Surgery vs physiotherapy for cervical radiculopathy: surgery provides faster pain relief

**Population**
- All patients suffering from cervical radiculopathy of more than 3 months' duration at the time of inclusion.

**Methods**
- **Randomization:** Randomized controlled trial (RCT). foresight involved a blinded, 2-month intervention period before the start of surgery. Treatment groups were randomized using a computer-generated sequence.
- **Intervention:** Cervical surgery (Surgical Group: 33 patients) or nonsurgical treatment (Nonsurgical Group: 35 patients). Surgical treatment included anterior cervical disectomy and fusion followed by structured physiotherapy or strictly physiotherapy.

**Results**
- **Primary Outcome:** Self-reported disability (Neck Disability Index - NDI). Secondary outcomes included pain assessments, global assessment, global change score, and patient satisfaction.
- **Findings:** At 6 months, both groups showed significant improvements in disability and pain, with no significant differences between the groups. At 2 years, the surgical group showed significantly better results in all outcomes except global satisfaction and global change score. The surgical group was more satisfied with the treatment at 2 years.

**Discussion**
- This study suggests that patients suffering from cervical radiculopathy will experience accelerated benefits from surgery. Surgery plus physiotherapy was more successful than surgery alone.

**Sponsor:** Medical Research Council of Southeast Sweden

**Funding:** Non-Industry funded

**Conflicts:** No

**Sponsor:** Medical Research Council of Southeast Sweden

**Funding:** Non-Industry funded

**Conflicts:** No

**Synopsis**

**Physiotherapy Alone With a 2-Year Follow-up**

**Prospective, Randomized Study Comparing Surgery Plus Physiotherapy With Nonsurgical Group: Patients completed an individualized 3 step program that consisted of neck specific exercises and procedures, general exercises and pain coping, increasing self-efficacy and stress management. The program was to be completed every day at home as well as twice a week in the clinic for 3 months.**

**Methods:**
- The study was conducted in a tertiary care setting in Sweden. Patients were randomized to either the surgical group or the nonsurgical group. The surgical group underwent anterior cervical disectomy and fusion followed by physiotherapy or strictly physiotherapy. The nonsurgical group received an individualized 3 step program that consisted of neck specific exercises and procedures, general exercises and pain coping, increasing self-efficacy and stress management.

**Results:**
- At 6 months, both groups showed significant improvements in disability and pain, with no significant differences between the groups. At 2 years, the surgical group showed significantly better results in all outcomes except global satisfaction and global change score. The surgical group was more satisfied with the treatment at 2 years.

**Discussion:**
- This study suggests that patients suffering from cervical radiculopathy will experience accelerated benefits from surgery. Surgery plus physiotherapy was more successful than surgery alone.

**Conclusion:**
- Surgery plus physiotherapy provides faster pain relief than surgery alone. Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**How will this affect the care of patients?**
- Surgery plus physiotherapy is recommended for patients with severe cervical radiculopathy, as it provides faster pain relief and better outcomes at 2 years.

**What were the important findings?**
- Surgery plus physiotherapy provides faster pain relief than surgery alone.
- At 2 years, the surgical group showed significantly better results in all outcomes except global satisfaction and global change score. The surgical group was more satisfied with the treatment at 2 years.

**What was the study needed now?**
- Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**What are the important limitations?**
- The study included patients with cervical radiculopathy of more than 3 months' duration at the time of inclusion.
- The study was conducted in a tertiary care setting in Sweden.

**Conflicts:**
- None

**Sponsor:** Medical Research Council of Southeast Sweden

**Funding:** Non-Industry funded

**Conflicts:** No

**Conclusion:**
- Surgery plus physiotherapy provides faster pain relief than surgery alone. Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**How will this affect the care of patients?**
- Surgery plus physiotherapy is recommended for patients with severe cervical radiculopathy, as it provides faster pain relief and better outcomes at 2 years.

**What were the important findings?**
- Surgery plus physiotherapy provides faster pain relief than surgery alone.
- At 2 years, the surgical group showed significantly better results in all outcomes except global satisfaction and global change score. The surgical group was more satisfied with the treatment at 2 years.

**What was the study needed now?**
- Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**What are the important limitations?**
- The study included patients with cervical radiculopathy of more than 3 months' duration at the time of inclusion.
- The study was conducted in a tertiary care setting in Sweden.

**Conflicts:**
- None

**Sponsor:** Medical Research Council of Southeast Sweden

**Funding:** Non-Industry funded

**Conflicts:** No

**Conclusion:**
- Surgery plus physiotherapy provides faster pain relief than surgery alone. Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**How will this affect the care of patients?**
- Surgery plus physiotherapy is recommended for patients with severe cervical radiculopathy, as it provides faster pain relief and better outcomes at 2 years.

**What were the important findings?**
- Surgery plus physiotherapy provides faster pain relief than surgery alone.
- At 2 years, the surgical group showed significantly better results in all outcomes except global satisfaction and global change score. The surgical group was more satisfied with the treatment at 2 years.

**What was the study needed now?**
- Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**What are the important limitations?**
- The study included patients with cervical radiculopathy of more than 3 months' duration at the time of inclusion.
- The study was conducted in a tertiary care setting in Sweden.

**Conflicts:**
- None

**Sponsor:** Medical Research Council of Southeast Sweden

**Funding:** Non-Industry funded

**Conflicts:** No

**Conclusion:**
- Surgery plus physiotherapy provides faster pain relief than surgery alone. Further research is needed to determine the long-term effects of surgery plus physiotherapy versus surgery alone.

**How will this affect the care of patients?**
- Surgery plus physiotherapy is recommended for patients with severe cervical radiculopathy, as it provides faster pain relief and better outcomes at 2 years.