Treating Fibromyalgia with Biomagnetic Pairs

Preliminary Results 2018

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## What is Fibromyalgia (FM)?

Fibromyalgia is a chronic condition characterised by generalised pain, fatigue, waking unrefreshed, feeling confused and having many other ailments such as migraines, IBS, irritable bladder, problems sleeping, etc.

### Study aims

 This project aimed to test the effectiveness of a complementary therapy called biomagnetic pairs (BMP) on treating fibromyalgia (FM)

#### Effectiveness was defined...

• For individuals

as reaching minimal clinically important difference (MCID) in at least one of the two measures most commonly used in FM studies

• As a group

as reaching statistical significant difference for a one tailed, paired t-test

# What is biomagnetic pairs therapy?

- It is a form of magnetic therapy first discovered by Dr Broeringmeyer, a NASA physician, and developed by Dr Goiz, a physician and physiotherapist
- When there is an illness in the body, a localised magnetic imbalance is present
- A pair of north and south magnets is used to restore balance
- This allows the body's own mechanisms to finish the process of getting well
- It is based on empirical research, not any faith system
- Few sessions are needed
- Outcomes are often long-lasting

# Study design

- Questionnaires were given
  - Just before treatment started (pre)
  - As soon as treatment was ended (post)
  - Six months after treatment was finished (follow-up)
- Fibromyalgia Impact Questionnaire (FIQ) with 80 points
- Pain visual analog scale (pain VAS) with 10 points
- Also fatigue visual analog scale (fatigue VAS) with 10 points
- As many treatments as necessary (number of sessions varies according to participant's needs)

Participants: 27 people with confirmed FM diagnosis (via NHS letter)

Female 25, male 2 Age mean 54 ± 11 years Years with FM 9.8 ± 7.5 Also diagnosed with chronic fatigue/ME 7

Pain medication summary: Amitriptyline 8, Paracetamol 8, Tramadol 4, Pregabalin 2, Gabapentin 3, Ibuprofen 2, Duloxetine 2, Cocodamol 3, Dihydrocodeine 1.

Number of BMP treatment sessions 6.4 ± 1.5

MCID FIQ: drop of 11 points or more (in bold); 17 out of 27 (63%) achieved MCID and 11 (41%) maintained at follow-up. Pre-post paired t-test, one tail: p<0.0001; prefollow-up p=0.00014.

Participant	FIQ pre	FIQ post	FIQ 6mo
M1	67.74	72.27	69.58
M2	73.05	68.20	
F1	46.62	9.85	9.51
F3	31.35	10.90	14.77
F4	54.73	8.00	8.00
F6	51.63	41.14	63.29
F7	42.79	5.33	12.43
F8	66.85	41.92	66.58
F9	58.55	44.79	44.32
F11	63.26	37.14	60.42
F12	50.65	33.28	
F13	49.21	24.19	20.77
F14	38.83	31.92	
F15	61.03	31.60	54.46
F16	38.47	9.86	12.43
F17	60.06	21.20	9.73
F18	16.47	3.00	1.00
F19	50.60	16.98	48.43
F20	59.88	51.42	
F21	44.48	37.55	34.96
F22	41.82		34.32
F23	63.57	54.71	
F25	57.34	28.482	54.91
F27	49.95	44.25	35.91
F28	70.67	27.19	34.06
F29	47.81	37.06	
F30	54.61	24.86	

MCID pain VAS: drop of 2 points or more (in bold); 16 out of 27 (59%) achieved MCID and 10 (37%) maintained at follow-up. Pre-post paired t-test, one tail: p<0.0001; prefollow-up p=0.0015

Participant	Pain VAS pre	Pain VAS post	Pain VAS 6mo
M1	9.5	9.5	10
M2	8	8	
F1	7.5	1	1
F3	0	0	1
F4	6	2	2
F6	6.5	5.5	5.5
F7	7.5	0	0
F8	9.5	5	7.5
F9	8	7	5
F11	7	6	8
F12	7	7	
F13	4.5	2.5	2.5
F14	5.5	5	
F15	7	5	7
F16	6	0	0
F17	8.5	4.5	2.5
F18	0	0	0
F19	5	2	7
F20	9	7	
F21	7	3	5
F22	5		4
F23	8.5	5	
F25	8.5	3	8
F27	6	7	5
F28	9	7	2
F29	4	5.5	
F30	6	4	

No minimal clinically important difference established for fatigue. Pre-post paired t-test, one tail: p=0.00013; prefollow-up p=0.022

Participant	Fatigue VASpre	Fatigue VASpost	Fatigue VAS6mo
M1	9.5	9.5	10
M2	8	10	
F1	4.5	0.5	1
F3	8	3	3.5
F4	8	1	1
F6	7.5	9.5	9.5
F7	7.5	1	10
F8	8.5	5	9.5
F9	9	9	6
F11	7	6	8
F12	8	2	
F13	8.5	4.5	3.5
F14	5.5	5	
F15	8	7	9
F16	7	0	3
F17	10	4.5	0.5
F18	4	0	0
F19	7	3	10
F20	10	9	
F21	5	7	8
F22	7		6
F23	8.5	9	
F25	7.5	2	9
F27	7	7	4
F28	10	2	3
F29	6	7.5	
F30	8	5	

### Discussion

- 63% benefited according to FIQ, reaching MCID or better; benefit maintained by 41% after six months with no further BMP intervention
- 59% reached a MCID for pain; 37% at follow-up
- Also improved fatigue and varied symptoms such as sleep, mood, IBS, migraines
- 20% reported transient effects post-treatment for a max of 48 hrs (eg polyuria, headache, fatigue)
- 80% would recommend this treatment to others
- Project will continue to reach 30 participants

#### References

Bailey J (2010) Bioenergetic Basics: The Art of Dynamic Wellness with Goiz Biomagnetic Pairs. BookSurge Publishing, United States, 254 pages. ISBN-13: 978-1439202593.

Bennett RM, Bushmakin AG, Cappelleri JC, Zlateva G, Sadosky AB (2009) Minimal clinically important difference in the fibromyalgia impact questionnaire. Journal of Rheumatology, 36:1304 – 1311. Doi: 10.3899/jrheum.081090.

Burckhardt CS, Clark SR, Bennett RM (1991) The fibromyalgia impact questionnaire: development and validation. J Rheumatol. 18(5):728-33.

Carville SF, Arendt-Nielsen S, Bliddal H, Blotman F, Branco JC, Buskila D, Da Silva JAP, Danneskiold-Samsøe B, Dincer F, Henriksson C, Henriksson KG, Kosek E, Longley K, McCarthy GM, Perrot S, Puszczewicz M, Sarzi-Puttini P, SilmanA, Spa"th M, Choy EH (2008) EULAR evidence-based recommendations for the management of fibromyalgia síndrome. Ann Rheum Dis 67:536–541. doi:10.1136/ard.2007.071522.

Hawker GA, Mian S, Kendzerska T, French M (2011) Measures of adult pain. Arthritis Care and Research, 63:S240-S252.