

The Case for Psychometric Assessment

What is a psychometric test?

From a legal standpoint in North America, a test is viewed as any method used to make a decision that will likely lead to a corresponding action, such as employment, coaching, etc. (the *Uniform Guidelines on Employee Selection Procedures*, 1978). From an assessment standpoint, a test is a regulated series of problems or questions that assess a person's knowledge, skills, abilities, or other characteristics.

These tests are typically standardised tools with well-researched psychometric properties that are used in hiring, promotion, demotion, membership, referral, retention, and licensing and certification decisions.

Psychometric tests vary according to their mode of administration (e.g., paper-&-pencil versus online), their content (e.g., interpersonal skills, mathematical ability), their level of standardisation or structure, their costs, their administrative ease, and many other factors.

When psychometric assessment makes the most sense

Assessment is appropriate in personal or work-related settings. On a personal level, applications such as self-analysis and deepened growth, career planning, sport and academic achievement, coaching, therapy, clinical diagnosis and even prognosis come to mind. In the world of work, ample research studies indicate that employees affect a company's climate, performance and profitability. We will be focusing more on the latter application in this document.

Hiring or promoting people who are unsuitable costs money that run into the thousands per employee, time, corporate morale and potential new business. Carefully developed and administered psychometric assessments can provide businesses with a way to decide *systematically* and *accurately* who has the ability to perform well on the job, will not likely resign, won't engage in counter-productive behaviours, or will benefit from training opportunities. Assessment results can also advance individuals who are better matched to positions for which they are suited and in which they will wish to grow.

Reasons for psychometric assessment

According to the Society for Industrial/Organizational Psychologists (www.SIOP.org), some of the more commonly cited reasons for assessment are:

Testing leads to savings in the decision-making process

Psychometric assessment tests can be a cost-effective way to pare down the applicant pool. Standardised tests can make the decision process more efficient because less time is spent with applicants whose characteristics, skills, abilities and personal styles do not match what is required. Some assessments may require considerable time to complete, but can make a notable difference in the accuracy of determining who is and who isn't qualified.

The costs of making a wrong decision are high

For certain employment decisions, a wrong decision can be very costly in terms of training costs, errors made by a poor performer, costs of replacement, etc. For these types of decisions, investing in psychometric assessment may be seen as a particularly worthwhile

endeavour because standardised testing has proven to reduce the number of wrong decisions.

The job requires attributes that are hard to develop or change

Psychometric testing is effective for assessing characteristics that cannot be developed through workshops and short courses, but are acquired over long periods of time or even a lifetime (e.g., personality traits, in-depth knowledge of a profession).

Hard-to-get information can be obtained more easily and efficiently

Psychometric tests often provide normative information about an incumbent that is not easily obtained using other methods, allow for cross-referencing and verification by other tests, and would be much more costly to obtain by other means.

Individuals are treated consistently

Using standardised tools ensures that the same information is gathered on each individual and used in a uniform way in employment and other decisions. Employers often turn to psychometric assessment

because of the unfairness and bias of non-standardised processes.

There are a lot of applicants

Often the sheer number of individuals to consider for an employment decision leads an employer to choose psychometric assessment as the most efficient and informed means of making a decision in a timely manner.

Reasons for NOT assessing

By contrast, some of the most commonly cited reasons for not using psychometric assessment are:

Cost

Psychometric tests vary in cost, depending on their level of customisation and the detail in interpretation that they provide.

However, assessment expense may be easily offset when considering costs of low productivity, errors, retraining times, and turnover. For example, conservative estimates of the cost of turnover range from 35-50% of the annual salary of the employee that is being replaced. The costs of replacing management, executive and highly skilled talent easily reaches 1-2 times the annual incumbent's salary.

These figures do not take into account intangible damages when hiring a miss-match, which can be escalating. Testing can be a valuable investment for organizations to make in hiring, developing and retaining talent.

Fear of legal action

Sometimes concerns are raised about the legality of using tests in employment decision-making. This occurs mostly when non-standardised and poorly validated tests are used.

Adverse impact exists when the selection rate of a given demographic group (e.g., females versus males, whites versus blacks, able versus disabled people) is substantially different than the selection rate of the majority group. As with any other method of making employment decisions, tests can be scrutinized if there is a belief that discrimination in employment decisions has occurred.

The case is made

Psychometric tests are useful decision making tools in employment and personal contexts. Deciding whether a test is the right solution in a given situation may require professional advice from someone with knowledge of both psychometric assessment and the needs of people in a work situation or where professional advice for personal situations are sought. It may be helpful to contact your professional association for a referral that would be most suitable to your needs.

While any selection procedure may show score differences that result in exclusionary effects upon a group, some types of tests (e.g., physical or cognitive ability) are more likely to show such score differences. These differences usually form the base for choosing the most applicable norm set against which an individual or group's scores are standardised.

Despite inherent differences, well-developed and validated psychometric assessments are accurate predictors of job performance and other outcomes of interest, and can withstand legal scrutiny. Employers should have clear documentation regarding any tools they use in employment decision-making.

Practical constraints

Using psychometric assessment may be hard to motivate if not many individuals are being considered in a particular employment decision, if the resources to properly administer the test are not available, or if the timing and logistics of the decision-making process preclude the use of an appropriate test.

However test publishers and consultancies may offer alternative access to psychometric assessment under the umbrella of contributions to test development, research grants, customised consulting services, discounts and shortened report options.

To test ... or not to test

Organisations who can contribute performance or other outcome measures in return for assessment material are often welcomed by those in the assessment business. It is worthwhile exploring such options before discarding the whole idea of psychometric assessment and completely lose out on the benefits it has to offer.

It is not clear how the addition of a test would improve the current decision-making process

Employers may believe they already have a quality decision-making process in place and a test would simply add costs and time with no gain in decision accuracy. Often, however, this belief is not supported by empirical validation evidence, as organisations do not always track the information necessary to actually evaluate how well their employment decision-making processes are working. A proper evaluation of a decision-making process may reveal room for improvement, and often a test is a cost-effective and efficient way to improve the process.