

A Peer Reviewed Publication of the College of Allied Health & Nursing at Nova Southeastern University Dedicated to allied health professional practice and education <u>http://ijahsp.nova.edu</u> Vol. 3 No. 3 ISSN 1540-580X

# Reflection and Evidence-Based Practice in Action: A Case Based Application

Ronald De Vera Barredo, PT, EdD, GCS Associate Professor Arkansas State University Graduate Program in Physical Therapy

# Citation:

De Vera Berrado, R. Reflection and evidence based practice in action: A case based application. *The Internet Journal of Allied Health Sciences and Practice*. July 2005. Volume 3 Number 3.

## Abstract

Reflective practice and evidence-based practice are essential to clinical practice. The former provides a retrospective look at current practice and questions the reason for doing so. The latter provides the means by which best evidence can be used to make foundationally sound and clinically relevant decisions. This article demonstrates the utility of and the dynamics between reflective practice and evidence-based practice in the clinical setting using the first-hand experience of a physical therapist in home health care who worked with an elderly patient diagnosed with benign paroxysmal positional vertigo. The outcomes of the clinical case serve as the basis for critical reflection by the clinician, and the springboard for the clinican's retrospective search for evidence. The employment of the principles of reflective practice and evidence-based practice has led the clinician to an awareness of habituated practices, the need for a more proactive approach to providing effective interventions, and the use of current best evidence to advocate for patient welfare. In order to maintain the first-hand clinical perspective and the integrity of the reflective process, the clinical case and the subsequent critical reflection were written in first-person language.

#### Introduction

Evidence-based practice (EBP) continues to gain momentum as the framework of practice among health care practitioners.<sup>1,2</sup> Through a process of linking best evidence to clinical outcomes, practitioners are able to make more empirically based clinical decisions. Despite this trend, however, factors such as time, access, knowledge, and others constrain clinicians from fully utilizing the practice.<sup>2-4</sup>

In its conduct, EBP appears to follow five steps: defining the case-based question, searching for and collecting the best evidence, critically appraising the strength of the evidence, integrating clinical expertise and patient values in the context of the evidence, and evaluating the effectiveness of entire process. <sup>5,6</sup> Of the five steps outlined, the fifth step in the process provides the reflective component in the practice framework, where professionals look back at an experience or situation to analyze what was learned.<sup>7</sup>

Incorporating critical reflection into EBM not only allows the clinicians to evaluate the efficacy of the treatment, but also forces them to generate alternatives to the practice that are efficient and effective. The subsequent case from actual clinical practice demonstrates how both critical reflection and evidence-based practice can be utilized in patient care.

## **Clinical Case**

The following case study revolved around a patient diagnosed with benign paroxysmal positional vertigo (BPPV). I had the opportunity to work with this patient only once during an episode of care, and was not the primary physical therapist of the patient. However, with permission from the primary physical therapist, the patient, and the home health agency, I was able to review, audit, and critique the physical therapy management of the patient based on information dablaro69026025023tite(h) © 1050r0ts (WhTigh (whtthe corio84eTc (0021) Tig(001) Tig(001) Tig(001) been living with her son since she became widowed five years ago. They lived in a cluttered two-bedroom, singlestory house owned by the son, who worked as a cook in the local high school. Since school was off during the summer, the son was present during the physical therapy evaluation of the patient. Both the patient and her son supplied subjective information during the evaluation session.

During evaluation, the patient reported that she felt very dizzy and that her head would spin whenever she got up out of bed, stood up from sitting, or made any sudden movements or changes in posture. Because of this, she would first have to "get her bearings" for about a minute,

afitte ardjuc b Studde the symj0.05184 Tc (b) Tmj0.05184 Tc (b) Tt0.02592 Tc (t) Tj0. (t) Tj-07z t.05184 Tc (b) Tt eiget made anyu abg

t ) TjO. () ) Tn 5184 Tc (o)) TjOjBlQ856028362(ce))(7) TECEUPEDITIONOGE 624jj0c7(080e8643je1Tq05)(cp)j0j5622850266269)26502044.\$247j223826(4)/TJO.(542632jiii)256283562(ce))(7)

higher negative results for the Dix-Hallpike test compared with the sham procedure. The major strengths of the study included the randomized assignment of patients into experimental and sham groups and the blinded assessment during follow-up. Its limitation revolved around the inconsistency of follow-up time and how the length of time between treatment and follow up affected the results of both groups.

A post hoc PubMed Clinical Queries search using "therapy" as category and "narrow, specific search" as scope yielded 13 randomized controlled trials, seven of which were eliminated after the exclusion criteria outlined earlier were imposed. Of the remaining articles, two were duplicates from the previous search, and four were unduplicated articles. Of the four articles, three<sup>13.15</sup> found the Epley maneuver effective and one<sup>16</sup> did not see the benefit of the procedure for the treatment of BPPV.

# Critical Reflection After Searching for Research Evidence

The aphorism about hindsight being 20/20 accurately describes the sentiment I feel in relation to the care developed for and provided to the patient. On a personal level, as a health care provider, my *raison d etre* is to help and heal, not to harm or hurt. U4 Tc (e) i84 Tc (h) Tj-0.18816 Tcos Tc (m) Tj-0.2376 T hi

Reflection and Evidence Based Practice in Action: A Case Based Appl