

George Mason University

College of Education and Human Development

School Psychology Program

SPSY 709 Cognitive Assessment

4 credits (3 class, 1 lab)

fall/2023

Lecture 1:30-4:10 /Tuesdays/ Thompson Hall L003

Lab 1:30-4:10 / Wednesday/Thompson Hall L003

Instructor: Ellen Rowe, Ph.D., NCSP

Email: erowe@gmu.edu

Office location: West 2007 (*I can also meet in Thompson suite, L040 after class or lab and on Zoom anytime)

Office Hours: 4:15-5:15 Tuesdays or by request*

Prerequisites/Corequisites

None

Catalog Description

Introduces school psychology graduate students to issues and methods of cognitive/intellectual assessment. Provides experience in administration, scoring, and interpretation of major, individually-administered child and adult tests of cognitive ability. Examines the development of intelligence tests, theories of intelligence/cognitive abilities, and current trends and developments in cognitive abilities. Notes: Open only to school psychology graduate students.

Course Description

SPSY 709 introduces school psychology graduate students to the issues and methods of cognitive/intellectual assessment. This course will provide information on the scholarly aspects of cognitive abilities and assessment, as well as on the practice-oriented aspects. Students are expected to acquire both a fundamental knowledge of cognitive assessment and the specific assessment skills that are used by practicing psychologists.

Course Delivery Method

This course will be delivered using a lecture and lab format.

Learner Outcomes or Objectives

This course is designed to enable students to do the following:

1. Identify key professional issues relating to assessment, for example, historical developments, test bias, and test misuse.
2. Demonstrate an understanding of test derived scores and their proper interpretation.
3. Correctly administer, score, and interpret several major cognitive assessment measures (WISC V, WAIS IV, WJ IV Cog, Stanford-Binet V, KABC-II; DAS-II) and an achievement measure (e.g., K-TEA-III or WIAT-4).
4. Exhibit acceptable interpersonal skills when evaluating clients and adhere to accepted practice and ethical standards.
5. Use research and theory to interpret test scores within the constraints of the existing scientific literature on test inference validity.
6. Effectively communicate, orally and in writing, the results of a cognitive evaluation.

Professional Standards

This course contributes to the development of knowledge and skills in the following National Association of School Psychologists (NASP) professional standards:

Domain 1: Data-Based Decision Making

Required Texts

Kranzler, J.H. & Floyd, R.G. (2020). *Assessing intelligence in children and adolescents: A practical guide* (2nd ed.). Rowman & Littlefield.

Test Manuals (all can be borrowed from CAP or CPS test kits)

Elliot, C. (2006). *Differential Ability Scales-II handbook*. Pearson.

Kaufman, N. L. (2004). *Kaufman Assessment Battery for Children, Second Edition manual*. AGS.

Kaufman, A. S., & Kaufman, N. L. (2014). *Kaufman Test of Educational Achievement, Third Edition administration manual*. Pearson.

Mather, N., & Wendling, B. J. (2014). *Woodcock-Johnson IV Tests of Cognitive Abilities examiner's manual*. Riverside Publishing.

Roid, G. H. (2003). *Stanford-Binet Intelligence Scales, Fifth Edition, technical manual*. Riverside Publishing.

Wechsler, D. (2020). *Wechsler Individual Achievement Intelligence Test-Fourth Edition (WIAT-IV)*. Pearson.

Wechsler, D. (2014). *Manual for the Wechsler Intelligence Scale for Children-Fifth Edition (WISC-V)*. Pearson.

Wechsler, D. (2008). *Wechsler Adult Intelligence Scale-Fourth Edition (WAIS-IV) technical and interpretive manual*. Pearson.

Wechsler, D., & Naglieri, J. A. (2006). *Wechsler Nonverbal Scale of Ability, administration and scoring manual*. San Antonio, TX: The Psychological Corporation.

Relevant Readings

American Educational Research Association (AERA), American Psychological Association (APA), & National Council on Measurement in Education (NCME) (2014). *Standards for Educational and Psychological Testing*. Washington, DC: AERA.

Bain, S. K. & Allin, J. D. (2005). Review of the Stanford-Binet Intelligence Scales, Fifth Edition. *Journal of Psychoeducational Assessment*, 23, 87-95.

