Talent Solutions
ManpowerGroup®

TOTAL WORKFORCE INDEX™

Powered by ManpowerGroup Global Insights

Introduction

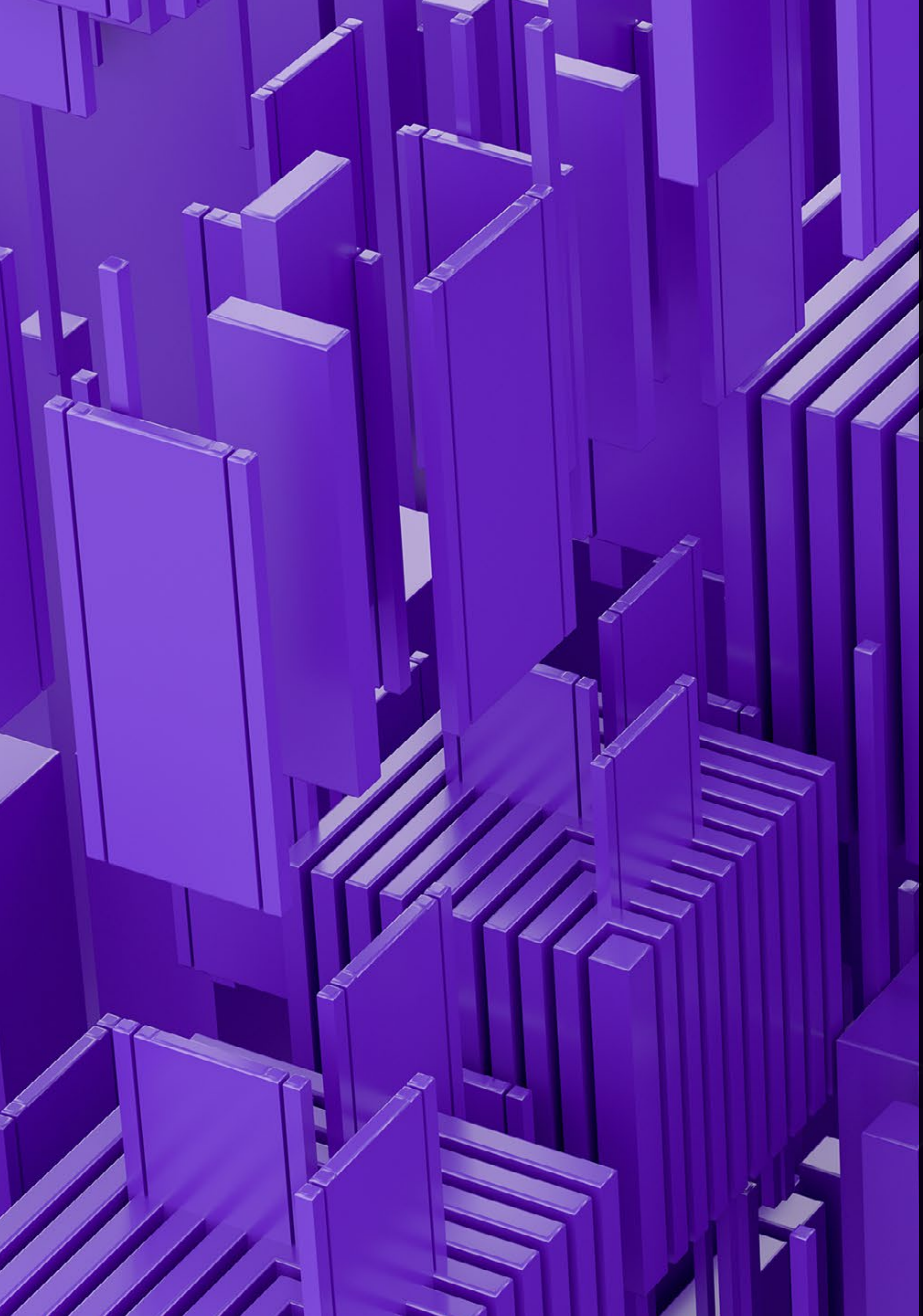
Cost and ease of doing business once drove workforce planning. While still important, risk now significantly shapes decision-making. Employers are focused on demographic risks, technological impacts, geopolitical threats and economic concerns in their workforce investments.

