## C.V.A and Calcanium Eversion with Hamstring Tightness -A Correlative Study

## Bhatnagar<sup>1</sup>, Shubha Sen<sup>2</sup>, Siddhartha, Arfath<sup>3</sup>, Umar

<sup>1</sup>MPT Student, SBSPGI, Balawala, Dehradun.

## Abstract

Muscle strain injuries are common, yet the mechanisms of injury remain vaguely defined. The hamstring muscle group is one of the most complex sets of muscles in the body and these muscles are highly abused. One factor that makes hamstring muscle so susceptible to injury is their anatomical arrangement being a biarticular muscle group means that they may be subjected to large length changes. There are number of clinically useful sets of myofascial chain. The suboccipital muscle, hamstring and calf muscle are included in same superficial back line so. addressing any of the structure in the chain may have positive effect of the entire line itself. This study tries to find out a correlation between hamstring tightness, C.V.A and Calcanium Eversion which are influnced by the muscles in the same superficial back line. Present study included 60 subjects who were divided into three groups according to their hamstring tightness. C.V.A and Calcanium eversion was calculated for each subject in a single session. Correlation was calculated by pearson correlation test. Finding of the present study showed that there is a positive correlation between hamstring tightness and Calcanium eversion and a negative correlation between hamstring tightness and C.V.A.

Keywords: Hamstring tightness, Superfecial Back Line, Calcanium Eversion, C.V.A, Active Knee Extension Test, Lateral Photographic Method.

## Introduction

Muscle strain injuries are common, vet the mechanisms of injury remain vaguely defined. The hamstring muscle group is one of the most complex sets of muscles in the body, intricately involved in both locomotion and stability of the lower extremity. Unfortunately, however, these muscles are highly abused. One factor that makes hamstring muscle so susceptible to injury is its anatomical arrangement being a biarticular muscle group means that they may be subjected to large length changes. The hamstrings are often ignored in the weight room in deference to their stronger, more Date of Communication: Oct.24, 2013 Date of Acceptance: Dec. 24, 2013

aesthetically appealing counterpart, the quadriceps. Hamstrings tightness is one of the most common problem which is faced by a majority of population be it an athlete or a sedentary worker. Nearly 85 million Americans suffer from Hamstring muscle tightness each year. Muscle tightness can contribute to uncoordinated and awkward movements thus increasing the potential for injury.

Tom Mayer has described a number of clinically useful sets of myofascial chain. According to this concept,the muscle may end at the attachment point,

SJIF IMPACT FACTOR 2013=4.65

<sup>&</sup>lt;sup>2</sup>Associate Professor Department of Physiotherapy, SBSPGI, Balawala, Dehradun. Email: siddhartha.pt@gmail.com

<sup>&</sup>lt;sup>3</sup>Assistant Professor, Department of Physiotherapy, SBSPGI, Balawala, Dehradun.