Abstract:

This bachelor's thesis deals with the use of HandTutor technology in occupational therapy with people after brain damage.

The theoretical part describes HandTutor technology, brain damage and subsequent occupational therapy intervention. HandTutor technology is presented as an active rehabilitating system of upper limb including diagnostic and therapeutic part.

The practical part contains the aim of the thesis, research questions and the methodology of the research. In my research, the progress of therapies with HandTutor technology is presented by two case reports of people after brain damage. The result of the research is the record of the changes in the parameters measured by HandTutor technology. The changes are reflected in the charts and visual supplements. The conclusion summarises the responses of research questions describing also the problems which can occur while using this technology.

This thesis serves as an introduction HandTutor technology, specifies its use in occupational therapy with people after brain damage and recommends futher research of the diagnostic data analysis in an objective evaluation.

Key words:

HandTutor
occupational therapy
brain damage
upper limb
objective evaluation