Technological disruption has transformed business models, pushing companies to adapt quickly. Automation, AI, and digital transformation are reshaping industries, demanding a flexible and forward-thinking approach to workforce planning. Organizations must now consider talent costs, availability, and their capacity to integrate new technologies seamlessly.

Climate change and ESG are crucial for business regulation and reputation. The demand for green talent — professionals who drive sustainability and support a low-carbon economy — is growing, but supply is lagging. This underscores the need for strategic workforce planning.

The Total Workforce Index™ (TWI) helps organizations navigate these challenges. Now in its 11th year, the TWI is adapted in real time to meet our clients' changing needs. It is the first and most comprehensive data source of its kind to help companies better understand the macro-trends shaping the world of work and their ability to access talent.

As companies look to plan workforces for the long term, many are turning to the Total Workforce Index™— a go-to predictive resource to inform critical business decision-making. With an ever-changing view of real markets in real time, the TWI enables organizations to stay ahead of the curve in a constantly changing world.



What is the Total Workforce Index™ ?

The Total Workforce Index™ scores each market on more than 200 unique factors. Each of these statistical factors is carefully weighted and grouped under one of four categories:

Availability

Cost Efficiency

Regulation

Productivity

The markets that rank highest in the TWI are those with the highest relative performance across all four categories. Markets that perform well have successfully responded to trends, such as remote workforce readiness, building technology infrastructure and closing skills gaps. They have demonstrated market and geopolitical stability, have relatively high gender participation and are skilling emerging workforces to meet changing demographic realities. High-ranking markets also exhibit favorable regulatory environments.

How Companies Use the Total Workforce Index™

ManpowerGroup Talent Solutions uses customized versions of the Total Workforce Index™ to inform client decision-making across industries and global markets. Location decisions are a common use case, as are evaluations of emerging skills, career paths, anticipation of future talent pools, migration and opportunities to optimize workforce mix, among other areas.

