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Assessing Mental Retardation in Death Penalty Cases: Critical Issues for Psychology and Psychological Practice

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In 2002, the United States Supreme Court decided the *Atkins* case, which held that mentally retarded defendants could not be executed. The opinion gave no guidance on the definition of mental retardation, preferring to leave to individual states the task of determining not only the definition of mental retardation but also the assessment procedures to be used in making the diagnosis. This lack of guidance has resulted in many issues, including varying definitions of what constitutes mental retardation across states, use of different assessment procedures to make the determination that a person has mental retardation, and numerous psychometric concerns regarding the provision of psychological assessment services to the courts in capital cases that involve a defendant who may have mental retardation. This article examines these latter issues in detail from both psychological and legal perspectives and makes recommendations for practicing psychologists.

Keywords: mental retardation, death penalty, assessment

In 2002, the United States Supreme Court reversed a 15-year-old line of cases by deciding *Atkins v. Virginia*. Daryl Atkins had petitioned the Supreme Court to review his sentence and claimed he could not be executed because he had mental retardation. Atkins claimed that his Eighth Amendment right to be free from cruel and unusual punishment was being violated under the United States Constitution. Approximately 15 years earlier the court ruled that the execution of people with mental retardation was constitutional in *Penry v. Lynaugh* (1989).

In determining which punishments are in fact "cruel and unusual," the Supreme Court typically reviews national and state practices and trends. In the *Atkins* case, Justice John Paul Stevens wrote the 5–4 opinion. He found that between 1989 and 2002, the number of states barring the execution of persons with mental retardation increased from 2 to 18, in addition to 12 states that prohibited capital punishment altogether (*Atkins v. Virginia*, 2002). Justice Stevens wrote that the large number of states prohibiting the execution of people with mental retardation, in addition to "the complete absence of States passing legislation reinstating the power to conduct such executions provides powerful evidence that today our society views mentally retarded offenders as categorically less culpable than the average criminal" (pp. 315–316). Importantly, Justice Stevens stated,

> To the extent there is serious disagreement about the execution of mentally retarded offenders, it is in determining which offenders are in fact retarded. . . . Not all people who claim to be mentally retarded will be so impaired as to fall within the range of mentally retarded offenders about whom there is a national consensus. (p. 317)

The *Atkins* decision, therefore, barred the execution of individuals having mental retardation if the individuals were "so impaired as to fall within the range of mentally retarded offenders about whom there is a national consensus" (*Atkins v. Virginia*, 2002, p. 317). But the decision did not define mental retardation or any terms or procedures that could guide legislatures or judges in determining which defendants fell into this category. Instead, *Atkins* left to the individual states the task of drafting legislation to comply with the ruling.

State legislatures that previously lacked statutes prohibiting the execution of mentally retarded persons have worked to pass new laws in accordance with the *Atkins* decision. This has resulted in 10 new relevant state statutes. Not all death penalty states have enacted statutes, however, primarily because of disagreements over two problems: (a) the definition of mental retardation and (b) the legal and psychological assessment procedures to be specified to determine whether a defendant has mental retardation ("Oklahoma Senate," 2006; "Our Turn," 2006; Rawls, 2005). These

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issues facing state legislatures are the same ones that affect both psychology and psychological practices for those psychologists who provide services in this area. In addition, psychologists could face ethical dilemmas if legal definitions of mental retardation and the mandated assessment procedures are inconsistent with the ethics code of the American Psychological Association (APA, 2002).

The *Atkins* opinion recognizes two different clinical definitions of mental retardation: (a) the 1992 formulation published by the American Association on Mental Retardation (AAMR) and (b) the 2000 definition published by the American Psychiatric Association in the *Diagnostic and Statistical Manual of Mental Disorders* (4th ed., text rev.; 2000). The 1992 AAMR mental retardation definition requires substantial limitations in present functioning "characterized by significantly sub-average intellectual functioning, existing concurrently with related limitations in two or more of the following applicable adaptive skill areas: communication, self-care, home living, social skills, community use, self-direction, health and safety, functional academics, leisure and work." Further, mental retardation must manifest before age 18 (*Atkins v. Virginia*, 2002, p. 308, n. 3). The American Psychiatric Association formulation is as follows:

> The essential feature of mental retardation is significantly sub-average general intellectual functioning (Criterion A) that is accompanied by significant limitations in adaptive functioning in at least two of the following skill areas: communication, self-care, home living, social/interpersonal skills, use of community resources, self-direction, functional academic skills, work, leisure, health, and safety (Criterion B). The onset must occur before age 18 years (Criterion C). (American Psychiatric Association, 2000, p. 41)

Psychologists and other mental health providers typically use the term *mild mental retardation* to describe people who have a full-scale IQ score of between 50–55 and approximately 70 and who have concurrent "related" or "significant" limitations in two or more adaptive skills areas, with onset being before age 18 and the psychological assessment being conducted under culturally fair conditions (Ellis, 2002; Luckasson et al., 2002; Morris, Morris, & Bade White, 2005). In 2002, the AAMR made a minor change in the 1992 definition that refined the adaptive skills component, which is currently expressed as conceptual, social, and practical adaptive skills (AAMR, 2002; Kanaya, Scullin, & Ceci, 2003).

The adaptive behavior limitation requirement necessitates an examination of the individual's mastery of the skills people use in everyday tasks, such as using the telephone, preparing food, and identifying problems (Luckasson et al., 2002). One disadvantage of many of the adaptive behavior instruments is their reliance on third-party ratings, which introduces a potential for bias and inaccuracy (Yalon-Chamovitz & Greenspan, 2005). Because most state statutes provide no guidance regarding assessment of adaptive behavior, practitioners must rely on clinical judgment to make the assessment. For example, they could interview caregivers, prison personnel, and the defendant's family for information about how the person was functioning. Although there may be concerns that interviews with a defendant's family could result in an artificial inflation of a defendant's historical deficits, the age of onset requirement would have to be proven by historical educational and other records, which could not be easily manufactured (Ellis, 2002; Mossman, 2003). Malingering also concerned *Atkins* dissenter Justice Antonin Scalia (*Atkins v. Virginia*, 2002, p. 353), but this seems to be a minimal risk because of the evidence required to prove the age of onset. The Mississippi Supreme Court, however, has tried to guard against claims of malingering by ruling that all defendants who claim to have mental retardation must take the Minnesota Multiphasic Personality Inventory–II to show he or she is not malingering (*Chase v. Mississippi*, 2004).

The federal government and 38 states currently permit the execution of defendants found guilty of capital crimes. According to *Atkins*, prior to its decision 19 states—Arizona, Arkansas, Colorado, Connecticut, Florida, Georgia, Indiana, Kansas, Kentucky, Maryland, Missouri, Nebraska, New Mexico, New York, North Carolina, South Dakota, Tennessee, Texas, and Washington (see specific state statutes in the Reference List)—as well as the federal government had enacted statutes prohibiting the execution of persons meeting a statutory definition of "mentally retarded" (*Atkins*, 2002). Although the *Atkins* decision incorrectly listed Texas as having a statute barring execution of people with mental retardation, in fact, there still is not a statute. However, since the publication of the *Atkins* decision, an additional 10 states have enacted such statutes. In addition, 11 states that permit imposition of the death penalty still lack any express statutory bar to the execution of a person having mental retardation. These states are Alabama, Mississippi, Montana, New Hampshire, Ohio, Oklahoma, Oregon, Pennsylvania, South Carolina, Texas, and Wyoming ("Oklahoma Senate," 2006; "Our Turn," 2006; Rawls, 2005).

Faced with a death penalty case in which a defendant claimed mental retardation in the absence of a statute, *Atkins* compelled the Texas Court of Appeals to make its own definition of mental retardation, and it chose the 1992 AAMR definition (*Ex Parte Briseno*, 2004). Courts in other states that still lack governing statutes have created their own definitions and procedures as well. For example, in Oklahoma, the Criminal Appeals Court defined the first criterion for mental retardation as "significantly subaverage intellectual level that substantially limits [the defendant's] ability to understand and process information, to communicate, to learn from experience or mistakes, to engage in logical reasoning, to control impulses, and to understand the reactions of others" (*Murphy v. State*, 2002, p. 568). The court uses the American Psychiatric Association's (2000) definition of the adaptive functioning requirement.

