

# CIPD

Chartered Institute  
of Personnel and  
Development

in association with



## People analytics:

driving business  
performance with  
people data

US focus  
*September 2018*  
*Global research*

The CIPD is the professional body for HR and people development. The not-for-profit organisation champions better work and working lives and has been setting the benchmark for excellence in people and organisation development for more than 100 years. It has 150,000 members across the world, provides thought leadership through independent research on the world of work, and offers professional training and accreditation for those working in HR and learning and development.

Workday is a leading provider of enterprise cloud applications for finance and human resources. Founded in 2005, Workday delivers financial management, human capital management, and analytics applications designed for the world's largest companies, educational institutions, and government agencies. Organisations ranging from medium-sized businesses to Fortune 50 enterprises have selected Workday.

## US focus

# People analytics: driving business performance with people data

## Contents

Introduction	2
People analytics culture and access to data	2
Professional perspectives on data use	3
Confidence and capability	4
US HR professionals have limited access to data science	5
Value of people analytics	6
Using data to manage risk	7
The impact of AI and automation	8
Conclusions	9

## Acknowledgements

This report was written by Edward Houghton, Senior Research Adviser: Human Capital and Governance, CIPD, and Melanie Green, Research Associate, CIPD.

We'd like to thank Tasha Rathour, Ian Neale and the team at YouGov for their help in designing and running the survey instrument, as well as a number of experts for their insights and guidance, including Andy Charlwood, Max Blumberg and Andrew Marritt.



We'd also like to thank Workday for their ongoing interest in this important agenda. Without their support, this research would not have been possible.

## 1 Introduction

The CIPD report, in association with Workday, *People Analytics: Driving business performance with people data*,<sup>1</sup> uses global data collected from the UK and Ireland, US, Middle East and North Africa (MENA), and South-east (SE) Asia to explore multiple professional perspectives on people data and people analytics.

People analytics is a growing agenda for organisations, particularly given the rise of workplace technology that is now able to track individuals' behaviours and provide deeper insights into their performance, productivity and well-being. The use of data in organisations to drive business and employee outcomes is expected to continue as technology further influences the world of work, and more stakeholders including investors and prospective employees show interest in people data.

This summary report provides a spotlight on the US, and explores how US professionals from HR, finance and other business backgrounds use and value people data.<sup>2</sup>

We find that US respondents report they have relatively low access to data, and are most likely to identify as analysts and consumers of people data than producers. US HR professionals also report relatively low confidence when it comes to analytics, suggesting more needs to be done to raise confidence and capability.

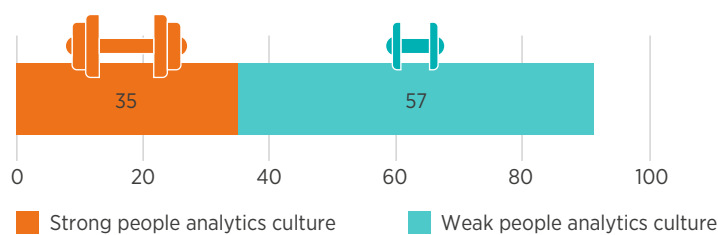
## 2 People analytics culture and access to data

The study showed that four in ten US respondents indicated that they have access to workforce data (41%), with 20% using this daily.

US HR professionals were most likely to identify as analysts and consumers of people data (31%), although the small sample size means this should be taken as an indicative finding. Overall, US respondents were most likely to identify as analysts and consumers of workforce data (29%).

Similar to the UK, US respondents were more likely to indicate they operated in a weak people analytics culture (57%) than a strong one (34%).<sup>3</sup>

**Figure 1: US people analytics culture (%)**



Base: US professionals (n=406)

<sup>1</sup> Available at [www.cipd.co.uk/knowledge/strategy/analytics/people-data-driving-performance](http://www.cipd.co.uk/knowledge/strategy/analytics/people-data-driving-performance)

<sup>2</sup> Base n=406, HR 32%, finance 42%, other professions (such as sales, marketing and procurement) 26%

<sup>3</sup> This refers to the way organisations use and value analytics, and is measured using items such as: do management speak about the value of data and transparency, and is data actively sought out?

### Regional differences in people analytics culture and access to data

US respondents indicated that they have the lowest access to data across the regions included in this study, with 41% having access to people data compared with 50% of MENA professionals, 54% of SE Asia professionals and 57% of UK professionals.

