
<tr>
<td>3.4.05 Corporate boards</td>
<td>6.46</td>
<td>7.01</td>
</tr>
</tbody>
</table>

**DECLINES**

<table>
<thead>
<tr>
<th>DECLINES</th>
<th>WCY 2019</th>
<th>WCY 2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.3.08 Exchange rate stability</td>
<td>0.034</td>
<td>0.102</td>
</tr>
<tr>
<td>1.1.18 Gross fixed capital formation - real growth</td>
<td>3.29</td>
<td>-0.63</td>
</tr>
<tr>
<td>1.1.15 Real GDP growth per capita</td>
<td>1.24</td>
<td>0.33</td>
</tr>
<tr>
<td>1.1.14 Real GDP growth</td>
<td>2.3</td>
<td>1.2</td>
</tr>
<tr>
<td>2.1.02 Government budget surplus/deficit (%)</td>
<td>0.90</td>
<td>0.49</td>
</tr>
<tr>
<td>1.4.04 Employment - long-term growth</td>
<td>2.08</td>
<td>1.25</td>
</tr>
<tr>
<td>2.4.15 Start-up procedures</td>
<td>3.0</td>
<td>4.0</td>
</tr>
<tr>
<td>4.1.07 Population - growth</td>
<td>1.09</td>
<td>0.90</td>
</tr>
<tr>
<td>2.4.12 New business density</td>
<td>8.1</td>
<td>7.2</td>
</tr>
<tr>
<td>2.3.07 Foreign currency reserves per capita</td>
<td>5,921</td>
<td>5,376</td>
</tr>
<tr>
<td>2.4.18 Immigration laws</td>
<td>6.57</td>
<td>6.08</td>
</tr>
<tr>
<td>2.4.14 Start-up days</td>
<td>7.0</td>
<td>7.5</td>
</tr>
<tr>
<td>1.4.07 Unemployment rate</td>
<td>6.35</td>
<td>6.77</td>
</tr>
<tr>
<td>2.5.02 Homicide</td>
<td>1.08</td>
<td>1.14</td>
</tr>
<tr>
<td>3.2.09 Apprenticeships</td>
<td>5.00</td>
<td>4.73</td>
</tr>
</tbody>
</table>

KEY ATTRACTIVENESS INDICATORS

From a list of 15 indicators, respondents of the Executive Opinion Survey were asked to select 5 that they perceived as the key attractiveness factors of their economy. The chart shows the percentage of responses per indicator from the highest number of responses to the lowest.
WORLD COMPETITIVENESS
DIGITAL RANKING 2019

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OVERALL PERFORMANCE (63 countries)

The direction of the triangle indicates the performance change from the last year:
△ improved or stable
down declined

OVERALL & FACTORS - 5 years

<table>
<thead>
<tr>
<th>2015</th>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>OVERALL</td>
<td>5</td>
<td>3</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Knowledge</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>7</td>
</tr>
<tr>
<td>Technology</td>
<td>9</td>
<td>4</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>Future readiness</td>
<td>9</td>
<td>8</td>
<td>5</td>
<td>5</td>
</tr>
</tbody>
</table>

COMPETITIVENESS & DIGITAL RANKINGS

N.B. This graph provides only a comparison of the country’s performance in the two rankings.

PEER GROUPS RANKINGS

EUROPE - MIDDLE EAST - AFRICA (40 countries)

POPULATIONS < 20 MILLION (34 countries)

N.B. This graph provides only a comparison of the country’s performance in the two rankings.
FACTORS BREAKDOWN - STRENGTHS AND WEAKNESSES

SWEDEN

KNOWLEDGE

Subfactors 2015 2016 2017 2018 2019
Talent 12 14 11 10 8
Training & education 2 1 1 5 2
Scientific concentration 5 5 5 3 3

Talent Rank Educational assessment PISA - Math 22
International experience 5
Foreign highly-skilled personnel 21
Management of cities 14
Digital/Technological skills 10
Net flow of international students 24

Training & education Rank Employee training 10
Total public expenditure on education 5
Higher education achievement 21
Pupil-teacher ratio (tertiary education) 20
Graduates in Sciences 17
Women with degrees 14

Scientific concentration Rank Total expenditure on R&D (%) 4
Total R&D personnel per capita 10
Female researchers 34
R&D productivity by publication 41
Scientific and technical employment 4
High-tech patent grants 8
Robots in Education and R&D 22

TECHNOLOGY

Subfactors 2015 2016 2017 2018 2019
Regulatory framework 5 3 4 12 5
Capital 14 11 13 10 4
Technological framework 5 5 7 7 12

Regulatory framework Rank Starting a business 9
Enforcing contracts 31
Immigration laws 14
Development and application of technology 4
Scientific research legislation 10
Intellectual property rights 7