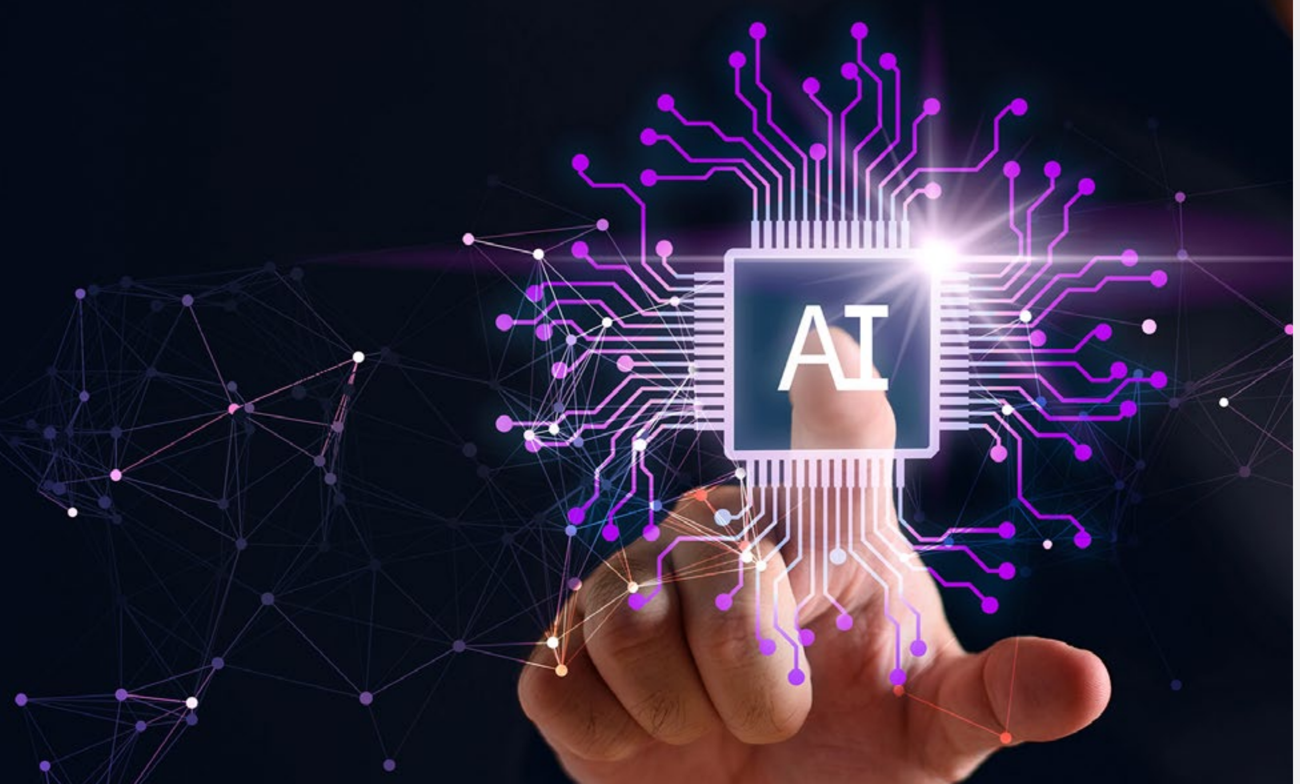
Cross-referencing demographics and gender participation with skills availability can inform DEI strategies. Analyzing up-to-date information on the current and future supply of talent can provide an edge in capacity planning. Understanding how regulation and demand impact cost helps employers identify opportunities to manage budgets. And, because the TWI is adjusted annually to capture evolving needs, employers can get an early look at hot spots for emerging demands, such as AI and green skills.

We also consider the unique challenges faced by employers in specific industries. For example:

- In an environment where every industry is competing for the same talent, IT employers can identify markets with high innovation readiness, diversity, and a sustainable supply of tech talent to support digital transformation initiatives.
- Employers in the banking and financial services industry turn to the TWI to optimize global operations and investment strategies by analyzing regulatory stability and financial risks to inform decision-making.
- Finding cost-efficient and skilled workforces that support IT-dependent advanced manufacturing is a unique challenge, especially when sustainable practices and green economy initiatives are factored in.

Key Themes and Takeaways from the Total Workforce Index™

The Total Workforce Index™ is designed to help clients manage change as it happens. Results from this year's TWI highlight established and emerging priorities that will significantly impact labor markets in the years to come.



Technological Disruption:
Automation, Gen AI, and digital transformation are reshaping industries and markets that fail to invest in innovation and technology infrastructure, and tend to underperform in the TWI. As companies seek to adopt agile, forward-thinking workforce planning to keep pace with the latest advancements, the TWI illuminates strategies to support talent attraction, upskilling and integration of new tools in markets across the globe.

Ongoing Economic and Geopolitical Risks:
Factors such as inflation, tax burden, wage pressure, currency volatility and political instability are significantly influencing workforce investments as organizations develop strategies to mitigate risk, reduce costs, and invest in sustainable workforces and environments. This includes adjusting location strategies and managing financial risks to maintain operational stability.

A Persistent Talent Shortage:
The TWI's measures of workforce availability and access to sustainable talent pools reinforce the impact of ongoing talent shortages on employer decision-making. The Total Workforce Index™ helps companies to better understand and respond to talent availability challenges and skill shortages, ensuring a steady pipeline of skilled workers through targeted recruitment, development and retention efforts.