Bain, S. K. & Gray, R. (2008). Test reviews: Kaufman Assessment Battery for Children. *Journal of Psychoeducational Assessment*, 26, 92-101.

Barber, N. (2005). Educational and ecological correlates of IQ: A cross-national investigation. *Intelligence*, 33, 273-284.

Beaujean, A. & Benson, N. F. (2019). The one and the many: Enduring legacies of Spearman and Thurston on intelligence test score interpretation. *Applied Measurement in Education*, 32(3), 198-215. <https://doi-org.mutex.gmu.edu/10.1080/08957347.2019.1619560>

Beaujean, A. & Phipps, L. (2016). Review of the pattern of strengths and weaknesses approach in specific learning disability identification. *Research and Practice in the Schools*, 4, 18-28.

Benson, N. F., Beaujean, A. A., McGill, R. J., & Dombrowski, S. C. (2018). Revisiting Carroll's survey of factor-analytic studies: Implications for the clinical assessment of intelligence. *Psychological Assessment*, 30(8), 1028-1038. <http://dx.doi.org.mutex.gmu.edu/10.1037/pas0000556>

- Burns, M. K., Petersen-Brown, S., Haegele, K., Rodriguez, M., Schmitt, B., Cooper, M., . . . VanDerHeyden, A. M. (2016). Meta-analysis of academic interventions derived from neuropsychological data. *School Psychology Quarterly*, 31(1), 28-42. <http://dx.doi.org.mutex.gmu.edu/10.1037/spq0000117>
- Canivez, G. L. (2008). Orthogonal higher order factor structure of the Stanford-Binet Intelligence Scales--fifth edition for children and adolescents. *School Psychology Quarterly*, 23(4), 533-541.
- Flanagan, D. P., & Schneider, W. J. (2016). Cross-Battery Assessment? XBA PSW? A case of mistaken identity: A commentary on Kranzler and colleagues' "Classification agreement analysis of Cross-Battery Assessment in the identification of specific learning disorders in children and youth. *International Journal of School and Educational Psychology*, 4(3), 137-145.
- Fletcher, J. M., & Miciak, J. (2017). Comprehensive cognitive assessments are not necessary for the identification and treatment of learning disabilities. *Archives of Clinical Neuropsychology*, 32(1), 2-7. <http://dx.doi.org.mutex.gmu.edu/10.1093/arclin/acw103>
- Dombrowski, S. C., Canivez, G. L., & Watkins, M. W. (2018). Factor structure of the 10 WISC-V primary subtests across four standardization age groups. *Contemporary School Psychology*, 22(1), 90-104. <http://dx.doi.org.mutex.gmu.edu/10.1007/s40688-017-0125-2>
- Gladwell, M. (2007). What I.Q. doesn't tell you about race. *The New Yorker*, 92-96
- Kranzler, J. H., Floyd, R. G., Benson, N., Zaboski, B., & Thibodaux, L. (2016a). Classification agreement analysis of cross battery assessment in the identification of specific learning disorders in children and youth, *International Journal of School & Educational Psychology*, 4(3), 124-136.
- Kranzler, J. H., Floyd, R. G., Benson, N., Zaboski, B., & Thibodaux, L. (2016b). Cross-Battery Assessment pattern of strengths and weaknesses approach to the identification of specific learning disorders: Evidence-based practice or pseudoscience? *International Journal of School & Educational Psychology*, 4 (3), 146-157.
- Lilienfeld, S. O., Ammirati, R., & David, M. (2012). Distinguishing science from pseudoscience in school psychology: Science and scientific thinking as safeguard against human error. *Journal of School Psychology*, 50, 7-36.
- Marshall, S., McGoey, K. E., & Moschos, S. (2011). Review of Differential ability scales-second edition. *Journal of Psychoeducational Assessment*, 29, 89-93.
- National Association of School Psychologists. (2022). *Identification of Children with Specific Learning Disabilities*. [Position statement]. <https://www.nasponline.org/research-and-policy/policy-priorities/position-statements>
- National Association of School Psychologists, Professional Standards Revision Committee (2000). *Principles for professional ethics*. Available at <http://www.nasponline.org/pdf/ProfessionalCond.pdf>
- McGill, R. J., Dombrowski, S. C., & Canivez, G. L. (2018). Cognitive profile analysis in school psychology: History, issues, and continued concerns. *Journal of School Psychology*, 71, 108-121.
- Neisser, U., Boodoo, G., Bouchard, T. J., et al. (1996). Intelligence: Knowns and unknowns. *American Psychologist*, 51, 77-101.
- Nisbett, R. E., Aronson, J., Blair, C., Dickens, W., Flynn, J., Halpern, D. F., & Turkheimer, E. (2012). Intelligence: New findings and theoretical developments. *American Psychologist*, 67, 130-159.
- Reynolds, M. R., & Keith, T. Z. (2017). Multi-group and hierarchical confirmatory factor analysis of the Wechsler Intelligence Scale for Children—Fifth edition: What does it measure? *Intelligence*, 62, 31-47. <http://dx.doi.org.mutex.gmu.edu/10.1016/j.intell.2017.02.005>