US professionals also use people data less frequently than some regions in the study, with 20% reporting they use this daily compared with 34% of MENA professionals and 24% of SE Asia professionals. However, they report using data slightly more frequently than UK professionals, where 17% report using this daily.

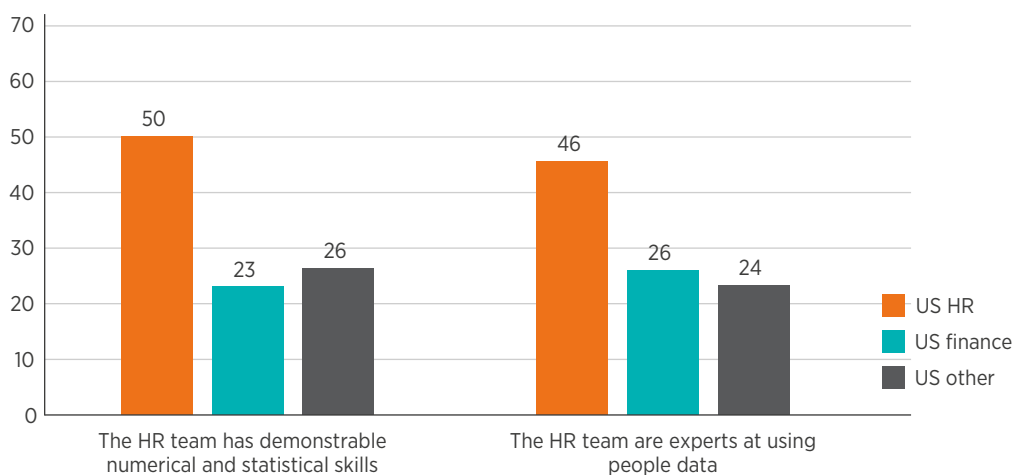
US and UK respondents report similar people analytics cultures, with 35% of UK respondents reporting their organisations have a strong analytics culture compared with 34% of US respondents. However, both Asia and MENA respondents are far more likely to indicate they operated in a strong analytics culture (54% and 52% respectively).

## 3 Professional perspectives on data use

The study also investigated HR’s reputation as a data-driven function. Data shows that HR, finance and other professionals differ in their opinions. US finance professionals have a less positive view of the HR function’s numerical skills, with 23% of US finance agreeing that their HR team has demonstrable numerical and statistical skills, compared with 50% of HR professionals.

A similar trend is evident with regards to expertise using people data, with 46% of HR respondents agreeing the HR team are experts at using people data compared with 26% of finance professionals. Other functions are also less likely to agree that HR are experts at using people data (24%).

Figure 2: Professional perspectives on HR people data skills (% agree)



Base: US HR (n=131); US finance (n=169); US other (n=106)

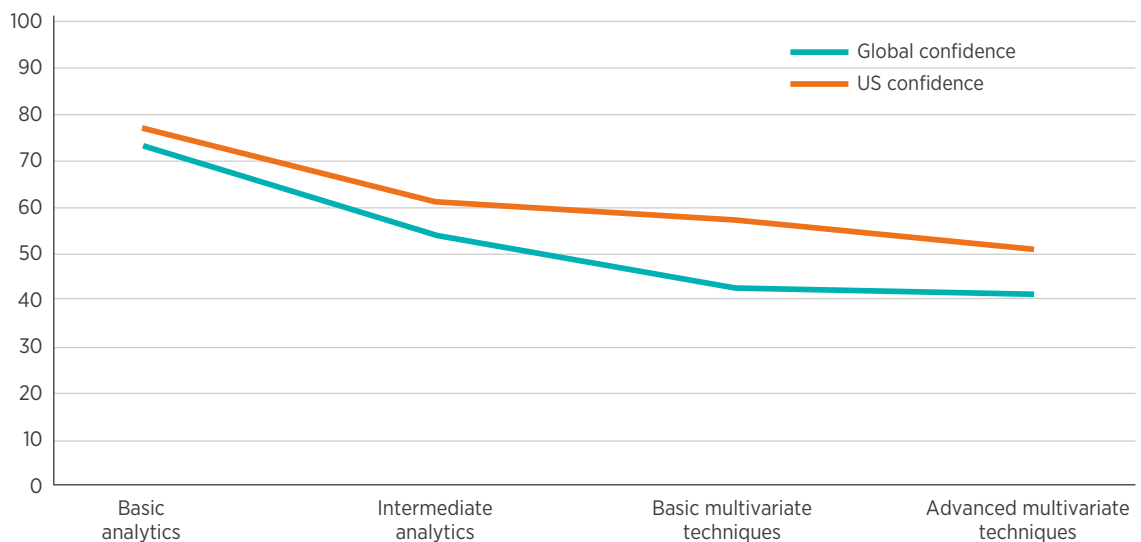


## 4 Confidence and capability

Just over a third of US HR professionals always or often use basic data analysis (35%), with a further 77% reporting they are confident using this, suggesting there is untapped potential when it comes to using data analysis.