Evolving Workforce Metrics:
The sizable impact of new metrics for AI readiness and sustainable futures highlights the need for flexible strategies that adapt to meet new needs. Companies can use real-time TWI data to align their talent strategies with refreshed metrics to stay competitive — in this case, focusing on skills development in AI and sustainability to meet future demands.

By leveraging the Total Workforce Index™, organizations can strategically address these issues to stay competitive and resilient, whatever the future may bring.

What is New in 2024?

The Total Workforce Index™ is a dynamic tool, and we regularly make changes to address employers' shifting needs. This includes providing insights that help companies navigate the complexities of an increasingly digital and green economy. For example, we have incorporated measures of countries' AI readiness and their capacity for a sustainable, low-carbon future.

Economic, geopolitical and climate-related risks have significantly impacted business operations and workforce planning in recent years. Accordingly, these risks have driven many of the changes to this year's Total Workforce Index™. Conflict in the Middle East and unrest in other regions continue to influence workforce strategy and decision-making. Factors related to peace and resilience were already included in the TWI, and a measure of the potential for political violence has been added in 2024. U.S. government travel advisories are another factor that have been added to account for geopolitical and environmental risks.

Economic slowdowns, rising inflation and currency volatility create financial risks for employers. Last year, we increased the weighting on inflation to address highly volatile inflation environments. In 2024, we added measures to account for the ease of moving funds in and out of a particular market. We also added risks to the business environment that address the risk of default, currency fluctuations and corruption risks.

The increased prevalence of drought, wildfires and flooding signals climate-related risks that could impact economies and businesses. We added new factors related to climate change — from sector decarbonization to ESG investment. This year's TWI also considers a market's ability to build a low-carbon future, including the availability of a green workforce.

We regularly examine ways to address a market's ability to support innovation. This includes technology infrastructure, innovation investment and remote readiness. In 2024, we also started to track markets' readiness for a sustainable future.

Age dependency — or the ratio of working-age to retirement-age individuals — is a serious concern for countries with declining labor force numbers. In past years, we increased the weighting of Gen Z and millennial populations to account for incoming working-age people. This year, we prioritized the median age — weighting younger populations more heavily because they represent more sustainable talent pools.

"Workforce planning and management are evolving rapidly. AI skill demand is outpacing acquisition, and economic realities like inflation and currency risk can alter location strategies quarterly.

In a highly competitive labor market, where information is crucial, the TWI provides employers with the insights needed to stay ahead — just as it has for more than a decade."

– Becky Frankiewicz
Chief Commercial Officer, ManpowerGroup and Talent Solutions Global Brand Leader

Top 10
Highest Ranking Markets

1 **United States**

2 **Singapore**

3 **Canada**

4 **Malaysia**

5 **Ireland**

6 **United Kingdom**

7 **United Arab Emirates**

8 **Switzerland**

9 **Australia**

10 **China**

The top three overall markets — the United States, Singapore and Canada, respectively — maintain their leading positions for the fourth consecutive year due to the availability of highly skilled workers, employment-friendly regulations, remote-ready infrastructures, innovation and technology investments, and overall political and economic stability. As with past years, these markets perform so well in the Availability, Regulation and Productivity categories that it offsets the fact they are mediocre performers on Cost. (The United States has the most favorable Cost rank of the three, at 22.)

Malaysia retains the No. 4 spot for the second consecutive year due to the market's strong performance on Cost (No. 2), Regulation (No. 10) and Productivity (No. 6).

Top 10 Highest Ranking Markets (continued)

Ireland and the United Kingdom each move up one spot to No. 5 and No. 6, respectively. Their rise is largely due to Israel's fall from the top 10 (from No. 5 in 2023 to No. 14 in 2024). The ongoing war between Israel and Hamas has negatively affected factors related to the country's risk, resilience and peace. Escalation and instability in the region have disrupted normal business operations, leading companies to temporarily cease or scale back their activities in Israel for safety reasons.

