Dissection of the Prongs of ALI

A Retrospective Assessment of Criminal Responsibility by the Psychiatric Staff of the Clifton T. Perkins Hospital Center

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Public outrage over a verdict of insanity in certain cases is inevitable. Recently such an outcome in a trial for attempted assassination of the President of the United States has led to new proposals for reform of the insanity defense. These suggestions have been, moreover, the product of major professional organizations (American Psychiatric Association, American Bar Association)[1,2] and a major advocacy group (National Mental Health Association).[3] In general, the thrust of both legislative and professional recommendations has been toward limiting or abolishing the special plea of insanity.

One of the suggestions generated by the two professional groups' reports has been modification of the American Law Institute's test (ALI),[4] which is currently operative in about half the states and in the federal courts.[5] A thorough analysis of this test can be found in other works.[6,7,8] These new proposals would delete the second half of the "two-pronged" ALI test, the so-called "volitional" prong. Specifically, the ALI test is that a

> person is not responsible for criminal conduct if at the time of such conduct as a result of mental disease or defect he lacks substantial capacity to appreciate the criminality of his conduct or to conform his conduct to the requirements of the law.[9]

The modification proposed would delete the second or volitional prong of the test expressed by "conform his conduct to the requirements of the law." The rationale expressed by the psychiatric association for this change is that the present state of psychiatric knowledge permits far more valid testimony on the issue of "cognition" embodied in the first portion of the ALI test, than on the issue of volition as sought in the second portion. While this reasoning is not shared by all psychiatrists, nonetheless it reflects the opinion of certain leaders in the field.[10]

In Maryland, the Governor appointed a task force to study the issue and to advise the community whether reform of existing law should be undertaken. While there is some data on the followup of insanity acquittees,[11-14]

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there is little objective data on the relationship between the substance of the insanity statute and outcome of the evaluation process.[15] This lack of data is a major problem faced not only by the Governor's Task Force but also by other policy making and advisory groups.

A search of the literature has failed to reveal any studies of the potential impact of the proposed change in the legal standard for responsibility on the outcome of forensic psychiatric evaluations and opinions. At the request of the Governor's Task Force, the professional staff of the Clifton T. Perkins Hospital Center (CTPHC), Maryland's evaluation center for serious offenders, carried out a retrospective reassessment of those cases reported "not responsible" between July 1, 1981 and June 30, 1982 (fiscal year 1982). The object was to discover whether the proposed truncation of the ALI test rapidly gaining popularity would clearly yield the results anticipated by its proponents: screening less seriously ill offenders, promoting more consistent psychiatric opinion, and diminishing the frequency of courtroom "battles of the experts."

Nearly all cases of serious offenses in which a plea of insanity is entered by defense counsel are referred by the courts to CTPHC for evaluation of criminal responsibility. In Maryland, the ALI test has been modified by only the substitution of "disorder" for "disease or defect" in the wording.[16]

The core evaluation consists of a psychiatrist's admission evaluation, a social worker's evaluation of the family and background data, a formal psychiatric workup, a psychologist's testing including observation, WAIS, Bender, and Rorschach, and a nurse's report of inpatient behavior. These studies are read and the defendant is interviewed at a "forensic staff conference" attended by at least three psychiatrists as well as the other professional participants in the evaluation process. The hospital's official opinion, a composite of the findings of the psychiatrists at the staff conference, is communicated to the court in the form of a report listing individually their observations, diagnoses, and forensic opinions on competency and responsibility. While the prongs of ALI may be discussed at conference, the written report the court cites the test in full without defining on which of the two prongs the final opinion was based.

Methods

The forty-two cases reported as "not responsible" by CTPHC during hospital fiscal year 1982 were identified and the charts reviewed. Of these, two were reported as not responsible by majority opinion and the remaining forty were unanimous. A pool of nine experienced forensic psychiatrists (all certified in psychiatry by the American Board of Psychiatry and Neurology) participated in the chart review. In each case, the chart was to be assessed by three reviewing psychiatrists, one of whom was present at the original forensic staffing. The ALI standard was divided into the cognitive and volitional prongs. The physicians reviewed the charts independently and were instructed to confine their review to the same information available at

the time of the original staffing. Separate opinions were offered on whether the clinical findings in the case satisfied the requirements of either prong or both.