The *Atkins* decision recognizes that mental retardation is a clinical concept and that the contours of the class of constitutionally protected persons who have mental retardation must therefore bear some relationship to a clinically accepted definition of mental retardation (*Atkins*, 2002). Yet, the Supreme Court declined to choose a particular definition or to specify how the definition should be used to identify the "protected class" of persons. State statutes that address the definition of and procedures for determining whether a person has mental retardation are summarized in Table 1. Each state that has passed a mental retardation exemption statute is listed in this table along with its definition, as well as whether the state imposes cutoff scores, if the state requires the administration of assessments during the prosecution and whether it includes any extraordinary provisions of which psychologists should be aware. In addition, the table lists in italic type any significant differences between a state's definition of mental retardation and the definition used by either the American Psychiatric Association or AAMR. The most common statutory deviation

Table 1
Summary of Existing Statutory Definitions of Mental Retardation for Death Penalty Cases, Related Strict Cutoff Scores, Mandated Assessments

State	Statutory definitions across states; provisions for strict cutoff scores; number of mandated assessments
Arizona	Definition: "significantly subaverage general intellectual functioning, existing concurrently with significant impairment in adaptive behavior, where the onset of the foregoing conditions occurred before the defendant reached the age of eighteen" Strict cutoff score used: any score over 70 on a new assessment disqualifies as mental retardation Number of new assessments required: up to four within 68–90 days
Arkansas	Definition: "[s]ignificantly sub-average general intellectual functioning accompanied by significant deficits or impairments in adaptive functioning manifest in the developmental period, but no later than age eighteen"
California	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior and manifested before the age of 18"
Colorado	Definition: "significantly subaverage general intellectual functioning existing concurrently with substantial deficits in adaptive behavior and manifested and *documented* during the developmental period. *The requirement for documentation may be excused by the court upon a finding that extraordinary circumstances exist*" Number of new assessments required: one or more
Connecticut	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior and manifested during the . . . period of time between birth and the eighteenth birthday" Strict cutoff score used: "significantly subaverage" defined as IQ "more than two standard deviations below the mean" (i.e., score of 69 or lower)
Delaware	Definition: "significantly subaverage level of intellectual functioning; . . . adaptive behavior is substantially impaired; [both] conditions . . . existed before . . . 18 years of age" Strict cutoff score used: "significantly subaverage" defined as IQ of 70 or below Number of new assessments required: one
Florida	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior and manifested during the period *from conception* to age 18" Strict cutoff score used: "significantly subaverage" defined as "performance that is two or more standard deviations from the mean" (i.e., score of 70 or lower) Number of new assessments required: two
Georgia	Definition: "significantly subaverage general intellectual functioning resulting in or associated with impairments in adaptive behavior which manifested during the developmental period"
Idaho	Definition: "significantly subaverage general intellectual functioning that is accompanied by significant limitations in adaptive functioning in at least two (2) of the following skill areas: [10 areas specified]. The onset of significant subaverage general intelligence functioning and significant limitations in adaptive functioning must occur before age eighteen (18) years" Strict cutoff: "significantly subaverage" defined as IQ of 70 or below Number of new assessments required: at least one ("upon request, the court shall order that the state's experts shall have access to the defendant [to] conduct an examination")
Illinois	Definition: "the mental retardation must have manifested itself by the age of 18. [A] *low IQ* must be accompanied by significant deficits in adaptive behavior in at least 2 of the following skill areas: [nine areas specified]"[a]
Indiana	Definition: "*before becoming twenty-two (22) years of age,* [defendant] manifests: (1) significantly sub-average intellectual functioning; and (2) substantial impairment of adaptive behavior; that is documented in a court ordered evaluative report" Number of new assessments required: one
Kansas	Definition: "significantly sub-average general intellectual functioning . . . *to an extent which substantially impairs one's capacity to appreciate the criminality of one's conduct or to conform one's conduct to the requirements of law*"[b] Strict cutoff score used: "significantly subaverage" defined as "performance which is two or more standard deviations from the mean" (i.e., score of 70 or lower) Number of new assessments required: two
Kentucky	Definition: "significant sub-average intellectual functioning existing concurrently with substantial deficits in adaptive behavior and manifested during the developmental period" Strict cutoff score used: "significantly subaverage" defined as IQ of 70 or below[c]
Louisiana	Definition: "significant limitations in both intellectual functioning and adaptive behavior as expressed in conceptual, social, and practical adaptive skills. The onset must occur before the age of eighteen years" Number of new assessments required: one ("state shall have a right to an independent psychological and psychiatric exam of the defendant")
Maryland	Definition: "significantly below average intellectual functioning, as shown by an intelligence quotient of 70 or below on an individually administered intelligence quotient test and an impairment in adaptive behavior; and . . . the mental retardation was manifested *before the age of 22 years*" Strict cutoff score used: "significantly below average" must be shown by IQ of 70 or below
Missouri	Definition: "significantly subaverage intellectual functioning with *continual extensive* related deficits and limitations in two or more adaptive behaviors [10 example behaviors cited], which conditions are manifested and documented before eighteen years of age"
Nebraska	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior"
Nevada	Definition: "significant subaverage general intellectual functioning which exists concurrently with deficits in adaptive behavior and manifested during the developmental period" Number of new assessments required: one "by an expert selected by the prosecution"
New Mexico	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior"
New York	Definition: "significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior which were manifested before the age of eighteen"
North Carolina	Definition: "significantly subaverage general intellectual functioning, existing concurrently with significant limitations in adaptive functioning, both of which were manifested before the age of 18"