At No. 7, the United Arab Emirates continues its steady rise — from No. 22 in 2022 to No. 12 last year. The country's gains are due to high rates of tertiary education, remote readiness, ongoing innovation investments and overall stability.

Switzerland jumps two spots to No. 8 thanks to innovation, security and sustainability scores. Australia falls one spot to No. 9. While regulatory change had an incremental negative impact, the drop is due more to the fact that Switzerland's ranking increased, displacing Australia.

China enters the top 10 for the first time, following a steady ascent from No. 55 in 2020 to No. 11 last year. Despite an economic slowdown and cybersecurity concerns, China's ranking is the result of population increases, a large tech workforce and innovation-related factors.

After two years in the top 10, the Philippines fell to No. 12. While the country still offers advantages in terms of cost, market saturation is having an adverse impact. Corruption and political violence risk are among the newer factors that caused a decline in the Philippines' rankings.

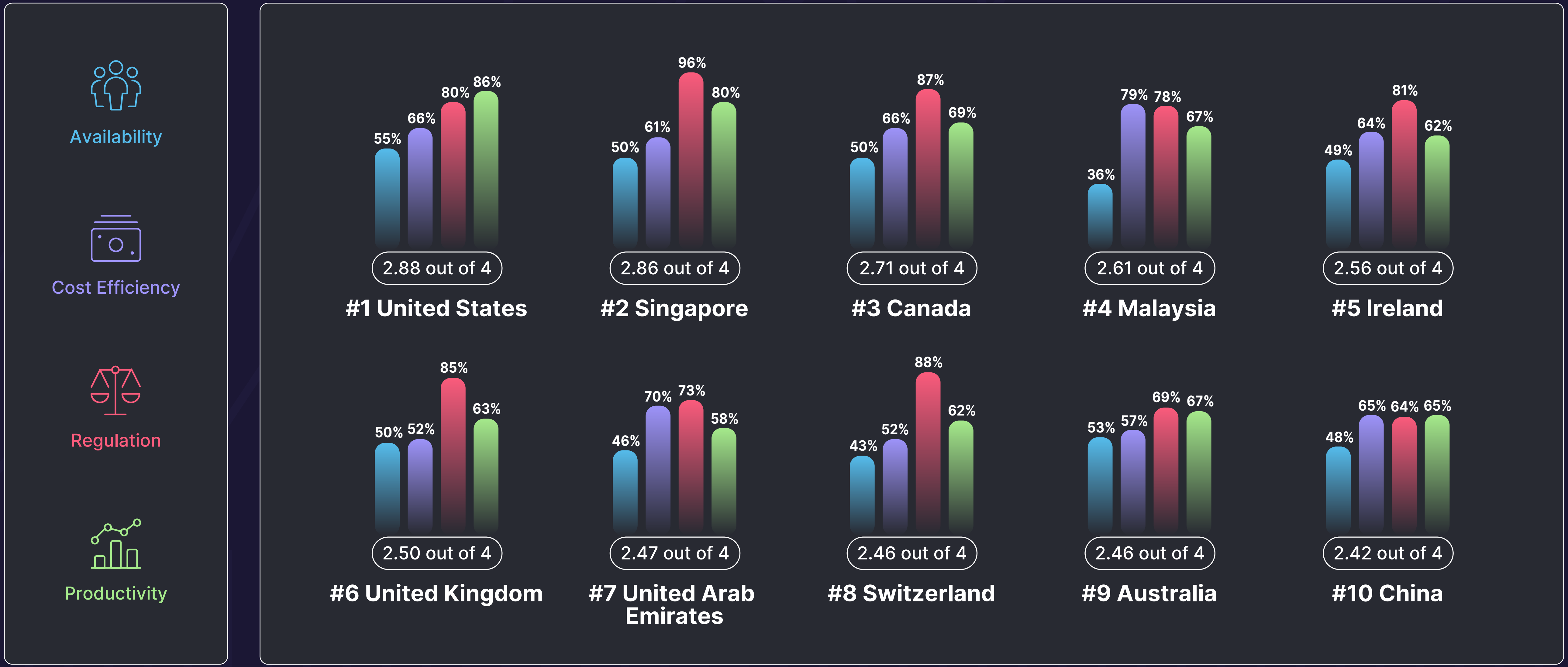
"Data-driven decision-making is crucial as employers navigate the evolving dynamics of labor markets. The TWI provides the insights needed to adapt to these changes.

