



# ABS051

## EVALUATION OF MODIFIED BORG DYSPNOEA SCORE AND 6-MINUTE WALK TEST IN PULMONARY ARTERIAL HYPERTENSION PATIENTS RECEIVING PHOSPHODIESTERASE INHIBITORS

Teena Nazeem<sup>\*1</sup>,  
Sabin Thomas<sup>2</sup>,  
Dr. Govinda Ajmera<sup>3</sup>

<sup>1</sup>Assistant Professor,  
Krupanidhi College of  
Pharmacy, Bangalore

<sup>2</sup>Assistant Professor,  
College of Pharmacy,  
University of Nizwa,  
Sultanate of Oman

<sup>3</sup>Clinical Pharmacist,  
Clinical Pharmacy  
Department, CHL Apollo,  
Indore.

**Introduction:** Pulmonary Arterial Hypertension (PAH) is a progressive condition that results in right heart failure and death<sup>1</sup>. Patients with PAH who do not receive disease targeted therapy have a poor quality of life and high mortality rates with a median survival of less than three years from diagnosis<sup>2,3</sup>. In the last few years, oral Sildenafil Citrate (a specific phosphodiesterase-5 inhibitor which is widely used in the treatment of erectile dysfunction), has shown promising results as a novel oral monotherapy in the treatment of PAH<sup>4,5</sup>.

**Methodology:** A prospective open label randomized study was conducted over a period of 8 months in hospitalized patients who visited the in-patient block in a tertiary care hospital in Nilgris. Simple Randomization technique was adopted to allocate the patients into three study groups. At the baseline Visit, Modified Borg Dyspnea Scale (MBDS) and 6 MWT (6 Minute Walk Test) were evaluated to confirm study criteria and were allotted into 3 doses based on their severity upon Right Ventricular Systolic Pressure. The same parameters were assessed on each visit for all the patients throughout the study period.

**Results and Discussion:** In our study, Sildenafil Citrate showed an improvement in MBDS and 6 MWT after 8 months of therapy which were assessed using Kruskal-Wallis non-parametric test. A remarkable improvement in 6MWT from 171.88 ±52.4 metres to 337.12±71.84 metres was observed. There was an improvement in dyspnea by Borg scale in all study groups. Cor-pulmonale patients were more benefited ( $p < 0.001$ ) whereas patients with Atrial Septal Defect (ASD) and Rheumatic Heart Disease (RHD) also improved significantly ( $p < 0.05$ ).

**Conclusion:** Sildenafil has been reported to be well tolerated among the patient population. The patients who were slightly affected at baseline with moderate to severe dyspnoea became slight grade which

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