A Treatment Study of Mode Deactivation Therapy in an Out Patient Community Setting

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Abstract

This paper is a review of the outpatient data and recidivism for an 18 month post treatment follow-up of Mode Deactivation Therapy (MDT). The follow up data suggests that effects of MDT generalized for over one-year post treatment in these adolescent conduct disordered males in an inpatient therapeutic setting. This research compared the effectiveness of MDT and Treatment as Usual (TAU) as treatments on adolescents with conduct and personality disorders or traits in this sample.

Keywords: Mode Deactivation Therapy (MDT), Conduct Disorder, Personality Disorder Out Patient.

Introduction

One of the criticisms of MDT in academic reviews is that it is a treatment for residential centers and that the clients might have improved on their own by being in a structured environment. Apsche, Bass (2006) published a study completed in an outpatient community setting. They compared six adolescents receiving MDT with seven adolescents receiving TAU in the community.

Another criticism of MDT is the lack of data, suggesting generalization effects. This paper presents the 18 month follow up data for the MDT and TAU sample in a community outpatient setting. Apsche, Bass, Siv (2006) presented data to suggest that MDT was far superior to CBT and SST in producing positive results from a 2 year follow up study of recidivism of male adolescent youths discharges from a residential treatment center.

This paper will review the data from Apsche, Bass (2006), article and add 18 month follow up data. A review of these data suggests that MDT might be an effective methodology in outpatient settings.

METHOD

Sample Characteristics

A review of the Apsche, Bass (2006) study showed that data reports for follow up data were calculated form school reports systems. The parent(s) kept general data forms and returned them to the youth agency workers for both groups.

The data was collected by the youth agency and then disseminated.

Review of Research

A total of 13 male adolescents participated in the study. All subjects were referred to a private outpatient practice for the treatment of aggression. Referrals came from County Juvenile Justice and the Department of Youth and Family Services. In this study, subjects were randomly assigned to one of the two treatment conditions at the time of admission based on available openings in the caseload of the participating clinicians. The two treatment conditions showed similarity in terms of the frequency of Axis I and Axis II diagnoses, age, and racial background. To ensure consistency in the delivery of the two respective treatments, therapists were specifically trained in one of two treatment curriculums/methods. The average length of treatment across conditions was 6 months.

Condition one: Treatment As Usual (TAU) A total of six male adolescents were assigned to the condition. The group was comprised of 1 African American, 5 European Americans with an average age of 16.1. The principal Axis I diagnoses for this group included Conduct Disorder (2), Oppositional Defiant Disorder (4), and Post Traumatic Stress Disorder (4). Axis II diagnoses for the group included Mixed Personality Disorder (4), Borderline Personality Disorder (1).

Condition two: Mode Deactivation Therapy (MDT): A total of seven male adolescents were assigned to the MDT condition. The group was comprised of 2 African Americans, 5 European Americans with an average age of 16.4. The principal Axis I diagnoses for this group included Conduct Disorder (1),Oppositional Defiant Disorder (3), Post Traumatic Stress Disorder (4), and Major Depressive Disorder, primary or secondary (5). Axis II diagnoses for the group included Mixed Personality Disorder (4), and Borderline Personality Traits (3). The MDT condition used the Mode Deactivation Therapy which is built on the mastery system for youngsters. They move through a workbook at the rate of learning that accommodates their individual learning style. The system is designed to allow the youngster to experience success, prior to undertaking more difficult materials. Initially, the individual needs to be aware of his negative verbalizations and negative thoughts, and record them in his workbook. Through the Case Conceptualization, workbook, and audiotapes, the system allows the youngster to systematically address the underlying conglomerate of personality disorders as well as, the specific didactics necessary, anger/aggression.

Measures

Three measures were included in this study: School disciplinary referrals, Parent Report and The Child Behavior Checklist (CBCL; Achenbach, 1991).

School records were used to assess disruptive and aggressive behavior in school. Behaviors which were assessed included school suspension, physical altercation, verbal aggression toward peers/others.

The Parent Report Record is a measure used to record aggressive behavior at home. Behaviors recorded included; Sibling altercations, Anger outbursts, and direct intentional disobedience.

The CBCL is a multi-axial assessment designed to obtain reports regarding the behaviors and competencies of 11- to 18-year-olds'. The means and standards are divided into three categories: internalizing (which measures withdrawn behaviors, somatic complaints, anxiety and depression), externalizing (which measures delinquent behavior and aggressive behavior), and total problems (which represent the conglomerate of total problems and symptoms, both internal and external).