By leveraging data, we can better understand and respond to shifts in skill availability, regulatory impacts, and technological advancements.

This enables organizations to make informed decisions that drive growth and ensure resilience in a rapidly changing global landscape."

– Dave McGonegal
Vice President, Talent Solutions Consulting

Top 10 Highest Ranking Markets



Availability

Workforce Availability measures the relative comparison of the current skilled workforce and likely sustainability of that workforce based on demographic trends, such as age and influx of immigrants. Markets scoring favorably in the Availability category have a high availability of skilled workers, labor force participation, gender participation, remote work capabilities and access to remote talent.

Major changes this year include decreasing the weighting of those engaged in the formal sector and adding a factor capturing the median age of the population. Although not currently addressed in the weighting, we have also begun to track population growth and migration rates in anticipation of their growing influence.

Top 5 Markets for Availability

Market	Availability	Cost Efficiency	Regulation	Productivity
#1 United States	55%	66%	80%	86%
#2 Australia	53%	57%	69%	67%
#3 Israel	51%	59%	56%	63%
#4 United Kingdom	50%	52%	85%	63%
#5 Singapore	50%	61%	96%	80%

Key Findings

The top five markets for Availability are the United States, Australia, Israel, the United Kingdom and Singapore. Because Availability is largely dependent on population and education levels, the markets near the top of the list tend to move more slowly in the categories more dependent on regulatory or economic change.

With a highly skilled labor force, large youth population and near-equal labor force participation among genders, the United States retains the top spot. Australia maintains the No. 2 spot, following a sizable jump (from No. 10) last year when population-related weightings were added.

Israel ranks No. 3 due to its growing, diverse workforce and access to IT talent. The market was on the rise in 2022, as employers sought to move production environments, IT centers and operations hubs out of the Russian market. Now, employers have delayed or shifted their investments in the region for the foreseeable future. Israel's strong ranking in this category underscores the importance of appropriately weighting all categories when making investment decisions.

The United Kingdom and Singapore come in at No. 4 and No. 5, respectively, swapping their 2023 ranks. The shift is due to changes in population weightings, particularly a lower median age in the United Kingdom.

> *"Asia-Pacific presents wide-ranging opportunities to identify in-demand talent due to high education levels, strong language and tech skills, and large, relatively young populations. Countries in this region are increasingly recognized for their robust talent pools and capacity to meet diverse workforce needs. By leveraging these strengths, businesses can tap into a dynamic and skilled labor force, driving innovation and sustaining growth in a competitive global market."*
>
> \- Michael Sacco
> General Manager, ManpowerGroup Talent Solutions

Cost Efficiency

Cost Efficiency measures the relative comparison of wage, benefits, tax and operations metrics to suggest potential opportunities to maximize overall cost. Traditionally, the lowest-cost markets also tend to be the least mature and generally have less restrictive regulations and higher workforce availability.

Significant changes were made to the 2023 Index to address issues that impact employers' ability to forecast workforce costs. These included inflation and exchange rate volatility, as well as requirements for employers to cover health insurance costs. These changes remain relevant, and no new additions have been made.

The average manufacturing wage — also added last year — remains a supplement to overall wages but has not been weighted for the purpose of the overall Index. Instead, we consider this measure in a manufacturing industry update.