However, when it comes to more advanced analysis, just 19% of US HR professionals always or often use multivariate models, and half say they are confident or very confident using this (51%).

**Figure 3: US confidence conducting analytics (%)<sup>4</sup>**



Base: global HR basic analytics (n=1,160); global HR intermediate analytics (n=1,045); global HR basic multivariate (n=856); global HR advanced multivariate (n=735); US HR basic analytics (n=112); US HR intermediate analytics (n=98); US HR basic multivariate (n=80); US HR advanced multivariate (n=72)

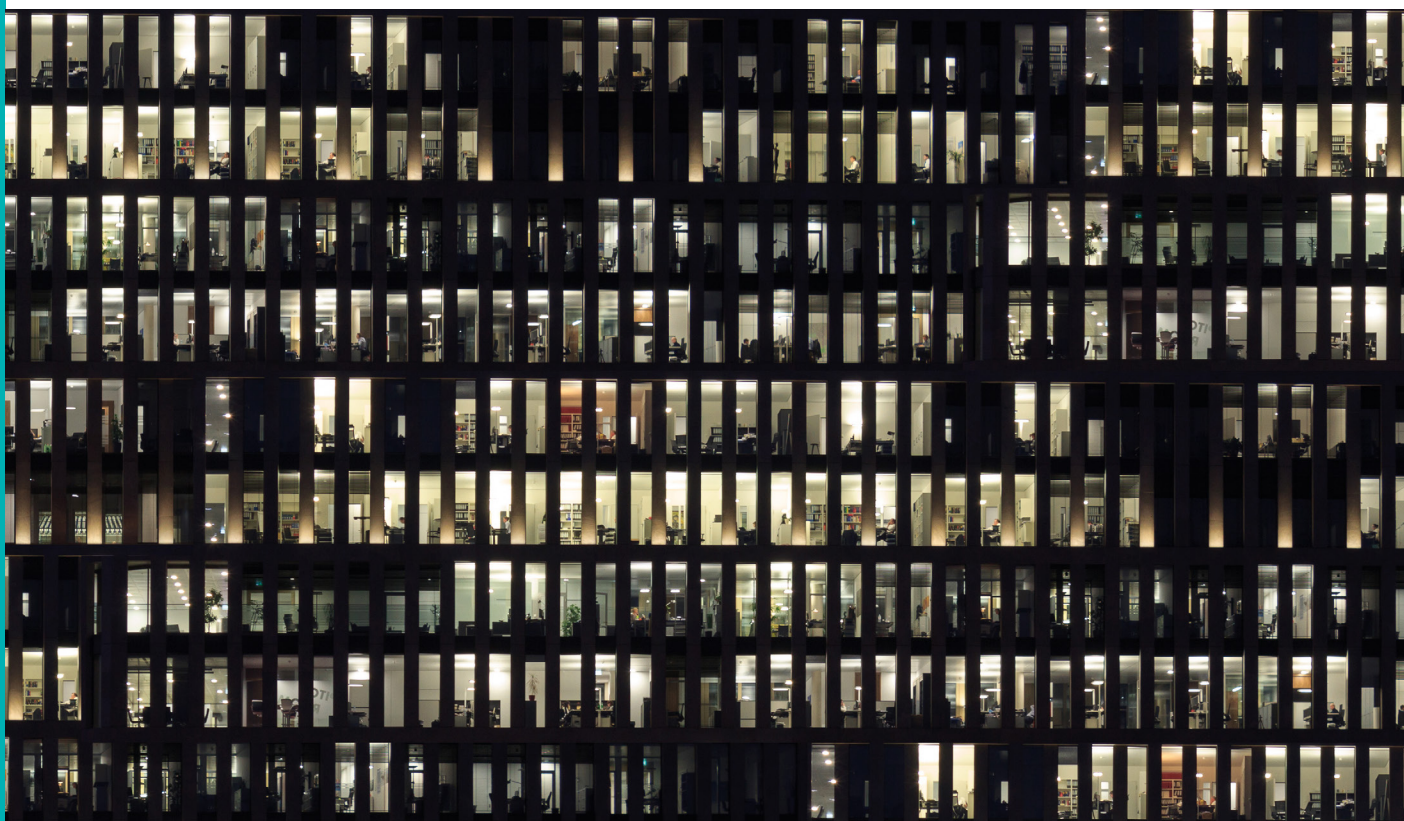
Confidence in basic data analysis is also high, with 71% of US HR professionals reporting that they are confident in using these techniques. Over half (54%) were confident undertaking more advanced analysis, compared with the 37% who frequently use this type of analysis.