Participants in the study were informed that the summarized information would be reported to the Governor's Task Force. It was made clear, however, that the impact of the findings on the task force could not be anticipated no matter what specifically was discovered. Additionally, while the reviewers were aware that all cases had been found "not responsible" originally, they were asked to form their opinions as nearly as possible from the workups and to disregard any other outside knowledge of the cases.

Results

Forty-two records were distributed to the review panel. On completion of the data collection, the following deviations from protocol were discovered:

No. of cases reviewed	No. of reviewers
37	3
1	4
1	2
2	1
1 chart unavailable	

One chart was unavailable, and the two cases reviewed by only one doctor were not included in the study. The remaining thirty-nine cases were reviewed by at least two psychiatrists and included for tabulation. Table 1 (next page) presents all data and shows the new opinions that resulted as well as the original hospital opinion reported to the court. Changes in the hospital opinion are summarized as follows:

Opinions unchanged:		**26**
remained unanimous	25	
remained majority	1	
Opinions changed:		**13**
unanimous to majority	11	
majority not responsible to majority responsible	1	
unanimous not responsible to majority responsible	1	

In two of the 39 cases (5 percent), the previous hospital opinion on responsibility was reversed by this method of review. Conversely, 95 percent of the hospital reports were in the same direction as the original findings. While in many cases the individual psychiatric opinions were based on both prongs, there is a notable scattering of single-prong opinions (relying on either prong) throughout Table 1. In eleven of the thirty-nine cases (28 percent), the hospital opinion changed from unanimous to majority. Accordingly, the results were further explored.

Table 1. Tabulation of Doctors' Opinions

	HX #	Dr #1	Dr #2	Dr #3	Dr #4	Dr #5	Dr #6	Dr #7	Dr #8	Dr #9	Hospital Opinion Revised ALI Test	Original Hospital Opinion
1	262	B		B						COG	U	U
2	6955	B		B					B		U	U
3	7098	B			B	B				B	U	U
4	7364				B	B			B		U	U
5	7461		B			B	O				MAJ	MAJ
6	7498	B							VOL	B	MAJ	U
7	7523	B		B						B	U	U
8	7549	B	B	B							U	U
9	8299					B	B	B			U	U
10	8393	B				B					U	U
11	8405				B		B	VOL			MAJ	U
12	8427	B	B					VOL			MAJ	U
13	8436				B	B			B		U	U
14	8457				B		B		VOL		MAJ	U
15	8479		COG			B					U	U
16	8480				B	B	VOL				MAJ	U
17	8539		B		COG					COG	U	U
18	8540							B	B	B	U	U
19	8541		B		B					COG	U	U
20	8554	B					B		B		U	U
21	8557			B				VOL		B	MAJ	U
22	8560	B	COG	B	B						U	U
23	8562			B			B			B	U	U
24	8570			B			B	B			U	U
25	8573		B					B	B		U	U
26	8591	B	B	VOL							MAJ	U
27	8595						VOL	COG	VOL		RES/M	MAJ
28	8605	VOL						B	VOL		RES/M	U
29	8707	B	B							COG	U	U
30	8716				B		VOL	B			MAJ	U
31	8722	B	B		B						U	U
32	8732				B	B		B			U	U
33	8788			B			B		B		U	U
34	8793			B		B	VOL				MAJ	U
35	8817					B	B		B		U	U
36	8841		B						VOL	B	MAJ	U
37	8857				B	B			VOL		MAJ	U
38	8860			B	B			B			U	U
39	8864		COG		B					COG	U	U

VOL = Satisfies volitional prong, not cognitive prong
COG = Satisfies cognitive prong, not volitional prong
B = Satisfies both cognitive and volitional prongs
O = Satisfies neither prong
U = Unanimous Opinion
MAJ = Majority opinion
RES/M = Responsible by majority opinion

