

Goodyear-Smith F, Arroll B. What can family physicians offer patients with carpal tunnel syndrome other than surgery? A systematic review of nonsurgical management. *Ann Fam Med.* 2004;2:267-273.

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Appendix 1. Study Methods

| Concealment of Allocation | Method of Randomization | Follow-up | Blinding | Quality |
|---|---|--|--|---|
| Aigner & Fialka, 199 | 8 ¹ RCT, Laser acupunctu | ure vs placebo | | |
| Not stated | Not specified | Before and after intervention, preoperatively and 3 mo postsurgery. No dropout specified | Single blinded. Blinding not specified | Small numbers Methodology and quantitative results not specified |
| Carter et al, 2002 ² RC | CT, Magnetic disk vs pla | cebo | | |
| Magnet and placebo disks identical in appearance. Codes identifying experimental or control group not broken until completion of study | Random selection of identical boxes | 20/30 (67%) follow-up at 2 wk | Blinded Outcome assessment blinded | Small numbers with high dropout Excellent concealment and blinding |
| Chang et al, 1998 ³ R | CT, NSAID; diuretics; or | al steroid vs placebo | | |
| Patients unaware of whether receiving active drug or one of the placebos | Randomization list developed and kept by an individual not involved in care or evaluation of patients | 11/84 (13%) dropped out by 4-wk follow-up 5 refused to continue participation; reasons not given | Blinding of patients and assessors | Fair study Small numbers Follow-up only to 4 wk No reporting on any adverse effects |
| Dammers et al, 1999 ⁴ RCT, Injected steroid vs placebo | | | | |
| Patients unaware of which injection was steroid and which placebo | Random allocation. Method not stated | 100% retention No patients lost to follow-up at 1 y | Blinding of injectors and assessors | Good-quality study Trial stopped at 1 mo to offer control group the injection |

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| Concealment of | Method of Randomization | Follow-up | Blinding | Quality |
|---|---|---|--|--|
| Devie et el 1008 ⁵ Sir | | r oliow-up | Diniding | Quanty |
| Davis et al, 1998 [°] Sir Opaque envelopes | Computer-generated random sequence of letters | 23% dropout at end of treatment | Patients not blinded | High dropout rate Did not differentiate between potential effects of NSAID, chiropractic treatment, or splinting |
| | | 26% dropout at follow- up | Assessors blinded for NCS but not for clinical assessment | |
| Ebenbichler et al, 19 | 98° RCT, Ultrasound vs | placebo | | |
| Sham ultrasound allowed mock insonation given when key turned to on position. Opaque envelopes | Allocation of placebo wrist by random list | 30/45 (66%) follow-up at 6 mo | Patients, ultrasound therapists, and assessors all blinded | High dropout rate |
| | Sequentially numbered | | | |
| Elbaz et al, 1994 ⁷ RC | T, Injected steroid vs pl | acebo | | |
| Not stated | Not stated | Follow-up at 6 wk Dropout not stated | Outcome assessment blinding not stated | Abstract only |
| Garfinkel et al, 1998 | ³ RCT, Yoga vs splint | | | |
| Sealed envelope | Random selection s | 42/51 (82%) follow-up at 8 wk | Outcome assessment blinded | Single blinded |
| Herskovitz et al, 19 | 995 ⁹ RCT, Oral steroid v | rs placebo | | |
| Not stated | Not stated | No dropout at 8 wk | Outcome assessment blinded | Small sample size |
| | | | | Significantly reduced symptoms at 2 wk but not sustained at 4 or 8 wk |
| O'Gradaigh & Merry, 2000 ¹⁰ RCT, Injected steroid vs placebo | | | | |
| Not stated | Random allocation. Method not stated | No dropout recorded | Not stated | Adequate sample size |

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| Concealment of Allocation | Method of Randomization | Follow-up | Blinding | Quality |
|---|---|---|--|---|
| Ozdogan & Yazici, 1 | 984 ¹¹ RCT, Injected ster | oid vs placebo | | |
| Patients unaware of which injection was steroid and which placebo | Random allocation. Method not stated | Follow-up at 1 wk, 1 mo, 10-12 mo 10/35 (29%) dropout | Blinding of injectors and assessors | Good-quality study High dropout rate |
| | | after 1 mo | | for long-term reevaluation |
| Oztas et al, 1998 ¹² R | CT, Ultrasound vs place | bo | | |
| Patients unaware of which ultrasound they received | Random allocation. Method not stated | Follow-up at 2 wk No dropout stated | Blinding of ultrasound therapists and assessors not stated | Small numbers |
| Rozmaryn et al, 1998 ¹³ Before-after after case study using historical controls; nerve and tendon gliding exercises plus usual treatment vs usual treatment only | | | | |
| No concealment | No randomization, case-controlled study | Follow-up at 6 mo | Not blinded | Results could be confounded by |
| | Similar at baseline | | | changes in surgeons' intervention criteria |
| Spooner et al, 1993 ¹⁴ RCT, Pyridoxine vs placebo | | | | |
| Capsules containing | Random number table | 32/35 (91%) | Double blinded | Good compliance |
| pyridoxine or placebo identical. Type of medication known only to | | follow-up at 12 wk | Outcome assessment blind | assessed by blood assay |
| | | | | High retention rate |
| phannacist | | | | Adequate sample size |
| Stransky et al, 1989 ¹⁵ RCT, Pyridoxine vs placebo | | | | |
| Concealment between pyridoxine & placebo, including cross-over | Randomly assigned. Method not stated | 13/15 (87%) follow-up after 9 wk treatment | Not described | Small numbers; good methods |

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| Concealment of Allocation | Method of Randomization | Follow-up | Blinding | Quality | | | |
|---|--|---|---|---|--|--|--|
| Walker et al, 2000 ¹⁶ R | Walker et al, 2000 ¹⁶ RCT, Splint use, full-time vs nighttime | | | | | | |
| Not reported | Randomization protocol based on last digit of social security number: Experimental group = even number Control group = odd number | 24/30 hands (80%); 17/21 patients Follow-up at 6 wk | Unblinded Outcome assessment apparently not blinded | Poor compliance: only 46% had strict adherence Only 27% of experimental group had complete or near-complete daytime use; 23% of control group had some daytime use | | | |
| Wong et al, 2001 ¹⁷ RCT, Steroid injection vs oral steroid | | | | | | | |
| Yes: placebo injection or placebo oral tablet | Randomly assigned Method not stated | 100% follow-up at 12 wk | Patients and assessor blinded | Good study Adequate sample size | | | |

RCT = randomized controlled trial; NSAID = nonsteroidal anti-inflammatory drug; NCS = nerve conduction study.

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