### Regional differences in confidence and capability

US respondents report the lowest use of analysis across regions in this survey, with 35% using basic data analytic techniques compared with 38% of UK respondents. However, levels of confidence are similar across regions, suggesting more could be done to encourage US HR professionals to use people analytics skills.

It should be noted that the US sample size in this area is small, so should be considered indicative rather than conclusive.

<sup>4</sup> Item adapted from Levenson, A. (2011) *Using targeted analytics to improve talent decisions*. Centre for Effective Organisations.



## 5 US HR professionals have limited access to data science

With US HR respondents indicating relatively infrequent use of more advanced data analysis, are US organisations outsourcing people analytics? Our study suggests that this is only the case for around a quarter of respondents, with 29% agreeing that data scientists and/or HR analysts are available to their HR team, and under a quarter agreeing their HR team has access to data scientists with HR knowledge (24%).

When it comes to the HR team's own data science skills, three in ten (30%) agree their HR team is able to tackle business issues using analytics data and 28% agree that their HR team has the right skills to handle large datasets.

### **Regional differences in access to data science**

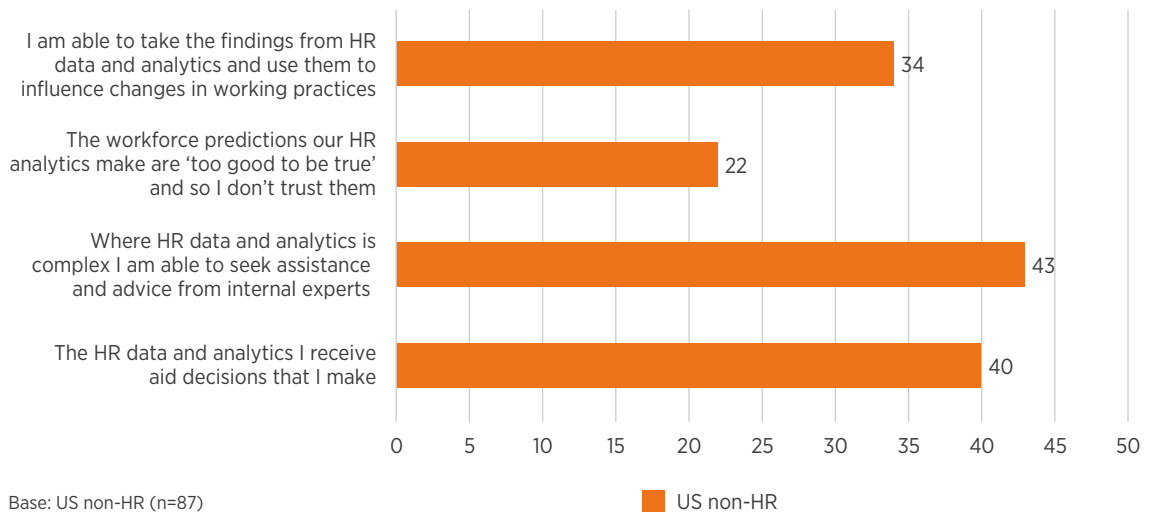
US and UK respondents have largely comparable access to data science and data science skills in-house.

In contrast, around half of SE Asia and MENA respondents agree their HR team has access to data scientists (47%), compared with 24% of US respondents. A similar trend is apparent for all items, with just under half of SE Asia respondents (49%) and MENA respondents (47%) indicating their HR team is able to tackle business issues using analytics, whereas 30% of US respondents agree that this is the case.

## 6 Value of people analytics

The survey investigated non-HR perspectives on the value of people analytics to understand if and how people analytics is adding value to those in the business with which HR partners. It should be noted that the sample size for this question is small, so findings should be taken as indicative.

**Figure 4: Professional perspectives on people analytics value (% agree)**



Forty per cent of US non-HR professionals in the study report that the HR data and analytics they receive aids the decisions that they make. A further 43% feel they can seek advice from internal experts when data and analytics are complex. Just a third agree they can take the findings from people data and analytics and use them to influence changes in working practices (34%).