Examination of the pattern of opinions of the individual psychiatrists was assisted by the format of Table 2, which summarizes the opinions rendered by each reviewer. The most striking finding was that 25 of the 117 opinions expressed (22 percent) rested on only one ALI prong. Of further

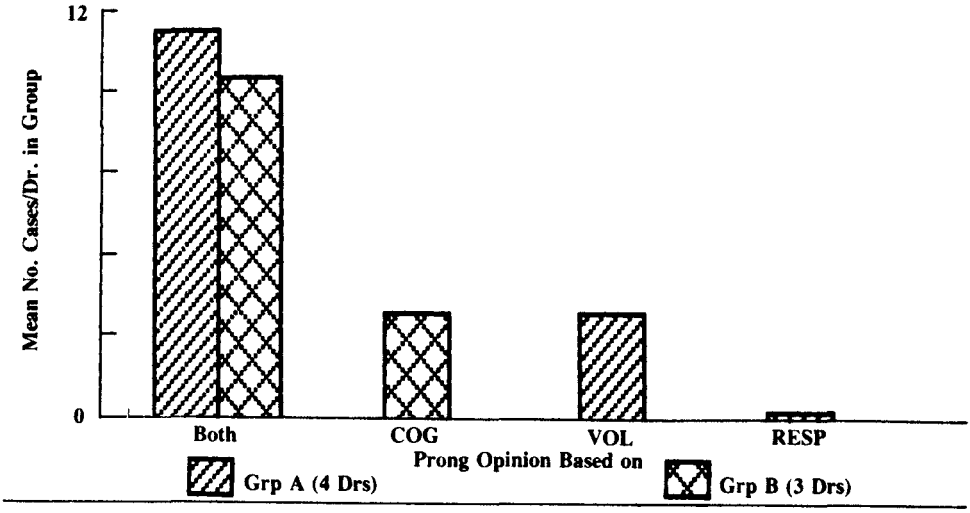
Table 2. Summary of Doctors' Opinions

DR#	GRP	COG	VOL	RESP	BOTH	SUM	% of Each Doctor's Opinions Resting on Both:	Single:	Prongs
5		0	0	0	12	12	100	0	
1	A	0	1	0	13	14	93	7	
3	A	0	1	0	11	12	92	8	
6	A	0	4	1	8	13	67	33	
8	A	0	6	0	8	14	57	43	
4	B	1	0	0	14	15	93	7	
2	B	3	0	0	10	13	77	23	
9	B	5	0	0	7	12	58	42	
7		1	3	0	8	12	67	33	
Sum		10	15	1	91	117	78	22	Average

COG = Satisfies cognitive prong only
VOL = Satisfies volitional prong only
RESP = Satisfies neither prong
BOTH = Satisfies both prongs

interest was the range of 0 to 43 percent among the psychiatrists in the frequency with which their opinions were based on a single prong rather than both. Table 2 is arranged not by consecutive doctor code numbers, but by groupings reflecting whether their opinions tended to be based on the cognitive or volitional prong of the ALI test. Only psychiatrist #7 found separate instances in which he could render an opinion of not responsible based on either prong. All others tended to conceptualize the cases pursuant to one or the other prong. Where psychiatrist #8 rated 43 percent of the cases he reviewed as "not responsible" based only on volitional impairment, psychiatrist #9 rated 42 percent as "not responsible" based only on cognitive impairment. These differences are illustrated in the Graph comparing the groups labeled A and B in Table 2. It should be noted, however,

Graph.



from Table 1, that each doctor rated a different but overlapping cohort of the cases. One psychiatrist found all cases not responsible on both prongs uniformly, while another found one case responsible on both prongs.

Table 3 presents a summary of the thirteen cases in which there was a change in the hospital opinion. In the original sample of thirty-nine, 5 percent of the cases were reported as majority opinions. The new results show that thirteen of thirty-nine (33 percent) might have been reported as majority opinions if the volitional prong of ALI were excluded from consideration. Furthermore, in seven of the thirteen (54 percent), the psychiatrist who knew the case best (the one who participated in the original staffing) would have reversed this opinion under the truncated ALI test. Nine of the thirteen cases were diagnosed as schizophrenic (69 percent). Additionally, three of the schizophrenic patients' presentations were complicated by substance abuse. It is of particular interest that three of the thirteen were diagnosed to have major affective illness and one (schizo-affective disorder) presented with significant affective features (four of thirteen or 31 percent).

