

# Combined Manual Therapy Techniques for the Treatment of Women With Infertility: A Case Series

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## BACKGROUND

### CDC definition of infertility:

The inability to get pregnant after one year of unprotected intercourse<sup>1</sup>

### Normal Fertility Rates of women (aged 22-40 years)<sup>4</sup>:

20% conceive in 1 month

57% percent of fertile couples will conceive in the first 3 months

72% in 6 months

85% in 1 year

### Causes of infertility:<sup>9</sup>

Tubal Factors: 7%

Ovulatory Dysfunction: 7%

Diminished Ovarian Reserve: 15%

Endometriosis: 4%

Uterine factors: 1%

Male Factors: 17%

Other: 7%

Unknown: 12%

### Spontaneous pregnancy rates in “infertile” couples:

In Canada, Collins et al<sup>6</sup> found that pregnancy rates for

873 infertile couples without any treatment were 35% after 3 years

and 45% after 7 years.

### Costs for Current Infertility Procedures:

Median cost for IVF<sup>4</sup>: \$24,373

## PURPOSE

Just as mechanical dysfunction in a joint is due to fascial restrictions and edema resulting in decreased mobility, it is hypothesized that fascial restrictions and edema within the pelvis can cause decreased mobility of the pelvic organs and result in a mechanical infertility.

## MATERIALS AND METHODS

### Intervention

Ten infertile women ages 28-41 were evaluated and treated based on findings and received external manual therapy techniques, twice a week until no further mechanical issues were found on exam. The number of sessions required ranged from 1-6.

### Treatment Protocol

1. Assessed the pelvis for asymmetry: corrected asymmetry with muscle energy, if needed<sup>13</sup>
2. Assessed sacral mobility: corrected dysfunction with craniosacral techniques<sup>17</sup>
3. Assessed for trigger points around and within the pelvis: treated trigger points with positional release techniques<sup>18</sup>
4. Assessed lymph drainage of the pelvis and pelvic organs: applied manual lymph drainage, if needed<sup>11</sup>
5. Assessed mobility and motility of pelvic viscera: used visceral manipulation techniques to release restrictions, if needed<sup>15</sup>
6. Reassessed symmetry and all mobilities
7. Treatments were repeated twice a week until there was no restriction in mobility, pelvis was symmetrical, and lymph was flowing normally

Table 1: Profile and Physical Findings

Patient No.	Pregnant	Delivered Full Term	Osseous Issues	Visceral Fascia	Lymphatics	N	Type of Infertility	Maternal Age
1	Yes	Yes	Moderate Sacral Restriction	Normal Mobility	Normal	2	Primary	30
2	Yes	Yes	Moderate Sacral Restriction	Mild Decreased Uterine Mobility	Mild Pelvic Congestion	4	Secondary	34
3	No	No	Moderate Sacral Restriction	Mild Decreased Uterine Mobility	Normal	4	Secondary	41
4	No	No	Moderate Sacral Restriction	Severe Decrease Uterine Mobility	Severe Pelvic Congestion	4	Secondary	28
5	No	No	Mild Sacral Restriction	Severe Decrease Uterine Mobility	Severe Pelvic Congestion	4	Secondary	36
6	No	No	Severe Sacral Restriction	Severe Decrease Uterine Mobility	Uterus Congested	6	Primary	33
7	Yes	Yes	Normal	Normal Mobility	Moderate Pelvic Congestion	2	Secondary	34
8	Yes	Yes	Normal	Mild Decreased Uterine Mobility	Moderate Pelvic Congestion	2	Secondary	39
9	Yes	Yes	Normal	Mild Decreased Uterine Mobility	Normal	1	Secondary	36
10	Yes	Yes	Severe Sacral Restriction	Severe Decrease Uterine Mobility	Normal	6	Primary	41