Table 1 (*continued*)

State	Statutory definitions across states; provisions for strict cutoff scores; number of mandated assessments
South Dakota	Definition: "significant subaverage general intellectual functioning existing concurrently with substantial related deficits in applicable adaptive skill areas" with mental retardation "manifested and *documented before* the age of eighteen years"
Tennessee	Definition: "significantly subaverage general intellectual functioning as evidenced by a functional intelligence quotient (I.Q.) of seventy (70) or below; [d]eficits in adaptive behavior; and [t]he mental retardation must have been manifested during the developmental period, or by eighteen (18) years of age"
	Strict cutoff score used: "significantly subaverage" must be evidenced by IQ of 70 or below[c]
Utah	Definition: "significant subaverage general intellectual functioning that results in and exists concurrently with significant deficiencies in adaptive functioning *that exist primarily in the areas of reasoning or impulse control, or in both of these areas;* and . . . the subaverage general intellectual functioning and the significant deficiencies in adaptive functioning . . . are both manifested *prior to age 22*"[d]
	Number of new assessments required: at least two
Virginia	Definition: "significantly subaverage intellectual functioning as demonstrated by performance on a standardized measure of intellectual functioning administered in conformity with accepted professional practice, that is at least two standard deviations below the mean and . . . significant limitations in adaptive behavior as expressed in conceptual, social and practical adaptive skills"
	Strict cutoff: "significantly subaverage" defined as IQ "that is at least two standard deviations below the mean" (i.e., score of 70 or lower)
Washington	Definition: "significantly subaverage general intellectual functioning; . . . existing concurrently with deficits in adaptive behavior; and . . . both were manifested during the developmental period"
	Strict cutoff score used: "significantly subaverage" defined as IQ of 70 or below
	Number of new assessments required: one

Note. The term *strict cutoff* score refers to language in a statute that appears to make it impossible to meet the definition of mental retardation once evidence of an IQ score above a certain number has been presented (e.g., 69 or 70). The term *mandated assessments* refers to statutory requirements that a defendant claiming mental retardation be subjected to one or more mandatory IQ assessments in the course of the prosecution itself, irrespective of whether the defendant has been previously tested. Any significant differences between a state's definition of mental retardation and the definition by the American Psychiatric Association (2000) or American Association of Mental Retardation (2002) are listed in italics. (Refer to the References for individual state statutes.)

[a] The term "low IQ" is not defined in the statute.

[b] This statute enacts a definition of mental retardation for purposes of the death penalty that is divergent from the clinical definitions because of an added requirement that the defendant's subaverage general intellectual functioning be sufficient to "substantially [impair] one's capacity to appreciate the criminality of one's conduct or to conform one's conduct to the requirements of the law." As of March 2006, no published judicial opinion addresses these matters.