FOLLOW-UP DATA

Table 1: 18 Month Follow-up Parent Reports Received		
	MDT	TAU
Sexual Aggression (SA)	0	10
Acting Out (AO)	3	12
Direct intentional disobedience		
(DIB)	6	18

Table 2: 18 Month Follow-up School Data Received

	MDT	TAU
Residential Placements (RP)	0	3
School Suspensions (SS)	3	20
School Expulsions (SE)	1	5

RESULTS

Child Behavior Checklist

The CBCL means and standards are divided into three categories: internalizing, externalizing, and total problems. There was no significant difference in the pretest means between MDT (Internalization =73.5, Externalization= 75.5 and Total= 74.5) and TAU (Internalization= 73, Externalization= 75 and Total= 74).

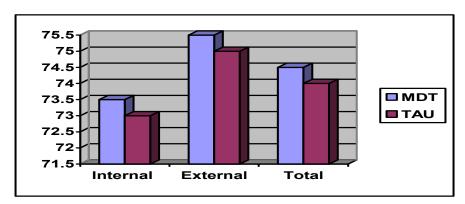


Figure 1. CBCL; Pre treatment mean scores for TAU and MDT groups

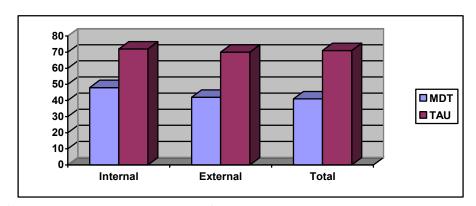


Figure 2. CBCL; Post treatment mean scores for TAU and MDT groups

The post test means showed a statistically significant difference in mean scores. In comparison to the TAU group, the MDT group was superior in reducing all three categories (MDT: Internalization= 48.5, Externalization= 43.5 and Total= 42; TAU: Internalization=72, Externalization= 70 and Total= 71)

The Parent Report Record

Results on the Parent Report Measure showed no significant difference in the pretreatment recordings of Sibling altercations (SA), Anger outbursts (AO), and direct intentional disobedience (DIB)

(MDT: SA=5 per week, AO= 21 per week, DIB= 10; TAU: SA= 4 per week, AO= 22 per week and DIB= 11).

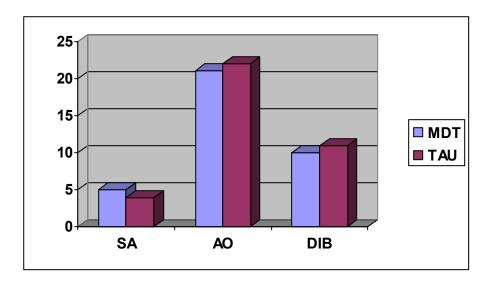


Figure 3. The Parent Report Record: Pre treatment mean scores for TAU and MDT groups

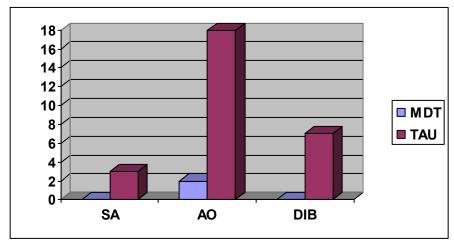
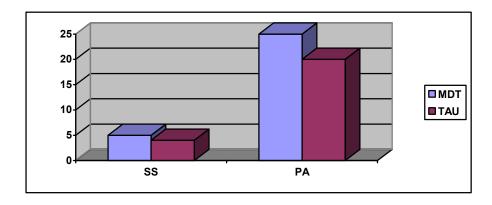


Figure 4. The Parent Report Record: Post treatment mean scores for TAU and MDT groups

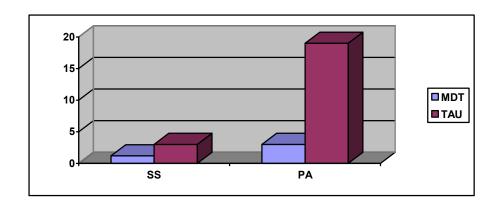
Post treatment results on the Parent Report Measure showed a significant difference in the recordings of Sibling altercations (SA), Anger outbursts (AO), and Direct intentional disobedience (DIB) (MDT: SA=5 per week, AO= 21 per week, DIB= 10; TAU: SA= 4 per week, AO= 22 per week and DIB= 11).

School Records

School records were kept by the school's Principal Discussion Office. The forms tracked aggression and school suspensions.