Additional relevant readings may be assigned throughout the semester.

Course Performance Evaluation

Students are expected to submit all assignments on time in the manner outlined by the instructor.

Assignments for lab and lecture topics are shown in the course out-line. The materials are to be read before the designated lecture.

In order to develop mastery of standardized test administration procedures, you will be administering the tests to volunteers to whom you have access. Over the course of the tests you administer, 2 must be with children or adolescents. The test interactions in this course are for learning purposes only. Test results are not considered valid and may not be communicated in any form to any individual or organization, nor may they be used as research data. All data collected and submitted must be non-identifiable to preserve confidentiality. Tests administered within the context of this course may not be used for any purpose other than learning to administer, score and interpret the assessment instruments. Any breach of this policy, or falsification of data, will result in immediate failure.

Attendance and Participation: Students are expected to attend class and participate in the discussions and activities. Classroom participation involves sharing information and ideas, contributing to a positive and enthusiastic class atmosphere through asking questions and volunteering ideas. Please bring relevant materials to class regularly.

You are responsible for all information from each class and lab meeting. If you miss a class, you should borrow notes from a classmate. You are also responsible for turning in assignments on the date due, even if you are not in class.

Grading: The percentage of the final grade contributed by each of the seven requirements is as follows:

Midterm examination	100 points
Final examination	100 points
Reading requirements/Class participation/Class Presentation	60 points
7 graded test protocols	140 points (20 each*)
1 Psychological report	100 points*
Total Points Possible	500

*Students may submit additional record forms or reports if they are not satisfied with their grade. Students will be asked to redo assessments if basic proficiency is not demonstrated (basic proficiency = grade of B or better).

You are asked to turn in a WISC administration video with a child on November 1. Detailed feedback on the video with points deducted for errors will be provided over winter break. Students must obtain a grade of B or better to progress to SPSY 750 (Cognitive Assessment Practicum). If a student does not earn a B or higher, the student will be given options for a redo (another video of administration; administration of certain subtests to the instructor, etc.). Please note that the video grade does not count toward your final grade in SPSY 709.

N.B. If your class grade is within a borderline range, class and lab participation may be weighed more heavily in your favor. Additionally, improvements in performance will be taken into consideration

Grading Scale (Please note: A course grade less than B- requires that you retake the course. A grade of “F” does not meet requirements of the Graduate School of Education. Students must maintain a minimum GPA of 3.0 [B average] to remain in good academic standing.)

The final grade will be determined on the following scale:

- A = 93 - 100% (462.5 – 500)
- A- = 90 - 92% (447.5 – 462)
- B+ = 88 – 89% (437.5 - 447)
- B = 83 – 87% (412.5 – 437)
- B- = 80 - 82% (397.5 – 412)
- C = 70 - 79% (347.5 – 397)
- F = Less than 60%

All assignments must be completed by their due dates. Grade deductions may occur for assignments not turned in by the date due.