[c] The courts of both Kentucky and Tennessee have interpreted their state's statutes to impose a cutoff score so strict as to bar presentation of evidence showing that an IQ score above 70 on a properly administered assessment could be influenced by a standard error of measurement, practice effects, or the Flynn effect (*Bowling v. Kentucky,* 2005, p. 458; *Howell v. Tennessee,* 2004, p. 375).

[d] The Utah statute enacts a single statutory definition of mental retardation for purposes of the death penalty, but it actually exempts two classes of persons who meet both a liberalized (in the sense that it increases the age of onset to age 22) clinical definition of mental retardation *plus* one additional condition. Under the strict statutory definition, Utah exempts persons who meet the liberalized clinical definition, *provided* that the adaptive functioning deficits "exist primarily in the areas of reasoning or impulse control, or . . . both." But the Utah statute also exempts persons who meet the liberalized clinical definition *without proof* that the adaptive functioning deficits are concentrated in "areas of reasoning or impulse control," *provided* that "the state intends to introduce into evidence a confession by the defendant that is not supported by substantial evidence independent of the confession."

from the definitions of mental retardation listed in the table is the promulgation of a specific cutoff IQ score. For example, many statutes appear to provide that an IQ score above 70 (or in Connecticut, above 69) would alone defeat a defendant's claim that mental retardation exempts him or her from eligibility for the death penalty. These legislated cutoff scores directly conflict with American Psychiatric Association and AAMR definitions, which permit IQ scores of 70 to 75 as indicative of sufficiently subaverage intellectual functioning (Luckasson et al., 2002). Mossman (2003) explained that the use of a "70" IQ score as a cutoff score reflects a statistical convention rather than a natural boundary and that using precise cutoffs mistakenly suggests that a 1-point difference in two people's scores reflects a significant difference in their cognitive capacities. However, case law interpreting the cutoff scores has generally not taken into account the vital clinical concerns about the standard error of measurement issues, practice effects, and the Flynn effect analysis below (see Table 1, note c).

Assessment of Mental Retardation in Death Penalty Cases

In addition to permitting states to craft their own definition of mental retardation, *Atkins* also allowed states to set forth the procedures to be followed in determining if a person had mental retardation—including choosing the assessment tools to be used, to specify the nature of the psychological assessment process, and to detail who could perform the assessment. In this regard, four states (Arizona, California, Nevada, and Virginia—see specific state statutes in the Reference List) have specifically set forth the procedures for conducting a psychological or clinical assessment, whereas in each of the remaining states the procedure is determined on an ad hoc basis by the judge presiding over the defendant's case. In Arizona, for example, if the state files a notice of intent to seek the death penalty, the court appoints a "prescreening psychological expert" to determine the defendant's IQ. If the prescreening expert finds that the defendant's IQ is higher than 75, the judge must rule that the defendant does not have mental retardation and the case continues (Ariz. Rev. Stat. § 13-703.02[B]

and [C]). This prescreening expert is then excused from any further involvement. If, however, the prescreening expert determines that the defendant's IQ is 75 or less, then the trial court appoints two additional experts. Both the defense and the prosecution provide a list of psychologist experts, from which two are selected to assess the defendant independently. The trial judge can also appoint a third expert to act on behalf of the court. Arizona requires that each expert use current testing procedures to determine whether the defendant has mental retardation. If the IQ score on each of the tests administered by the appointed psychologists is below 70, then the defendant is not considered eligible for the death penalty. On the other hand, if the IQ score on at least one of the tests is above 70, then the court conducts a hearing to determine the "IQ score" of the defendant.

Arizona is the only state that mandates up to four assessments, but the statutes of a few other states also require that a defendant be evaluated more than once. These states are listed in Table 1, as are the number of evaluations mandated by the statute. In Virginia, in all capital cases involving indigent defendants, the court appoints only one qualified mental health expert to assess whether the defendant has mentally retardation and to assist the defense in the preparation and presentation of information concerning the defendant's mental retardation (Va. Code Ann. § 19.2-264.3:1.2[A]).

