

## **BACHELOR THESIS ABSTRACT**

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**Oponent:**

**Title of bachelor thesis:** The effect of foot stimulation on postural stability of patients after stroke – objectivisation by a footscan

### **Abstract:**

This bachelor thesis is focused on determining the effect of foot stimulation on the postural stability of stroke patients using stimulation aids.

Three hemiparetic patients have been chosen for this thesis. The therapeutic effect has been analyzed using the Footscan®7.x system, a noninvasive method showing the foot sole pressure distribution.

Measurements have been taken before and after foot stimulation in several standing modifications: standing on a broad basis and standing on a narrow basis. In each of these two standing modifications, measurements with eyes opened and closed have been taken.

Three different types of stimulation aids have been used in each patient item-by-item. Values of the parameters before and after foot stimulation were entered into tables allowing for the comparison of all three aids. The results are presented in tables and graphs.

**Key words:** Postural stability, stroke, footscan, foot, stimulation aids