



ILM72

Module 9 - The Basics of Psychometrics

Introduction to Psychometrics

Basics of Psychometrics

A psychometric tool is an instrument which seeks to make predictions about some aspect of the person completing it. It is important to understand that tests:

- Are powerful statistical tools – which should be used appropriately
- Maybe capable of interpretation – so the output needs to be checked carefully
- Are very dependent on good design

Psychometric tests such as ILM72 deal with habitual behaviour and style - how one deals with situations. These tests fall into two distinct types - ipsative and normative. The critical difference between the two types of tests is that they are scored on different scales. Normative tests measure person against person, while ipsative tests are geared toward identifying the relative strength of individual characteristics within each person.

It is important to understand the concept of norms to be able to use and to explain the ILM72. This is because it is a normative measure. This simply means that an individual's results (e.g. from completing the questionnaire) are compared to the results achieved by a "norm" group. This enables us to take an individual's score & compare it to a particular population. We are then able to provide an insight into the leadership style of the individual.

Tests such as ILM72 are constructed by administering the tests to a representative sample of people in a managerial position. This is the "norm" group. Different scoring systems are used in psychometric testing. ILM72 uses two of the most common - percentiles and stens. They are inter-related.

Stens

This is a standardised scoring system used in many psychometric measures.

The distribution is split into deciles. This simply means that the population is split into ten equal percentiles called a sten. So the first sten represents the first 10% of the population. The second represents the second 10% of the population and so on.

If an individual's score falls into the range of scores scored by people in the second decile, the individual's score is deemed to fall into sten 2.

Each sten represents 10% of this leadership norm group.

Like most psychometric data the ILM72 is analysed by reference to a sten scale. Stens make it easier to explain and interpret test results. ILM72 presents its output data on graphs using sten scales.

Good Practice in Psychometrics

When it comes to test administration and test use, there are some basic requirements for good practice. These are designed to support getting the best possible cooperation from a candidate, which normally means that the data captured is then much more reliable. It also ensures that the process is reasonable – that it is efficient and effective from the perspective of the user and the candidate.

The first and possibly most important consideration, is to ensure that it is appropriate to use that test for the purpose in hand. The test has been designed to assess a specific set of qualities, it can only be useful in terms of those qualities.

When inviting a candidate to complete the measure, it is important to explain to the candidate:

- What the test is
- The purpose of the assessment
- How the information will be used
- How the candidate will receive feedback

One should encourage the candidate to respond honestly. Most personality type measures are designed to be completed with a candidate's first instinctive response, so the candidate should be encouraged to respond reasonably quickly to questionnaires and not to dwell too long on any particular item.

It is also useful to identify the benefits for the candidate in completing high quality psychometric measures, as it provides them with a reliable insight into aspects of their own make up, they can then reflect on this. It can provide them with an insight into how others might see them too.

Candidates sometimes overthink their responses to a question and select a poor option for a response. Sometimes they may be suspicious about the motives of the test user and seek to manipulate these responses, hence the value of being open, transparent and encouraging during test administration.