Table 2: Past Medical and Surgical Histories

Patient No.	Past Medical History	Past Surgical History	Time Attempting Conception	No. of Treatments	Type of Infertility	Maternal Age	Pregnant	Delivered Full Term
1	None	None	1 Year	2	Primary	30	Yes	Yes
2	Low Back Pain	C Section	1 Year	4	Secondary	34	Yes	Yes
3	R Ovarian Tumor, Low Back Pain, Miscarriage	D & C, Laparoscopy (R Ovarian Tumor Removed)	2 Years	4	Secondary	41	No	No
4	Irregular Cycle, Miscarriage	EP Study Ablation, Breast Augmentation	6 Years	4	Secondary	28	No	No
5	Miscarriage	None	3 Years	4	Secondary	36	No	No
6	Endometriosis	Pelvic Laparoscopy	2 Years, 9 Months	6	Primary	33	No	No
7	Miscarriage	None	1 Year	2	Secondary	34	Yes	Yes
8	Miscarriage	None	7 Years	2	Secondary	39	Yes	Yes
9	Normal	None	1 Year	1	Secondary	36	Yes	Yes
10	Low Back Pain	None	3 Years	6	Primary	41	Yes	Yes

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## RESULTS

6 out of 10 women conceived within a 3 month period of the termination of treatment and delivered at full term

## CONCLUSIONS

Further research is needed to assess the efficacy of manual therapy as a treatment option for infertile women. For future studies, researchers should use a larger study population, include a control group, and assess the efficacy of the individual manual techniques. If proven efficacious, other research options also could include the use of manual therapy techniques as an adjunct with current in vitro and intrauterine treatment protocols. The combination of manual techniques in conjunction with acupuncture or other complimentary therapies are other avenues of investigation.

## REFERENCES

1. Centers for Disease Control and Prevention. Infertility. Updated April 2, 2009. <http://www.cdc.gov/nchs/fastats/fertile.htm>. Accessed September 22, 2009.
2. Chikly B. Silent Waves: Theory and Practice of Lymph Drainage Therapy. Scottsdale, AZ: International Health & Healing Inc.; 2005.
3. Dey SK. How we are born. J Clin Invest. 2010 Apr 1;120(4):952-5.
4. Schorge JO, Schaffer JI, Halvorson LM, Hoffman BL, Bradshaw KD, Cunningham FG. Williams Gynecology. New York, NY: McGraw Hill; 2008: chap 19.
5. Katz V, Lobo R, Mientz G, Gershenson D. Comprehensive Gynecology. 5th ed. Philadelphia, PA: Mosby Elsevier; 2007.
6. Collins JA, Burrows EA, Wilan AR. The prognosis for live birth among untreated infertile couples. Fertil Steril. 1995 Jul;64(1):22-8.
7. van der Steeg JW, Steures P, Eijkemans MJ et al. Pregnancy is predictable: a large-scale prospective external validation of the prediction of spontaneous pregnancy in subfertile couples. Hum Reprod. 2007 Feb;22(2):536-42.
8. Katz P, Showstack J, Smith JF, et al. Costs of infertility treatment: results from an 18-month prospective cohort study. Fertil Steril. Dec 2010.
9. Baker VL, Jones CE, Cometti B, et al. Factors affecting success rates in two concurrent clinical IVF trials: an examination of potential explanations for the difference in pregnancy rates between the United States and Europe. Fertil Steril. Sept 2010;94(4):1287-91.
10. Chila AG. Foundations of Osteopathic Medicine. Third Edition. New York, NY: Lippincott Williams & Wilkins; 2011.
11. Sandring S. Gray's Anatomy Fortieth Edition. London, UK: Elsevier; 2008.
12. Barral JP. Visceral Manipulation II. Seattle, WA: Eastland Press; 1989.
13. Barral JP. Urogenital Manipulation. Seattle, WA: Eastland Press; 1993.
14. Upledger JE, Vredevoogd JD. Craniosacral Therapy. Seattle, WA: Eastland Press; 1996.
15. D'Ambrogio KJ, Roth GB. Positional Release Therapy. St. Louis, MO: Mosby; 1997.
16. Beal MW. Women's use of complementary and alternative therapies in reproductive health care. J Nurse Midwifery. 1998 May-Jun;43(3):224-34.
17. Warr B, Wum L, King R, et al. Treating female infertility and improving IVF pregnancy rates with a manual physical therapy technique. Medscape General Medicine. 2004;6(2).
18. Barral JP, Croibier A. Visceral Vascular Manipulations. New York, NY: Churchill Livingstone Elsevier; 2011.
19. Stone CA. Visceral and Obstetric Osteopathy. New York, NY: Elsevier; 2007.
20. Ethics Committee of the American Society for Reproductive Medicine. Fertility treatment when the prognosis is very poor or futile. Fertil Steril. 2004 Oct;82(4):806