Top 5 Markets for Cost Efficiency

Market	Cost Efficiency	Availability	Regulation	Productivity
#1 Thailand	85%	28%	46%	68%
#2 Malaysia	79%	36%	78%	67%
#3 Guatemala	78%	28%	64%	38%
#4 Paraguay	78%	32%	53%	41%
#5 Bahrain	76%	37%	60%	42%

Key Findings

The top five markets for Cost Efficiency include Thailand, Malaysia, Paraguay, Guatemala and Bahrain. The Cost Efficiency category saw considerable volatility following the pandemic due to wage pressure, inflation and exchange rate instability. The category has stabilized as a result of the new factors introduced in 2023 to account for these issues.

Thailand has held the top spot since 2021 due to relatively low taxes, competitive wages and a low cost of living. Malaysia takes the No. 2 spot (rising from No. 3). Paraguay is No. 3 (previously No. 5) and Guatemala ranks No. 4 for the second consecutive year.

Bahrain returns to the top five, securing the No. 5 spot, after falling out last year due to significant average wage increases. As Bahrain's wages leveled off relative to other markets, the country eased its way back onto the leaderboard.

Regulation

Regulation measures the relative comparison of how restrictive the terms and practices of workforce engagement are based on a standard set of regulations. Favorable regulatory environments are created when many types of workforce engagements are available to organizations and where notice periods and severance requirements are minimal or not required.

The major changes this year relate to economic and geopolitical risk. Specifically, we have added scoring to address risks related to political violence, the ability to conduct business, currency volatility and ease of money movement. These follow significant changes in 2023 to measure cybersecurity, financial risk ratings and exchange rate volatility.

Top 5 Markets for Regulation

Rank	Regulation	Availability	Cost Efficiency	Productivity
#1 Singapore	96%	50%	61%	80%
#2 Switzerland	88%	43%	52%	62%
#3 Canada	87%	50%	66%	69%
#4 United Kingdom	85%	50%	52%	63%
#5 Estonia	82%	40%	63%	56%

Key Findings

The historically volatile category of Regulation — 2022's top five were all different from 2021 — has stabilized over the past two years. In 2024, Singapore, Switzerland, Canada, the United Kingdom and Estonia make up the top five on Regulation. The only difference from 2023 is Canada and the United Kingdom trading places.

The ongoing stability is due to the addition of a cybersecurity ranking in 2023, continued high scores on peace and stability measures and the absence of sweeping changes to labor law or employment taxes in recent years.

"Employers are navigating complex challenges. For example, ESG reporting and climate-related changes are crucial for sustainable business practices and long-term success. In today's market, investors and stakeholders demand transparency and accountability. The 2024 Total Workforce Index™ incorporates these factors, helping businesses align workforce strategies with sustainability goals."

- Maalfrid Brath
Regional Managing Director of Nordic and Baltics, ManpowerGroup

Productivity

The Productivity category measures the relative potential productivity of a workforce based on the number of hours an employer can compensate a worker at base pay. Productivity is a category influenced by all three other categories (Workforce Availability, Cost Efficiency and Regulation). When the ideal mix aligns with workforce planning initiatives, organizations can meet productivity goals.

Following a year of little change to the Productivity category, we have introduced new factors in 2024 to include AI readiness, energy transition/sustainability, ability to participate in the green economy, travel ease and GDP growth rates. These are intended to account for fast-changing skills requirements and economic change.

Top 5 Markets for Productivity

Rank / Market	Productivity	Availability	Cost Efficiency	Regulation
#1 United States	86%	55%	66%	80%
#2 Singapore	80%	50%	61%	96%
#3 Canada	69%	50%	66%	87%
#4 Thailand	68%	28%	85%	46%
#5 Australia	67%	53%	57%	69%

Key Findings

Historically, the top countries for productivity have not tended to shift as much as other categories because they are based on workweek factors, such as holidays, overtime laws, tenure rules and sick leave. These requirements are often ingrained in culture and resistant to change.