Class Schedule

Class #		Readings/Assignments	Lab
1 (8/22)	Goals & History	Wasserman in Flanagan & Harrison, Chapter 1(Blackboard) listen: https://hiddenbrain.org/podcast/why-youre-smarter-than-you-think/ Skim article: Lilienfeld et al. 2012.	Assessment procedures & consent; Demonstration of WISC-V test administration.
2 (8/29)	Research & Measurement	Kranzler & Floyd, Ch. 2; Intelligence: Knowns and unknowns (Neisser et al., 1996); Intelligence: New findings and theoretical developments (Nisbett et al., 2012); Kranzler & Floyd, Ch. 4; Skim Validity & Reliability chapters (1&2) from <i>Standards</i> (Blackboard) Read in order listed	Read WISC-V Manual; Administration and Scoring of WISC-V
3 (9/5)	Theory	Kranzler & Floyd Chapter 1; Schneider & McGrew, Ch 4, Cattell-Horn_Carroll Model of Intelligence, pp. 99-105 to Gf-Gc Assessment (Blackboard); Gf-Gc Assessment; Alfonso, Flanagan, & Radwan in Flanagan & Harrison, Chapter 9 pages 185 – 198 to Impact of CHC Theory... (Blackboard) Read in this order	Administration and Scoring of WISC-V
4 (9/12)	Wechsler Tests (WISC-V/WAIS-IV/WPPSI-IV)	Kranzler & Floyd, Ch 6 & pp. 184-186; Dombrowski, Canivez, & Watkins (2018); Reynolds & Keith (2017). Dr. Wechsler Remembered (Blackboard)	Read WAIS-IV Manual; Administration and Scoring of WAIS-IV; 1st WISC-V Protocol due to TAs.
5 (9/19)	Standards & Ethics; Assessment	Kranzler & Floyd, Chs. 3 & 5	Administration and Scoring of WPPSI-IV

	Process, Practice Issues		
6 (9/26)	Culture and Bias/ Nonverbal Measures	Kranzler & Floyd, Ch; 14 Gladwell (2007) (Blackboard); Barber (2005). Fairness in Testing Chapter (3) from <i>Standards</i> (Blackboard)	Review WNV Manual; Administration and Scoring of Wechsler Nonverbal Scale of Ability & Questions about administration and scoring for WISC & WAIS
7 (10/3)	Stanford-Binet Intelligence Scales, Fifth Edition (SBV)	Kranzler & Floyd, Ch. 7, pp. 170-172; Bain & Allin (2005); Canivez (2008)	Administration and Scoring of SBV. Questions about administration and scoring for WISC & WAIS; 2nd WISC-V Protocol due to TAs.
8 (10/10)		No Tuesday classes this week; Indigenous Peoples Day work on take home midterm	Administration and Scoring of SBV if needed, but WAIS-IV Protocol due to TAs even if no lab
9 (10/17)	In Class MIDTERM	In Class MIDTERM	No Lab this week
10 (10/24)	Woodcock Johnson IV Tests of Cognitive Ability (WJ IV COG)	NASP Position Paper on SLD Identification (2022); Kranzler & Floyd, pp. 177-180; Beaujean & Phipps. (2016). Kranzler et al. (2016a); Flanagan & Schneider (2016); Kranzler et al. (2016b) read articles in order	Read WJ IV COG Administration Manual; Administration and Scoring of WJ IV COG; Stanford Binet Protocol due to TAs
11 (10/31)	Interpretation and Report writing	Kranzler & Floyd, Chs. 8 & 10; McGill, Dombrowski, & Canivez (2018); Benson, Beaujean, McGill, & Dombrowski (2018); Beaujean & Benson (2019) read articles in order	Read DAS-II Manual; Administration and Scoring of DAS-II; WISC-IV Assessment recording due
12 (11/7)	Differential Ability Scales (DAS)	Marshall, McGoey, & Moschos (2011); Kranzler & Floyd, pp 162-165;	Administration and Scoring of DAS-II, cont.; WJ IV COG Protocol due

13 (11/14)	Kaufman Test (KABC-II)	Bain & Gray (2008); Kranzler & Floyd, pp 165-168. WISC-IV Report due	Read KABC-II Manual; Administration and Scoring of KABC-II
14 (11/21)		NO CLASS Thanksgiving Listen Over Break: https://www.youtube.com/watch?v=HREILRMLMA School Psyched Podcast, #60 Ryan McGill on Cognitive Scatter	No Lab Thanksgiving! DAS-II Protocol due
15 (11/28)	Assessment of Academic Achievement & Cognitive Assessment, do we need it?	Kranzler & Floyd, Ch. 9; Burns et al. (2016); Fletcher & Miciak (2017) read in order	Intro to WIAT-4 or KTEA-II; Administration and Scoring of Achievement Tests (KTEA-II or WIAT-4); KABC-II Record Form due; Achievement Record Form review in class
12/12	Take Home Exam Due: 4:10 pm	You are welcome (!) to submit your final early 😊	

Professional Dispositions

See <https://cehd.gmu.edu/students/policies-procedures/>

Core Values Commitment

The College of Education and Human Development is committed to collaboration, ethical leadership, innovation, research-based practice, and social justice. Students are expected to adhere to these principles: <http://cehd.gmu.edu/values/>.