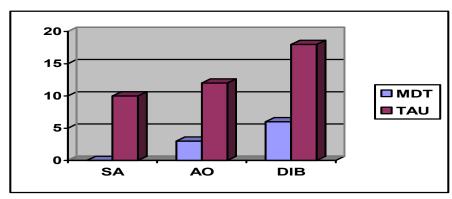
SS = School Suspension (Pre treatment MDT= 5, TAU=4); PA= Physical Aggression (Pre Treatment, MDT= 25, TAU= 20



SS = School Suspension (Post treatment MDT= 1.2, TAU=3); PA= Physical Aggression (Post Treatment, MDT=3, TAU= 19

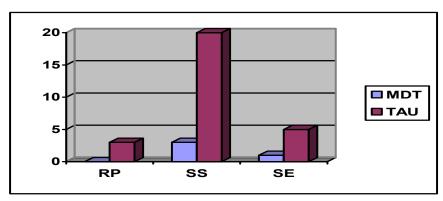
18 Month Follow Results

Parent Reports Received



SA = Sexual aggression (18 Month Follow-up, MDT= 0, TAU=10); AO= Acting Out (18 Month Follow-up, MDT=3, TAU= 12); DIB= Direct intentional disobedience (18 Month Follow-up, MDT=6, TAU= 18)

School Records



RP = Residential Placement (18 Month Follow-up, MDT= 0, TAU=3); SS= School Suspension (18 Month Follow-up, MDT=3, TAU= 20); SE= School Expulsion (18 Month Follow-up, MDT=1, TAU= 5)

Results demonstrate that MDT was superior to TAU in all categories in this study. Results indicate that MDT was statistically significant over TAU in reducing aggressive behavior, defiant behavior, school suspensions, as well as, reducing symptoms of psychological distress as measured by the CBCL. Symptoms such as anxiety and depression were reduced by MDT while some increased with TAU.

Reports by parents and School Administration indicated that the behaviors of the adolescent in MDT showed significant improvement. The TAU group received negative reports by parents and School Administration.

Discussion

The results suggest that MDT might be an effective treatment for this typology of adolescent in outpatient community settings. The current results also suggest that MDT has generalizable effects from treatment to 18 months post treatment. In this study it was clear that MDT out performed TAU in every category and the treatment effects were far superior for 18 months. It was important to note that none of the adolescents in the MDT group were sent or recommended to residential or correctional settings. This might be important for future research, since residential treatment is costly and often there are many negative side effects reported from lengthy residential treatment, such as, iatrogenic effects of negative learning from peer groups.

The results also suggest that MDT might be effective in decreasing the clinical symptoms of Axis I disorders in this population which may positively effect the positive follow up data. The clinical symptoms might fuel these negative behaviors and MDT might give the individuals a methodology to self monitor these symptoms. MDT hypothesizes that the modes of the adolescent are constantly charged by perceiving danger and threat which are fueled by their damaged or faulty perceptions (Apsche & Ward Bailey 2004). These results might validate some of that hypothesis by the results of the 18 month follow up data.

Summary

MDT was shown to be more effective than TAU in an 18 month study with follow up data. These results suggest that MDT might be effective in treating this type of adolescent in a community setting.

There were several limitations to this treatment research study. There were only thirteen clients in the study, far too few to suggest generalization of effects on the larger population. The assignments of the clients were random in nature, although it did not follow the protocol of a randomized study. Accepting these and other limitations from this type of treatment research, it is important to note the effectiveness of MDT with this population. This study shines light on the MDT treatment tool as a promising approach in the search for effective treatments for adolescents with problems of conduct, opposition and personality.

REFERENCES

- Achenbach, T.M. (1991). *Manual for the Child Behavior Checklist and 1991 profile*. Burlington, VT: University of Vermont Department of Psychiatry.
- Achenbach, T.M. (1991). *Child Behavior Checklist, Assessment*. Burlington, VT: University of Vermont Department of Psychiatry.
- Alford, B.A. and Beck, A.T. (1997). *The integrative power of cognitive therapy*. New York: Guilford Press.
- Apsche, J.A. (2005). Beck's theory of modes. *International Journal of Behavioral Consultation and Therapy*, 1(1), in press.
- Apsche, J.A. (1999). Thought Change Workbook. Portsmouth, VA: Alternative Behavioral services.
- Apsche, J.A., Evile, M.M., and Murphy, C.J. (2004). The thought change system: An empirically based cognitive behavior therapy for male juvenile sex offenders. A pilot study. *The Journal of Behavior Analysis Today*, *5*(1), 101-107.
- Apsche, J.A. and Ward Bailey, S.R. (2004a). Mode Deactivation Therapy: Cognitive-behavioural therapy for young people with reactive conduct disorders or personality disorders or traits who sexually abuse. In M.C. Calder (Ed.), *Children and Young People who Sexually Abuse: New Theory, Research and Practice Developments*, pp. 263-287. Lyme Regis, UK: Russell House Publishing.
- Apsche, J.A. and Ward Bailey, S.R. (2003). Mode deactivation therapy: A theoretical case analysis (Part I). *The Journal of the Behavior Analyst Today*, 4(3), 342-353.