Mandated Assessment Instruments to Be Administered

Seven states (Arizona, Connecticut, Florida, Illinois, North Carolina, South Dakota, and Virginia) provide guidance to examiners regarding which IQ tests must be used. For example, Arizona requires that the defendant be examined using "current community, nationally and culturally accepted physical, developmental, psychological and intelligence testing procedures, for the purpose of determining whether the defendant has mental retardation" (Ariz. Rev. Stat. § 13.703.02[E]). Connecticut requires "one or more of the individually administered general intelligence tests developed for that purpose and standardized on a significantly adequate population" (Conn. Gen. Stat. § 1-1g[b]). Florida and Virginia provide for the test to be taken off an approved list (Fla. Stat. § 921.137[1]; Va. Code Ann. § 19.2-264.3:1.1[B, 1]). Virginia law provides the most specific guidelines on this topic, reflecting some of the literature on best practices in intellectual assessment. Specifically, the Virginia law states,

> Assessment of intellectual functioning shall include administration of at least one standardized measure generally accepted by the field of psychological testing and appropriate for administration to the particular defendant being assessed, taking into account cultural, linguistic, sensory, motor, behavioral and other individual factors. (Va. Code Ann. § 19.2-264.3:1.1(B)(1))

Who Can Conduct an Assessment?

Psychologists are well aware that to perform psychological assessments, one must be qualified to do so. Statutorily, however, most states do not have this same requirement. The most basic competency qualification, namely, licensure, is mandated by Georgia and North Carolina (Ga. Code Ann. § 17-7-131[b, 2]; N.C. Gen. Stat. § 15A-2005[a 2]). Those states also provide that the practitioners may either be psychologists or psychiatrists. In addition, some states require licensure plus expertise in the area of mental retardation. For example, Kansas requires "two licensed physicians or licensed psychologists, or one of each, qualified by training and practice to make such an examination" (Kan. Stat. Ann. § 21-4623[b]). Florida and Illinois specify that the defendant be examined by experts in the field (Fla. Stat. § 921.137[4]; Ill. Comp. Stat. ch. 725, § 5/114-115[b]). Neither statute, however, defines "expert." Oklahoma allows "a psychologist or other appropriate clinician" to make the determination (Okla. Stat. tit. 22, § 1175.3[D, 1, b]). None of the remaining 16 states provide any guidance as to what type of person is qualified to make the assessment of mental retardation.

Flynn Effect

An assessment issue that no state statute currently addresses is the *Flynn effect*. The Flynn effect has been described as a systematic and pervasive rise in IQ scores all over the world, including in the United States, that causes IQ norms to become obsolete over time. (Flynn, 1984, 1987). Kanaya et al. (2003) stated that "as time passes and IQ test norms get older, people perform better and better on the test, raising the mean IQ by several points within a matter of years" (p. 778).

The Flynn effect could have an impact on capital cases. For example, in those cases in which a defendant was convicted during either the beginning or end of a renorming period, the defendant's IQ could be artificially lower or higher. As illustrated above, a significant number of states have a cutoff criterion under which an absolute IQ score number, alone, determines that a defendant does not have mental retardation. Defendants in the borderline area will be underrepresented depending on which year they were tested.

In a study conducted by Kanaya et al. (2003), a total of 8,944 special education assessments performed by school psychologists were collected from across the United States. The study compared children who were tested using the Wechsler Intelligence Scale for Children—Revised (WISC–R) norms and the Wechsler Intelligence Scale for Children—Third Edition (WISC–III) norms with children who were given either the WISC–R twice or the WISC–III twice. The IQ scores of the children who were given the WISC–R at the end of the norming period and then the WISC–III at the beginning of the norming period dropped 5.6 points. This was in direct contrast to those children who were given the same test, whose scores remained stable (Kanaya et al., 2003). While it is true that this study was conducted on children using the WISC–R and the WISC–III, the same results may certainly be seen in the adult area. As Kanaya et al. (2003) indicated,

> Thus, a potentially important implication of the Flynn effect is that some borderline death row inmates or capital murder defendants who were not classified as mentally retarded in childhood because they were administered an older version of an IQ test will qualify as mentally retarded if they are administered a more recent test. Given the magnitude of the effect (nearly a full standard deviation decrease in IQ is associated with changing norms since the first edition of the WISC was phased out in the early 1970s), the shifts in eligibility for death row inmates could be significant. (p. 789)

Implications for Practice: 2002 Ethics Code and Legally Mandated Procedures for Assessing Mental Retardation