Discussion

The principal arguments in favor of the proposed deletion of the second prong of ALI are that the insanity defense would be successful in fewer controversial cases and that psychiatrists would be testifying in areas where their expertise had more solid scientific foundation. These data suggest a possibility of paradoxical results. Since the official hospital report would have been reversed in only 5 percent of cases, this study does not support the belief that substantial limitation of the scope of the insanity defense would ensue. This is especially likely in light of other data suggesting the important role of the forensic hospital's position with regard to ultimate outcome in such cases.[17] While the current study has many limitations that would render statistical analysis difficult to interpret, it is unlikely that 5

Table 3. Effect of Revised ALI Test (Cognitive Only) on Hospital Opinions

HX #	Original Staff Opinion	Cognitive only Staff Opinion	Original Dr.'s New Opinion	Diagnosis
7498	UN	MAJ	VOL	Bipolar disorder, manic phase
8405	UN	MAJ	B	Schizophrenia, undiff; alc & drug abuse
8427	UN	MAJ	B	Schizo-affective disorder; Hodgkin's Disease
8457	UN	MAJ	B	Schizophrenia, chronic undifferentiated type
8480	UN	MAJ	VOL	Manic-depressive psychosis
8557	UN	MAJ	B	Schizophrenia, paranoid type
8591	UN	MAJ	B	Schizophrenia, paranoid type
8595	MAJ	RESP/MAJ	VOL	Schizophrenia, paranoid type
8605	UN	RESP/MAJ	B	Schizophrenia, chronic undifferentiated type
8716	UN	MAJ	VOL	Schizophrenia, undiff; mixed substance abuse
8793	UN	MAJ	VOL	Bipolar disorder, manic phase
8841	UN	MAJ	VOL	Schizophrenia, undiff; alcohol abuse
8857	UN	MAJ	VOL	Schizophrenia, undiff; paranoid features

percent reflects any significant difference.

The absence of a control group previously found "responsible" prevents an assessment of whether on single prong consideration, unexpected opinion changes could occur leading to reversals from "responsible" to "not responsible." This possibility has not been ruled out in the present study. Additionally, analysis of the interaction of both prongs when considered separately but simultaneously (as here) versus results of single prong tests considered alone was not possible by this study format. The small sample size and the relative importance of few individual opinions must be considered in assessing whether the trends noted in the results and discussion could have occurred by chance. The study design was unfortunately limited by the pressure of time under which the Governor's Task Force was deliberating and the small amount of professional staff time available at CTPHC for additional tasks. In view of these limitations, the findings are, at best, only suggestive of the need for further and more detailed investigation.

The scatter of individual opinions, however, may have interesting implications. If this phenomenon should persist in actual forensic staff results rather than retrospectively, there could be a significantly higher number of split opinions. Where originally approximately 5 percent of staffings showed split opinions, these data suggest such an outcome in more than 20 percent of cases. The effect could be a fourfold increase in litigated insanity defense cases. One paradoxical consequence of the proposed change in ALI might be an increase in psychiatric participation in criminal trials with ever more esoteric differences among the experts, depending on their perspectives about the interrelationships between intrapsychic mechanisms and behavior. The relative uniformity with which experienced and competent forensic psychiatrists perceived either volitional or cognitive impairment in a relatively random cohort of potential insanity acquitees suggests that splitting the prongs may favor a particular theoretical position rather than favor justice in outcome.

A significant drawback in the present study format, however, was the lack of opportunity for the raters to discuss their viewpoints as they might in a forensic staff conference. It is likely there would have been an increase in agreement among them had they the chance to consider each other's reasoning in the hospital prior to the open forum of the courtroom. A review of the directions of individual psychiatrist's opinion changes (either toward cognitive or volitional deficits) failed to reveal any consistent correlation between that doctor's training or theoretical approach and the direction he favored. This latter observation, although necessarily subjective, tends to support that a split in the prongs could promote wrangling without any clear scientific direction predictable.