The top five for 2024 are the United States, Singapore, Canada, Thailand and Australia. While the top three remain unchanged, it is worth noting that Canada would have fallen to No. 5 if not for the addition of AI and green measures. The country’s strong performance in those categories enabled it to retain its ranking from last year. Thailand has moved from No. 5 to No. 4 and Australia makes a sizable jump from No. 10 to No. 5, due to investments in their digital economy and the addition of AI and green economy rankings.

China fell out of the top five (from No. 4 to No. 7) due to an increase in the weighting on innovation rankings, which negatively impacted the country.

The Emerging Impact of AI and the Green Economy

This year, we have added green economy measures that consider each market's commitments to mitigate climate change, their overall environmental health and investments in decarbonization, among other related factors. We have also added factors to address the ability of governments to foster AI readiness.

The addition of these measures has had a notable impact on rankings in the Productivity category. The countries that perform well on these factors tend to outpace other markets by a wide margin. So, while the actual weighting is relatively small, the impact can be significant.

For example, looking at how countries would have fared without these new factors, Austria jumped seven spots (from No. 32 to No. 25) with the addition of green economy considerations. AI factors caused the UK's Productivity ranking to rise from No. 17 to No. 11. On the flip side, Costa Rica fell ten spots with the addition of AI, while India dropped seven spots once the climate factors were included.

Conclusion

In today's rapidly evolving global landscape, employers face challenges driven by demographic shifts, new regulations, technological advancements, economic uncertainties and environmental imperatives. These factors call for a proactive approach to workforce planning. The TWI is built to adapt to these challenges. For example:

- As the pandemic took hold in 2020, companies were able to get a clear picture of access to markets as countries restricted their border entry. The addition of remote workforce availability and infrastructure ultimately led to the creation of remote workforce optimization modeling for clients.
- As the talent shortage intensified in 2021, the TWI helped clients understand hot spots for key skills, along with opportunities to relax language and education requirements to expand talent pools.
- In 2022, the TWI was used to quickly identify ready sources of highly skilled IT and manufacturing talent as companies moved out of Russia and lost access to a large workforce.
- Organizations turned to the TWI in 2023 to uncover opportunities to mitigate financial risk amid ongoing concerns about inflation, wage pressure and currency volatility.

The Total Workforce Index™ is designed to address the complex needs today's employers have. By incorporating new metrics such as AI readiness and the ability to transition to a low-carbon economy, the TWI provides a comprehensive, real-time view of workforce dynamics. This empowers organizations to make informed decisions that align with their strategic goals and navigate the uncertainties of the modern business environment.

Whether seeking specific skills, evaluating infrastructure and demographics, or identifying favorable regulatory environments, the TWI offers actionable insights that help organizations stay competitive. With the Total Workforce Index™, companies can effectively manage workforce risks and leverage opportunities in an ever-changing world.

"Rapidly changing environments are driving employers to seek data-driven workforce solutions.

As organizations aim to stay ahead, they rely on the Total Workforce Index™ to provide the actionable insights needed to navigate risks, optimize talent strategies, and harness emerging opportunities in a dynamic global market."

- Kate Donovan
Senior Vice President, Talent Solutions and President, Talent Solutions Strategy and Center of Excellence

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See detailed data, including 60+ market profiles.
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Find answers to your workforce challenges by viewing market reports, blogs, success stories and more.

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Sources and Disclosures

The primary data sources for this Index are based on statistics from the ministries of labor for the markets within the scope, World Bank, Trading Economics, International Labor Organization, Eurostat, United Nations, e-Governance Academy - NCSI Project, AI Readiness Index Oxford Insights, Dual Citizen and internal data collected as part of ManpowerGroup global reporting efforts. Learn more about the methodology at www.totalworkforceindex.com.

Disclaimer

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