Capital Rank IT & media stock market capitalization 12
Funding for technological development 7
Banking and financial services 8
Country credit rating 1
Venture capital 6
Investment in Telecommunications 34

Technological framework Rank Communications technology 8
Mobile Broadband subscribers 32
Wireless broadband 13
Internet users 7
Internet bandwidth speed 5
High-tech exports (%) 25

FUTURE READINESS

Subfactors 2015 2016 2017 2018 2019
Adaptive attitudes 11 10 7 9 8
Business agility 13 10 13 10 13
IT integration 12 11 4 11 12

Adaptive attitudes Rank E-Participation 19
Internet retailing 15
Tablet possession 6
Smartphone possession 5
Attitudes toward globalization 4

Business agility Rank Opportunities and threats 12
World robots distribution 17
Agility of companies 12
Use of big data and analytics 7
Knowledge transfer 14

IT integration Rank E-Government 5
Public-private partnerships 22
Cyber security 36
Software piracy 6
WORLD TALENT RANKING 2019

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OVERALL PERFORMANCE (63 countries)

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Investment & Development

- Total public expenditure on education Percentage of GDP 68.8 % 5
- Gov. expenditure on education per student Percentage of GDP per capita (secondary education) 23.8 % 14
- Total public exp. on education per student Spending per enrolled pupil/student, all levels 12,709 US$ 9
- Pupil-teacher ratio (primary education) Ratio of students to teaching staff 12.83 ratio 19
- Pupil-teacher ratio (secondary education) Ratio of students to teaching staff 12.98 ratio 39
- Apprenticeships are sufficiently implemented 5.00 Survey [0..10] 30
- Employee training is a high priority in companies 6.92 Survey [0..10] 10
- Female labor force Percentage of total labor force 47.56 % 14
- Health infrastructure meets the needs of society 6.92 Survey [0..10] 23

Appeal

- Cost-of-living index Index of a basket of goods & services in the main city, including housing (New York City = 100) 76.90 index 27
- Attracting and retaining talents is a priority in companies 8.00 Survey [0..10] 5
- Worker motivation in companies is high 7.30 Survey [0..10] 8
- Brain drain (well-educated and skilled people) does not hinder competitiveness in your economy 6.89 Survey [0..10] 7
- Quality of life is high 9.14 Survey [0..10] 8
- Foreign highly-skilled personnel are attracted to your country’s business environment 5.97 Survey [0..10] 21
- Remuneration in services professions Gross annual income including supplements such as bonuses, US$ 51,960 US$ 7
- Remuneration of management Total base salary plus bonuses and long-term incentives, US$ 224,486 US$ 17
- Effective personal income tax rate Percentage of an income equal to GDP per capita 24.35 % 51
- Justice is fairly administered 8.76 Survey [0..10] 4
- Exposure to particle pollution Mean population exposure to PM2.5, Micrograms per cubic metre 6.11 micrograms 3

Readiness

- Labor force growth Percentage change 1.41 % 22
- Skilled labor is readily available 6.08 Survey [0..10] 23
- Finance skills are readily available 7.38 Survey [0..10] 11
- International experience of senior managers is generally significant 7.47 Survey [0..10] 5
- Competent senior managers are readily available 6.65 Survey [0..10] 11
- Primary and secondary education meets the needs of a competitive economy 7.34 Survey [0..10] 17
- Graduates in Sciences % of graduates in ICT, Engineering, Math & Natural Sciences 26.62 % 17
- University education meets the needs of a competitive economy 8.11 Survey [0..10] 6
- Management education meets the needs of the business community 7.49 Survey [0..10] 11
- Language skills are meeting the needs of enterprises 8.57 Survey [0..10] 8
- Student mobility inbound Foreign tertiary-level students per 1000 inhabitants 2.84 number 29
- Educational assessment - PISA PISA survey of 15-year olds 494 Average 25
About the Institute for Management Development (IMD)

IMD is an independent academic institution with Swiss roots and global reach, founded almost 75 years ago by business leaders for business leaders. Since its creation, IMD has been a pioneering force in developing leaders who transform organizations and contribute to society.

Based in Lausanne (Switzerland) and Singapore, IMD has been ranked in the Top 3 of the FT’s annual Executive Education Global Ranking for the last nine consecutive years and in the top five for 17 consecutive years. Our MBA and EMBA programs have repeatedly been singled out among the best in Europe and the world.

We believe that this consistency at the forefront of our industry is grounded in IMD’s unique approach to creating “Real Learning. Real Impact”. Led by an expert and diverse faculty, we strive to be the trusted learning partner of choice for ambitious individuals and organizations worldwide. Challenging what is and inspiring what could be.

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