In the *Ethical Principles of Psychologists and Code of Conduct* (APA, 2002), Standard 9.02(a) states: "Psychologists administer, adapt, score, interpret, or use assessment techniques, interviews, tests, or instruments in a manner and for purposes that are appropriate in light of the research on or evidence of the usefulness and proper application of the techniques" (p. 1071). Accordingly, one might ask whether the cutoff criteria mandated by various statutes are "appropriate in light of the research on" the procedures and methods for making a diagnosis of mental retardation (see, e.g., AAMR, 2002). In addition, the question arises whether the legally mandated practices in many states involving a number of test administrations by different experts within a short period are consistent with the "proper application" of the procedure for measuring IQ. Standard 2.04 of the ethics code states that "Psychologists' work is based on established scientific and professional knowledge of the discipline" (APA, 2002, p. 1064). The question here is whether "established scientific and professional knowledge" supports psychologists performing multiple intellectual assessments within a short period of time, without communicating with other professionals regarding which tests were used, and without considering the impact of practice effects and related reliability and validity issues on the test results obtained. The concern is particularly pressing in states such as Kentucky and Tennessee where the case law appears to make the psychologist's scoring of an IQ test the sole cause for disqualifying a defendant claiming mental retardation to escape execution (see Table 1, note c).

In this regard, it appears that no states whose statutes provide for more than one examination by different experts include any provision expressly addressing the psychological measurement issues or the test–retest reliability problems. Although the Arizona statute does require that the IQ determination must "take into account the margin of error for the test administered" (Ariz. Rev. Stat. § 13.703.02[K, 4]), this alone does not address the test–retest issue or the issues pertaining to the primary language of the testee or whether the testee's characteristics were represented in the standardization group. Moreover, no state statute mandates communication between the evaluators so multiple assessment using identical instruments can be avoided.

There are several ways in which Arizona's procedures come into direct conflict with "established scientific and professional knowledge" and recommended psychological assessment practices (see, e.g., Anastasi, 1988; D'Agostino, 2005; Lichtenberger, Mather, Kaufman, & Kaufman, 2004; Nitko, 2004). First, Arizona provides a cutoff score of 70 for IQ scores. As mentioned earlier, this results in an artificial construction of the IQ score, because error variance due to a variety of measurement error factors is not considered in the law. For example, if a person scores 76 on the prescreening IQ assessment, the inquiry is terminated. The second conflict involves the procedure mandated when a defendant receives a score of 75 or below on the prescreening evaluation. In that case, the court appoints at least two, and possibly three, additional experts to determine within a 68- to 90-day period whether the defendant has mental retardation. Although all experts must use the most current assessment procedures, there is no provision in the Arizona law that any expert inform the others about which assessment instruments he or she used. Moreover, there is no provision in the Arizona statute that the experts must take into consideration such psychometric issues as test–retest reliability, practice effects, testing the person in his or her primary language, or whether the person's demographic and cultural characteristics are represented in the test's standardized group.

As most psychologists know, one of the best known IQ tests for adults is the Wechsler Adult Intelligence Scale (WAIS), the most recent version of which is the WAIS–III (The Psychological Corporation, 1997a). The *WAIS–III/WMS–III Technical Manual* addresses the test–retest issue (The Psychological Corporation, 1997b). For example, in the study listed in the *Technical Manual*, participants were tested twice, with a test–retest interval averaging 34.6 days. The *Technical Manual* reports that the data indicate that "the mean retest scores are higher than the scores from the first testing. These differences, mainly due to practice effects, are about 2.5–3.2 points on the VIQ score, 2.5–8.3 points on the PIQ score, and 2.0–3.2 points for the FSIQ [full-scale IQ] score" (The Psychological Corporation, 1997b, p. 57). However, the averages given in the *Technical Manual* were determined across all age groups. Thus, by mandating retesting by three or four experts within 68–90 days, the Arizona statute excludes large numbers of defendants who may present clinically as having mental retardation but gain enough IQ points due to practice effects that they fail to meet the statutory criteria.

