

# Australia and New Zealand

**Sudhir Pai**, Vice President, Australia Testing Leader, *Capgemini*  
**Vasant Gore**, Vice President, Financial Services GBU, *Capgemini*



## Important trends

- Organizations from Australia and New Zealand are the highest spenders on hardware and infrastructure, investing 40% of their QA and Testing budgets in new systems.
- Half of the testing at organizations in Australia and New Zealand occurs in cloud-based test environments.
- More than two-thirds (68%) of the IT executives from Australia and New Zealand see security as an important IT priority, and 85% actively participate in application security assurance activities in the production phase.

As Digital Transformation gains momentum, business leaders in Australia and New Zealand are demanding flexibility and speed from IT. Up to 68% of the IT executives interviewed for the World Quality Report 2015 see higher responsiveness to business demands as a top IT priority, followed closely by customer experience (67%). Figures indicate a gradual shift in focus from cost optimization, a top IT priority last year, to accelerating time-to-market with shorter release cycles (61%).

Quality Assurance (QA) and Testing has seen corresponding growth in allocations from a quarter of the IT budgets last year to more than one-third (36%) in 2015. However, 58% of the QA and Testing budget — the highest worldwide — is spent on maintenance, leaving only 42% for new transformational development. Nearly a quarter of the survey respondents (24%) cite difficulties integrating new applications with the existing ecosystem as a major challenge in application development. In addition, 29% lack appropriate budgets for development, given the higher allocations to maintenance, reflecting the complexity of the existing portfolios in the region.

Organizations from Australia and New Zealand are also the highest spenders on hardware and infrastructure, investing 40% of their QA and Testing budgets in new systems. This is 3% more than the global average. In fact, 21% of the region's research participants spend more than 50% of their QA and Testing budgets on hardware and infrastructure. This indicates the need to upgrade hardware so that the growing volume of test cases can be efficiently addressed as organizations target regular releases and updates for customer-facing web and mobile applications. Of the QA and Testing budget allocated to new development, 70% is dedicated to mobile, Cloud, business analytics and front office (customer-facing) solutions.

Almost all organizations (96%) from the region perform mobile tests, with nearly two-thirds (66%) of this number focusing their efforts on protecting sensitive data on

# WORLD QUALITY REPORT 2015-16

SEVENTH EDITION

devices and networks. Up to 56% carry out user interface testing, aimed at simplifying access and usage. In fact, most Retail and Financial Services firms set up strategic User Interface and User Experience (UI/UX) groups to monitor usability tests on customer-facing applications. However, the need for speed and agility in development and testing is felt severely by mobile testing teams. More than one-third (37%) of those interviewed in the region cite the lack of time to test mobile and multi-channel applications as a major challenge, and nearly a quarter lack the right testing processes or methods.

Digital Transformation is also driving the adoption of DevOps principles and agile methods in Australia and New Zealand. Up to 84% of the survey respondents interviewed in the region use DevOps, though not all organizations have a defined strategy in place. Some see the integration of development, operations and testing as a foundation for the adoption of DevOps, while others are benchmarking DevOps maturity based on agility and velocity, or the commonality of the toolsets shared by different teams. More than half (51%) of the research participants use test automation integrated with continuous integration techniques.

Up to 44% of those interviewed in Australia and New Zealand use agile methods and 75% (of those using agile) employ test and behavior driven development. Last year, more than two-thirds (69%) of those interviewed for the report had expressed their inability to identify the right areas for agile testing. Although the 2015 figures indicate a remarkable improvement, a substantial one-third still find it difficult to identify the right areas on which agile testing should focus.

Only a quarter of those using agile methods work in a distributed agile mode, with most organizations being in the initial phase of adoption and thus supported by co-location. Co-location or setting up of test teams in the same location as business units is not as cost-effective as a globally distributed model. More organizations will likely move to distributed delivery as cost-conscious



**Download the World Quality Report  
2015-16:**

[www.worldqualityreport.com](http://www.worldqualityreport.com)



## Contact HP

If you desire more information about testing tools , please contact

**Paul Whiten**

APJ ADM Business Leader

HP Software

[whiten@hpe.com](mailto:whiten@hpe.com)

+65 94563268

leaders look for success stories that can help them scale up the maturity curve. Already, 16% — the highest worldwide — say they plan to start an agile testing center of excellence (TCOE) and 56% see decentralization for improved agility and efficiency as an important aspect of their TCOE set-up.

In their quest for speed-to-market and efficiency, most organizations have industrialized their approach to QA and Testing and, where applicable, have built automation frameworks. More than a quarter (26%) of those interviewed benefit from an in-house TCOE and 22% plan to develop an internally managed one within the next two years. Up to 18% either already use the services of an external partner with TCOE capabilities or have plans to do so. Nearly half (45%) of the test-cases in Australia and New Zealand are automated and just over six out of 10 participants (61%) cite reduction in test cycle time as an important driver of automation. In fact, participants report that automation frameworks have matured well beyond regression testing and now incorporate mobile testing and continuous integration. And yet, half of those interviewed don't have the right automation tools, despite spending 28% of the QA and Testing budgets on tools and licenses.

Half of the testing at organizations in Australia and New Zealand occurs in cloud-based test environments. This is not just a 19% increase over the last year; it's also the highest score for cloud-based testing worldwide. While Telecom and Retail sectors are leaders in Cloud adoption, Financial Services is more measured in its approach, given the sensitivity of customer data at stake. Again, Digital Transformation is a key driver of cloud-based testing, with two-thirds (67%) performing functional testing of cloud services and a half carrying out functional tests on business intelligence and analytics solutions.

In general, however, test environment (and data) management isn't a priority area,

except for large organizations from the region. In most cases, test environments are moderated by development or support teams and rest with specialist management partners only in a small number of organizations. Although nearly half (49%) of those interviewed maintain and use permanent test environments, an equal number cite the maintenance of multiple versions of hardware, middleware and systems under test as a barrier to provisioning environments. There has been an increasing focus on virtualization, with up to 47% using a virtualized test environment.

The research data reveals that the approach to test data management is extremely fragmented. This must be viewed in the context of local data privacy laws that explicitly prohibit usage of production data for testing purposes. Up to 14% of those interviewed copy production data without any further manipulations, an increase of 2% over last year. Additionally, 14% copy production data that is anonymized before testing and the remaining don't have a consistent strategy for test data. For many organizations in Australia and New Zealand, test data management revolves mainly around data-masking and very few have a comprehensive test data management framework in place.

More than two-thirds (68%) of the IT executives from Australia and New Zealand see security as an important IT priority, and 85% actively participate in application security assurance activities in the production phase. Up to 35% perform security testing through internal testing teams with owned tools, while 29% prefer managed application security testing services. While some work with niche external players for their security testing requirements, many organizations task a separate corporate security group with relevant targets, with IT reporting in as required.