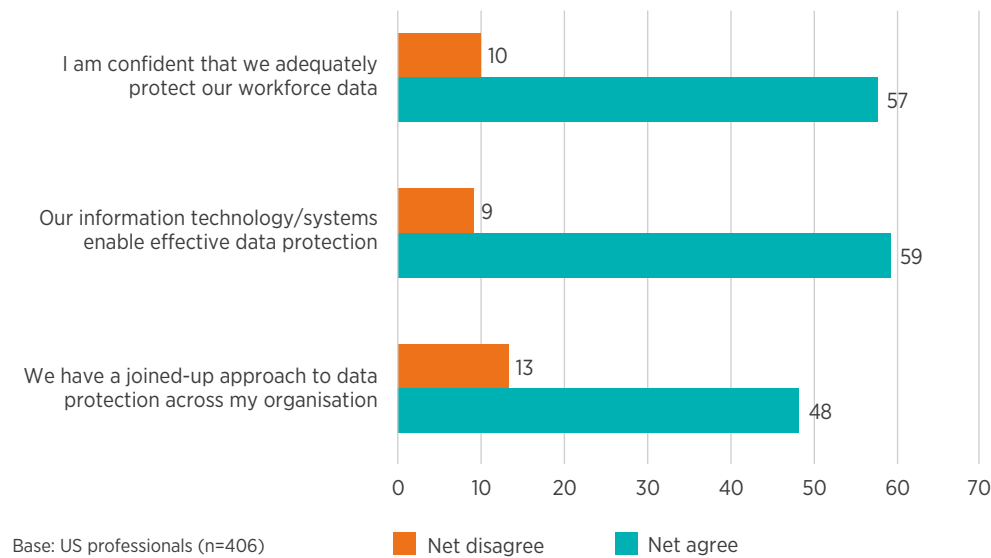
However, few US professionals feel that people analytics data and predictions are 'too good to be true' and therefore can't trust them (22%).



## 7 Using data to manage risk

When it comes to risk, US HR respondents feel they are most effective<sup>5</sup> at managing risks associated with physical health and safety (75%), career development and progression of minority groups (65%), and employee participation in decision-making (63%). They report being least effective at managing risk associated with industrial action (49%).

**Figure 5: US perspectives on data protection (% agree and % disagree)**



With regards to data protection, six in ten (59%) agree that their information technology/systems enable effective data protection, and 57% feel that they adequately protect their workforce data. Just under half feel they have a joined-up approach to data protection across their organisation (48%).

This largely positive view of data protection is similar across professional perspectives, with 60% of US HR professionals, 59% of US finance professionals and 57% of other US professionals agreeing that their systems enable effective data protection.

### Regional differences in data and risk management

US respondents are less confident in management of risks posed by psychological health and safety issues than UK respondents, with 28% reporting they are not at all effective at managing this risk, compared with 14% of UK respondents.

Data protection across regions is largely consistent, although US respondents have the least positive view of data protection in their organisation.

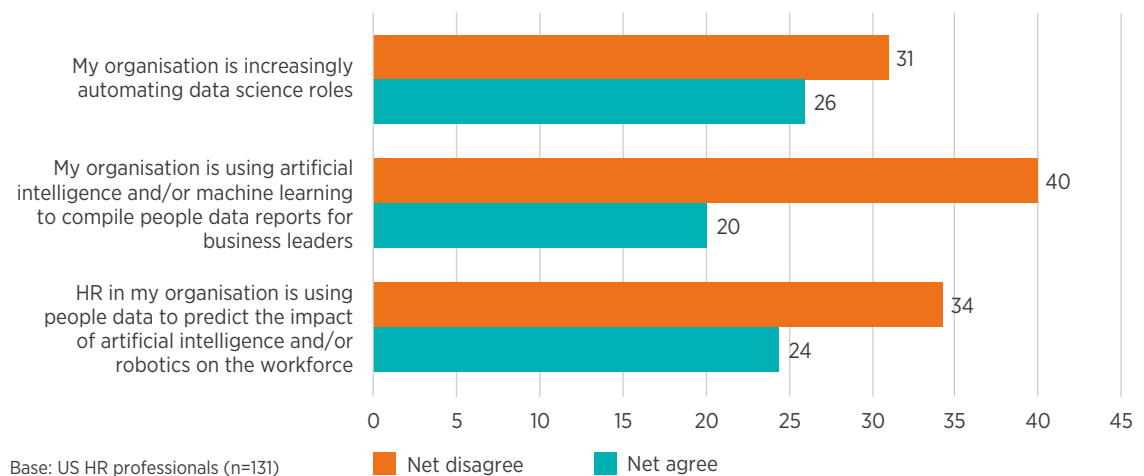
<sup>5</sup> Percentage selecting 'effective a great deal' or 'to some extent'

## 8 The impact of AI and automation

The survey found that using AI and analytics to predict future workforce trends is not standard practice in the US, with less than a quarter using people data to predict the impact of AI and robotics on their workforce (24%).