- Apsche, J.A. and Ward Bailey, S.R. (2004b). Mode deactivation therapy: A theoretical case analysis (Part II). *The Journal of the Behavior Analyst Today*, *5*(1), 395-434.
- Apsche, J.A. and Ward Bailey, S.R. (2004c). Mode deactivation therapy: A theoretical case analysis (Part III). *The Journal of the Behavior Analyst Today*, *5*(3), 314-332.
- Apsche, J.A., Bass, C.K., Jennings, J.L., Siv, A.M. (2005). *International Journal of Behavior Consultation and Therapy, 1(1), pp. 27-25.*
- Apsche, J.A., Bass, C.K., Jennings, J.L., Murphy, C.J., Hunter, L.A. Siv, A.M. (2005). *International Journal of Behavior Consultation and Therapy*. Accepted with revisions.
- Apsche, J.A., Bass, C.K., Murphy, C.J. A comparison of two treatment studies: cbt and mdt with adolescent sex offenders. *Journal of Early and Intensive Behavioral Intervention*. 1 (2), pp. 179-190. Winter 2004.
- Beck, A.T. (1996). Beyond belief: A theory of modes, personality and psychopathology. In P.M. Salkovaskis (Ed.), *Frontiers of cognitive therapy*, (pp. 1-25). New York: Guilford Press.
- Beck, A.T. and Freeman, A. (1990). *Cognitive therapy of personality disorders*. New York: Guilford Press.
- Boesky, L.M. (2002). Juvenile offenders with mental health disorders: Who are they and what do we do with them? Lanham, MD: American Correctional Association.
- Dodge, K.A., Lochman, J.E., Harnish, J.D., Petti, G.S. (1997). Reactive and proactive aggression in school children and psychiatrically impaired chronically assaultive youth. *Journal of Abnormal Psychology*, 106 (1), 37-51.
- Henggeler, S.W., Schoenwald, S.K., Borduin, C.M., Rowland, M.D. and Cunningham, P.B. (1998). Multisystemic treatment of antisocial behavior in children and adolescents. New York: Guilford Press.
- Johnson, J.G., Cohen, P., Brown, J., Smailes, E.M., and Bernstein, D.P. (1999). Associations between four types of childhood neglect and personality disorder symptoms during adolescence and early adulthood: Findings of a community-based longitudinal study. *Archives of General Psychiatry*, *14*, 171-120.
- Kazdin, A.E. and Weisz, J.R. (2003). *Evidenced based psychotherapies for children and adolescents*. New York: Guilford Press.
- Koenigsberg, H.W., Harvey, P.D., Mitropoulou, V., Antonia, N.S., Goodman, M., Silverman, J., Serby, M., Schopick, F. and Siever, L. (2001). Are the interpersonal and identity disturbances in the borderline personality disorder criteria linked to the traits of affective instability and impulsivity? *Journal of Personality*, 15(4), 358-370.
- Kohlenberg, R.J. and Tsai, M. (1993). Functional Analytic Psychotherapy: A behavioral approach to intensive treatment. In W. O'Donahue and L. Krasner (Ed)., *Theories of behavior therapy: Exploring behavior change* (pp. 638-640). Washington, D.C.: American Psychological Association.
- Linehan, M.M. (1993). *Treating Borderline Personality disorder: The dialectical approach*. New York: Guilford Press.

- Naglieri, J.A., LeBuffe, P.A. & Pfeiffer, S.I. (1994). *Devereux scales of mental disorder*. San Antonio: The Devereux Foundation.
- Naglieri, J.A., LeBuffe, P.A. & Pfeiffer, S.I. (1994). *Manual of the Devereux scales of mental disorder*. San Antonio: The Devereux Foundation.
- Nezu, A.M., Nezu, C.M., Friedman, S.H. and Haynes, S.N. (1998). Case formulation in behaviour therapy: Problem-solving and Functional Analytic strategies. In T.D. Eells (Ed.), *Handbook of psychotherapy case formulation*. New York: Guilford Press.
- Patterson, G.R. Etiology and treatment of child and adolescent antisocial behavior. *The Behavior Analyst Today. Vol. 3. No.2.* pp 55-72.
- Swenson, C.C., Henggeler, S.W., Schoenwald, S.K., Kaufman, K.L., and Randall, J. (1998). Changing the social ecologies of adolescent sexual offenders: Implications of the success of multisystemic therapy in treating serious antisocial behavior in adolescents. *Child Maltreatment*, *3*, 330-339.
- Young, J.E., Klosko, J.S. and Weishaar, M.E. (2003). *Schema therapy: A practitioner's guide*. New York: Guilford Press.

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