Another widely used assessment tool is the Stanford–Binet Intelligence Scales, currently in its fifth edition (SB5; Roid, 2003). The SB5 is appropriate for ages 2 to 85 and produces a full-scale intelligence quotient that has a mean of 100 and a standard deviation of 15 (Roid, 2003). The SB5 manual states that the newest revision includes improved low-end items for better measurement of young children or adults having mental retardation. The SB5 correlates well with the WAIS, with a correlation of .82. The mean of the SB5 is 101.5, and the mean of the WAIS administered to the same sample group was 107. The SB5 manual postulates that this difference may be due to the Flynn effect or a skewed distribution in the spread of the sample (Roid, 2003). If psychologists choose to use any of these assessment instruments, they would need to reconcile different IQ scores from the different instruments. Further, consistent with "established scientific and professional knowledge," it is important that the differences in means and standard errors of measurement be taken into account.

In consideration of the above mentioned sections of the APA's ethics code, as well as the legal mandates of states based on *Atkins*, the question is, how should a psychologist proceed who (a) is interested in providing psychological services to the court to determine whether a person has mental retardation and (b) desires to behave in a manner consistent with the APA ethics code? In fact, the ethics code provides some guidance to psychologists in Standard 1.02, which addresses what to do if ethical responsibilities conflict with law, regulations, or other governing authority. It states,

> psychologists must make known their commitment to the Ethics Code and take steps to resolve the conflict. If the conflict is not resolvable via such means, psychologists may adhere to the requirements of the law, regulations, or other governing legal authority. (APA, 2002, p. 1063)

The problem with this standard is that by following the law the psychologist will be violating the basic foundations of psychological testing principles and practices (e.g., Anastasi, 1988; D'Agostino, 2005; Nitko, 2004).

The United States Supreme Court has recognized that in capital cases "death is different." It recognizes the enormous stakes and provides for extra procedural protections for the capital defendant. Still, even with those extra protections, a number of innocent people who were wrongfully convicted have been released from death rows across the country (Babwin, 2005; Martin, 2006). Under these circumstances, therefore, a psychologist who provides psychological assessment services to a particular state, as well as any subsequent expert testimony, will conceivably act in accordance with the law while at the same time providing results and testimony that could very possibly be inconsistent with current professional standards of practice, or as the ethics code states, "established scientific and professional knowledge" (APA, 2002).

One way to counteract this conundrum is for the psychologist to follow Standard 1.02 of the APA ethics code by adhering to the law and stating in his or her psychological report, as well as indicating in his or her court testimony the limitations of his or her findings based on the standards of sound psychological testing practices. By informing the court, as well as the prosecution and defense, a decision can be made regarding the fairness of the psychologist's assessment. This course of action is also supported by Guideline 12.02 of the draft document, *Specialty Guidelines for Forensic Psychology* (2006). A more simple solution is for psychologists to refuse appointments to provide assessments in those states whose statutes clearly violate sound psychometric practices. When the difference in a single IQ point can mean the difference between eligibility and ineligibility for the death penalty, it would appear to us that psychologists involved in these cases should apply the standard of psychological care advocated by the APA ethics code rather than the law.

Summary and Conclusions

In 2002, the Supreme Court's *Atkins* decision reversed previous precedent that permitted imposition of the death penalty on people with mental retardation. The lack of guidance in *Atkins* about definitions and procedures appears problematic for psychological practice because states have different definitions of mental retardation, cutoff score criterion, and assessment procedures. Moreover, some procedures mandated by statute appear to defy sound psychological measurement principles. These circumstances have created an ethical dilemma for those psychologists who choose to assist states in determining whether a defendant in a capital case has mental retardation. Psychologists must follow both the law and the ethics code of their profession. The problem is that the implementations of the *Atkins* decision in many states can cause psychologists to act in a manner that may violate the APA ethics code. In these instances, psychologists could refuse to accept a court appointment to provide such services and, therefore, avoid an ethical–legal conflict. In instances, however, where such an appointment is accepted, it would appear that psychologists should state clearly in their report to the courts (as well as in any subsequent testimony) the specific limitations associated with their findings that affect the external and internal validity of the test results. In addition, psychologists and their state psychological associations should lobby for legislative changes to make state laws consonant with scientifically based psychometric practices. In our opinion, in capital cases, in which the stakes could not be any higher, psychologists have a responsibility to follow the APA ethics code instead of the law.

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