Few US HR professionals report that data science is becoming automated, with 26% agreeing that their organisation is automating these roles, compared with the 31% that disagree this is the case. In addition, just two in ten agree that their organisation is using AI/machine learning to compile people data reports for business leaders (20%).

**Figure 6: Impact of AI and automation on analytics in US organisations (% agree and % disagree)**



Global analysis suggests that people analytics culture is associated with preparedness for future trends and automation of analytics, with those operating a strong people analytics culture more likely to indicate that they are utilising AI, automating data science roles and using people data to predict the impact of AI/robotics on the workforce.<sup>6</sup>

With US respondents less likely than other regions to identify their organisation as having a strong analytics culture, it is clear that people analytics culture supports advanced use of people analytics.

### Regional differences

Overall, US respondents are somewhat more likely to report data science automation than UK respondents, but less so than SE Asia and MENA respondents. For example, just 15% of UK respondents agree their organisation is increasingly automating data science roles, compared with 26% of US respondents; however, US respondents are less likely to agree than MENA respondents (43%) and SE Asia respondents (50%).

This trend continues across all items, with US respondents less likely to suggest their organisation is using people data to predict the impact of AI and robotics on their workforce, and that AI is used to compile reports than SE Asia and MENA respondents but more likely to suggest this than UK respondents.

<sup>6</sup> Using AI and machine learning for reporting:  $F=240.189$ ,  $p=0.000$ . Using data to predict impact of role automation;  $F=266.251$ ,  $p=0.000$ , automating data science roles:  $F=256.690$ ,  $p=0.000$ .

## 9 Conclusions

An important story to emerge from this study is the impact of low skills and low confidence on the quality of outcomes from people analytics. This is apparent across regions, but most pronounced for professionals in the US, as well as the UK and Ireland, particularly with regards to confidence in conducting people analytics. This is having an impact on the uptake of people data by non-HR colleagues, who are yet to see the value of people data and people analytics.

Our findings show that HR's reputation for conducting people analytics needs to be improved. People data is critical for evidence-based decision-making and can be a useful tool for HR – however, US HR functions may be missing out on its potential power by not investing in and developing capability.

### Recommendations

There are several key areas people professionals should focus on to get the best outcomes from people analytics.

**Table 1: Key recommendations for US HR professionals**

<b>Build skills and confidence of HR professionals</b>	Build people analytics skills and confidence in the profession: HR leaders must invest in and develop the skills and confidence of HR professionals, and ensure they have the opportunities to undertake people analytics projects.
<b>Use data to bridge the gap between HR and business colleagues</b>	Build stronger cross-functional relationships to improve the impact of people analytics: non-HR functions require encouragement to increase the use of people data in their practice and for long-term decision-making. HR leaders and business partners should use this opportunity to build relationships using people data, and focus on delivering business value.
<b>Focus on building people analytics culture and behaviours</b>	HR practitioners should look to ensure that they take the opportunity to foster strong people analytics cultures by recognising its value and importance at the strategic level.
<b>Continue to improve efforts to automate where appropriate</b>	HR professionals globally should continue to improve their use of people analytics technologies to automate reporting. This should be a particular focus for HR professionals in the US, who appear to lag behind international counterparts in SE Asia and MENA.

Find out more: check out the full report at  
[cipd.co.uk/peopleanalytics](https://cipd.co.uk/peopleanalytics)

# CIPD

Chartered Institute of Personnel and Development  
151 The Broadway London SW19 1JQ United Kingdom  
**T** +44 (0)20 8612 6200 **F** +44 (0)20 8612 6201  
**E** [cipd@cipd.co.uk](mailto:cipd@cipd.co.uk) **W** [cipd.co.uk](http://cipd.co.uk)

Incorporated by Royal Charter  
Registered as a charity in England and Wales (1079797)  
Scotland (SC045154) and Ireland (20100827)

Issued: September 2018 Reference: 7663 © CIPD 2018