GMU Policies and Resources for Students

Policies

- Students must adhere to the guidelines of the Mason Honor Code <https://catalog.gmu.edu/policies/honor-code-system/>
- Students must follow the university policy for Responsible Use of Computing (see <http://universitypolicy.gmu.edu/policies/responsible-use-of-computing/>).
- Students are responsible for the content of university communications sent to their Mason email account and are required to activate their account and check it regularly. All communication from the university, college, school, and program will be sent to students **solely** through their Mason email account.

- Students with disabilities who seek accommodations in a course must be registered with George Mason University Disability Services. Approved accommodations will begin at the time the written letter from Disability Services is received by the instructor (see <http://ods.gmu.edu/>).
- Students must follow the university policy stating that all sound emitting devices shall be silenced during class unless otherwise authorized by the instructor.

Campus Resources

- Support for submission of assignments to Tk20 should be directed to tk20help@gmu.edu or <https://cehd.gmu.edu/aero/tk20>. Questions or concerns regarding use of Blackboard should be directed to <http://coursesupport.gmu.edu/>.
- For information on student support resources on campus, see <https://ctfe.gmu.edu/teaching/student-support-resources-on-campus>

For additional information on the College of Education and Human Development, please visit our website <https://cehd.gmu.edu/students/> .

SPSY 709 Lab Policies and Procedures

Requirements: As part of the class requirements, you are expected to administer 7 cognitive tests and review 1 achievement test. At least 2 of the assessments must be with children (one of the child assessments must be a WISC-V). Completed protocols for the tests will be turned into your Teaching Assistants (TAs). Your AMAZING TAs are Nick Ross (nross8@gmu.edu); Sofie Therkelsen (stherkel@gmu.edu); and Maggie Tremble (mtremble@gmu.edu).

You will also be asked to turn in a video of your child WISC-V assessment. The tapes will be given to me. A report summarizing the assessment findings for your child WISC-V is to be turned in to me. Examples will be provided.

Practice Tests: If you have or know children/adolescents, please try to share with your cohort members who do not. I can provide incentives (money, gift certificates, etc.) for “volunteer” children/adolescents

Examinees or their parents must be told *from the beginning* that they will be given NO feedback regarding their results. Because you are in training, the tests you administer are not reliable or valid.

Volunteers over 18 must sign a consent form. Children must have a consent form signed by a parent. Test protocols without a signed consent form will NOT be accepted. Parents should be given an unsigned copy of the consent form with the name of the test at the top. That way, they have a record of the test administered.

Test record forms, reports, and all information about examinees are confidential. Protocols and reports should be identified with a number or pseudo name such as volunteer 1, Ironman Avenger, or Widow Avenger. Leave materials for the TA or me *in envelopes* (although the results are not valid, confidential information must be handled privately) in our mailboxes on Democracy.

Grading of Response Sheets: All examinee and examiner responses are to be recorded on the response sheet. Grading will be as follows:

- Minor Errors (-.5 points) include: Failure to query/clarify a response that should be queried. Scoring errors that involve judgment of a response.
- Moderate Errors (-1 point) are scoring errors likely to result in an incorrect score on one subtest (i.e. incorrect ceiling or basal rules on one subtest or minor addition mistake on one subtest).
- Major Errors (-2 points) are errors that result in systematic scoring problems for the entire test or a scale (i.e. use of incorrect tables for scoring; miscalculations of a child’s age that results in use of incorrect table; and incorrect addition on front sheet of record form).
- N.B. If you make an administration error that affects the accuracy of the scoring (i.e. didn’t query; terminated a subtest too quickly) and you recognize your mistake, you can note the error on the record form, and your recognition of the error will reduce the points deducted by half.

Questions: Please feel free to come to your TA or me with questions about administration and scoring. When we give an answer, just mark it on the record form. Also, feel free to have other students check your work.