

INSTRUCTOR CORNER



Tests Are An Important Fire-Rescue Service Tool

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According to the American Psychological Association, "Educational and psychological testing represents one of the most important contributions of behavioral science to our society...the proper use of well-constructed and validated tests provides a better basis for making some important decisions about individuals and programs than would otherwise be available."¹ Three important personnel questions that face the fire-rescue service are: 1) Did we hire the right person? 2) Did the person successfully pass required training courses? 3) Did we promote the right person?

The word "right" is a very subjective term, but tests are supposed to be objective. For many years, the career fire service has used testing to help justify the decision to hire and promote individuals. Both the career and volunteer service have used testing to determine if fire fighters have successfully mastered the knowledge, skills, and abilities necessary to perform the job. What validity and reliability procedures are used by the fire service to insure the effectiveness of their examinations?

Testing will continue to play an important role in personnel selection, promotion, and certification. As the number of entry-level positions are decreasing, the pool of applicants is increasing. Competition for promotion is also increasing as the job is becoming more complex. The American Psychological Association states, "Competent test use can make significant and demonstrable

contributions to productivity and to fair treatment of individuals in employment settings. Among available alternatives, tests are the most valid and the least discriminatory personnel decision aids available."² Tests are tools that the fire service can use to help reduce the subjectivity, biases, and opinionated aspects of the decision-making process.

The quality of decisions based on tests are only as good as the quality of the test in terms of the instrument's validity and reliability. Validity questions ask "What does the test measure?" and reliability questions ask "Is the test consistent?" "Reliability is concerned with the stability of test scores - does not go beyond the test itself. Validity, on the other hand, implies evaluation in terms of outside independent criteria."³

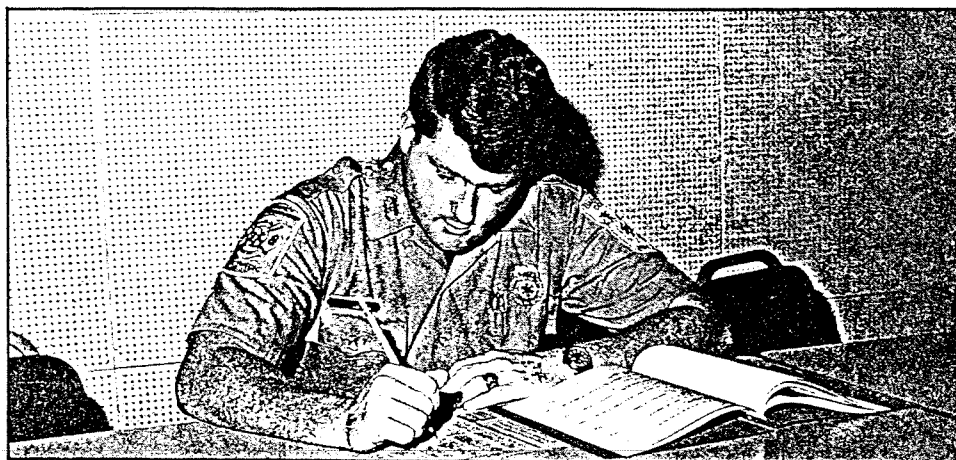
Finally, a test, like a ruler, a scale, or an EKG, measures phenomena. The ability to measure human understanding of the physical and psychological world is directly correlated to the validity and reliability of the instruments used. There is a wealth of knowledge on

test development. The fire service relies heavily on testing as part of its decision-making process. Therefore, we need to apply the available knowledge on testing to our testing instruments so we can answer the questions: 1) Are fire service tests valid and reliable? 2) Will decisions based on testing be the "right" ones? 3) Will we pick the "right" person for the "right" job? These are important question to answer because, at some time, we will all be test developers, test takers, or test result users. Good luck on your next test! ■

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NOTES

- 1 American Psychological Association, Standards for Educational and Psychological Testing. (Washington: American Psychological Association, 1985), 1.
- 2 Ibid, 59
- 3 Henry E. Garrett, Statistics in Psychology and Education. (New York: David McKay Company, 1971), 360.



Test taking in the fire-rescue service can be very stressful. Well-prepared written examinations help eliminate some of this stress. They are a credit to instructors and the organizations they represent. (Photo by Robert Wright)