



Assessing the Effects of Behavioral Activation in a Homeless Shelter: Development and Validation of a Psychometric Instrument

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Introduction and Background

On any given night, the number of people who are homeless is estimated as follows:

- 570,000 in the United States
- 12,000 in Ohio
- 791 in Montgomery County

In collaboration with St. Vincent de Paul, over 300 homeless individuals have participated in our Behavioral Activation Project in homeless shelters. Behavioral Activation, which is based on operant conditioning, is *"...a therapeutic process that emphasizes structured attempts at engendering increases in overt behaviors that are likely to bring [people] into contact with reinforcing environmental contingencies and thereby produce corresponding improvements in thoughts, mood, and overall quality of life"* (Hopko et al., 2003, p. 700).

Activities are designed to:

- Enhance empowerment (e.g., computer training)
- Enhance coping (e.g., stress management)
- Enhance shelter environment (e.g., music)

The goals of the ongoing project include:

- To provide activities that guests perceive to be meaningful, important, and enjoyable
- To contribute to guests' perceptions of hope, agency, purpose, quality of life, social support, well-being, and positive shelter social climate
- To improve long-term outcomes (housing and employment retention) for shelter guests

Purpose of Present Research

This study attempts to develop and validate the Behavioral Activation Treatment Efficacy Measure (BATEM), which was designed to assess several attributes in guests as they participate in Behavioral Activation: hope, agency, purpose, quality of life, social support, well-being, and shelter social climate perception.

BATEM Part 1 measures general perceptions of these attributes at baseline and over time, whereas BATEM Part 2 (administered at follow-up) includes (a) the items from Part 1 (in order to detect change from baseline) as well as (b) items to assess guests' perceptions as to whether Behavioral Activation contributes to corrective change in these attributes. This approach is necessary because, for example, a person could perceive a general decrease in hope due to a negative life event (e.g., losing a job) but, at the same time, believe that Behavioral Activation functions to strengthen his or her hope.

Hypotheses are as follows:

1. BATEM will have strong internal consistency.
2. BATEM will identify effects of the Behavioral Activation on hope, agency, purpose, quality of life, social support, and well-being.
3. BATEM will differentiate individuals with mental illness and/or substance abuse history from individuals without such history.
4. Level of participation in Behavioral Activation will predict short-term outcome on attributes listed above, as assessed by the BATEM.

Methodology

BATEM items were developed according to content validity (comprehensive review of existing measures), an empirical approach (identify items with high factor loadings), and practical utility (adjust items for reading level and place items on a 1-to-5 Likert-like scale).

Among other routine measures, BATEM (Part 1) was completed by 105 guests at baseline, and BATEM (Part 2) was completed by 36 guests at one-month follow-up.

Preliminary Results and Conclusion

1. BATEM has strong internal consistency ($\alpha = .80$).
2. On BATEM (Part 1 Items), mean changes (baseline to follow-up) are in the expected direction for this sample of 36 guests, and statistical analyses are in progress. On BATEM (Part 2), with scores ranging from 1 ("not true") to 5 ("very true"), and with the middle scale point of 3 used as the *test value*, independent-samples *t*-tests ($p < .01$, with large effect sizes) reveal that guests perceive Behavioral Activation as contributing to corrective changes in hope, agency, purpose, quality of life, social support, well-being, and shelter social climate.

Regarding hypotheses 3 and 4, analysis of variance and multiple regression analyses are in progress. Results will be interpreted within the context of overall project findings (Reeb et al., 2014a, 2014b). For references, contact glendeningz1@udayton.edu.

Acknowledgements

This work has been supported in part by the University of Dayton Office for Graduate Academic Affairs through the Graduate Student Summer Fellowship Program.

We also acknowledge contributions from St. Vincent de Paul.