Another serious and paradoxical consequence of prong splitting reflected in these data was the relatively high proportion of split opinions in the cases of defendants suffering from severe affective illness. In three cases of such illness, the doctor from the original staffing, who presumably knew the patient's condition best, found for nonresponsibility on the volitional

prong only. Furthermore, the proportion of affective disorders in the group shown in Table 3 was higher than that found in the CTPHC insanity acquittees in a prior study.[18] Manic patients often may be severely impaired in their capacity to control behavior, while their cognitive disruption may be less striking. The proposed truncation of the ALI test may systematically exclude from a successful plea of insanity that class of psychotic patients whose illness is clearest in symptomatology, most likely biologic in origin, most eminently treatable, and potentially most disruptive in penal detention. While the present study method and sample size would prohibit a firm conclusion that this effect would ensue, the data suggest that more careful inquiry into this question should precede changes in the law.

Summary

The staff of the Clifton T. Perkins Hospital Center has systematically reassessed the impact of the proposed modification of the ALI test removing the second prong. Findings of this retrospective survey reveal few changes in the composite staff opinions reported by the hospital but many variations in the opinions of individual psychiatrists when rating the prongs independently. The effect of these changes in Maryland (while difficult to anticipate) might be an increase in litigation. The resulting fiscal impact, therefore, not only could affect the Division of Corrections but also could increase court costs. The data suggest that rather than limiting psychiatric testimony and ensuring that only the sickest patients are exculpated, the proposed truncation of ALI may have paradoxical consequences. There may be more frequent battles of the experts based on less rigorous science and potential exclusion of affective psychosis from appropriate access to the defense of insanity. While the study methods and sample size prohibit reliable conclusions concerning the likelihood of these consequences *in vivo*, the issues raised strongly support a need for further investigation before a relatively well-functioning legal framework is changed in favor of the untested rubric of the proposed modifications of ALI.

References

1. Insanity Defense Work Group, Roth L et al. American Psychiatric Association Statement on the Insanity Defense. Am J Psychiatry 140(5):681-88
2. American Bar Association, draft proposal, 1983
3. National Mental Health Association. Myths & Realities: A Report of the National Commission on the Insanity Defense. Arlington, VA, March 1983
4. American Law Institute, Model Penal Code, Proposed Official Draft, Sec 4.01, 1962
5. Weiner BA: Not guilty by reason of insanity: A sane approach. Chicago-Kent Law Review 56:1057-85
6. Commission on the Mentally Disabled: Mental Disability Law Reporter. American Bar Association, Washington, DC
7. Allen RC, Ferster EZ, Rubin JG: Readings in Law and Psychiatry. Baltimore, Johns Hopkins Press, 1968, pp. 414-47
8. Slovenko R: Psychiatry and Law. Boston, Little Brown and Company, 1973
9. American Law Institute: op cit
10. Fingarette H and Hasse AF: Mental Disabilities and Criminal Responsibility. Berkeley, University of California, 1979

11. Madden DJ: A followup study of sixty-five mentally ill offenders on convalescent leave. Unpublished, 1978
12. Pasework RA, Pantle ML, Steadman HJ: Detention and rearrest rates of persons found not guilty by reason of insanity and convicted felons. Am J Psychiatry 139:892-97
13. Silver SB: Treatment and aftercare for insanity acquittees in Maryland. Testimony before the Subcommittee on Criminal Law of the Committee on the Judiciary, U.S. Senate, USGPO. Washington, 1983, Serial # J-97-122:374-83
14. Silver SB, et al: Experience in the aftercare of insanity acquittees in Maryland. Presented at the thirteenth annual meeting, Am Acad Psychiatry Law, New York, NY 1982
15. Sauer RH, Mullens P: The insanity defense: M'Naghten vs. ALI. Bull Amer Acad Psychiatry Law 4:73-75
16. Annotated Code of Maryland, Title 12, 12-101 through 12-116, 1982
17. Steadman HJ, et al: Factors associated with a successful insanity plea. Amer J Psychiatry 140:401-404
18. Madden R: op cit □