



Scoliosis SOS Clinic

City of London

ScolioGold - The gold-standard non-surgical treatment for scoliosis and postural correction

Does a Four-Week Intensive Scoliosis-Specific Exercise Programme Improve Body-Image in Subjects with Idiopathic Scoliosis and is the Effect Rated Equally by Patients, Physiotherapists and An External Rater with Scoliosis?

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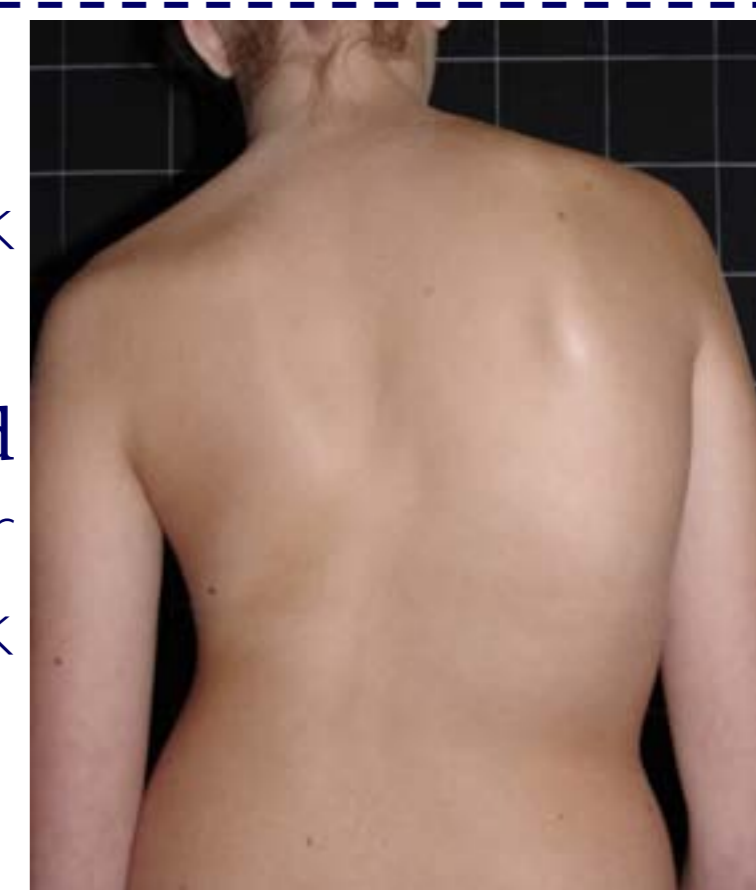
Introduction; Body Image Importance & Who Best To Rate It

- Body Image or cosmetic appearance is the primary concern for many patients seeking treatment and one that can have vast implications on people's psychological status.
- Previous studies have revealed huge differences of opinion between doctors and their patients, regarding aesthetics in spinal deformities. However, client-centred care highlights the need to take patients' personal views of their condition into account when determining Body Image improvements.
- This study investigates whether a four-week intensive scoliosis-specific exercise programme improves scoliosis patients' Body Image and if this is rated equally by patients, therapists and another scoliotic rater.



Method

- 82 patients with Idiopathic Scoliosis were treated with a four-week intensive scoliosis-specific physiotherapy course (ScolioGold).
- Patients' Body Image was rated by: the patient, two blinded physiotherapists and a blinded scoliotic rater, using a 0-10 scale (left) for 5 elements; Head, Shoulders, Ribs, Waist & Hips and a posterior trunk photograph (right) taken pre and post four-week treatment sessions.
- 10 = Very unhappy with posture and 0 = No problems with posture

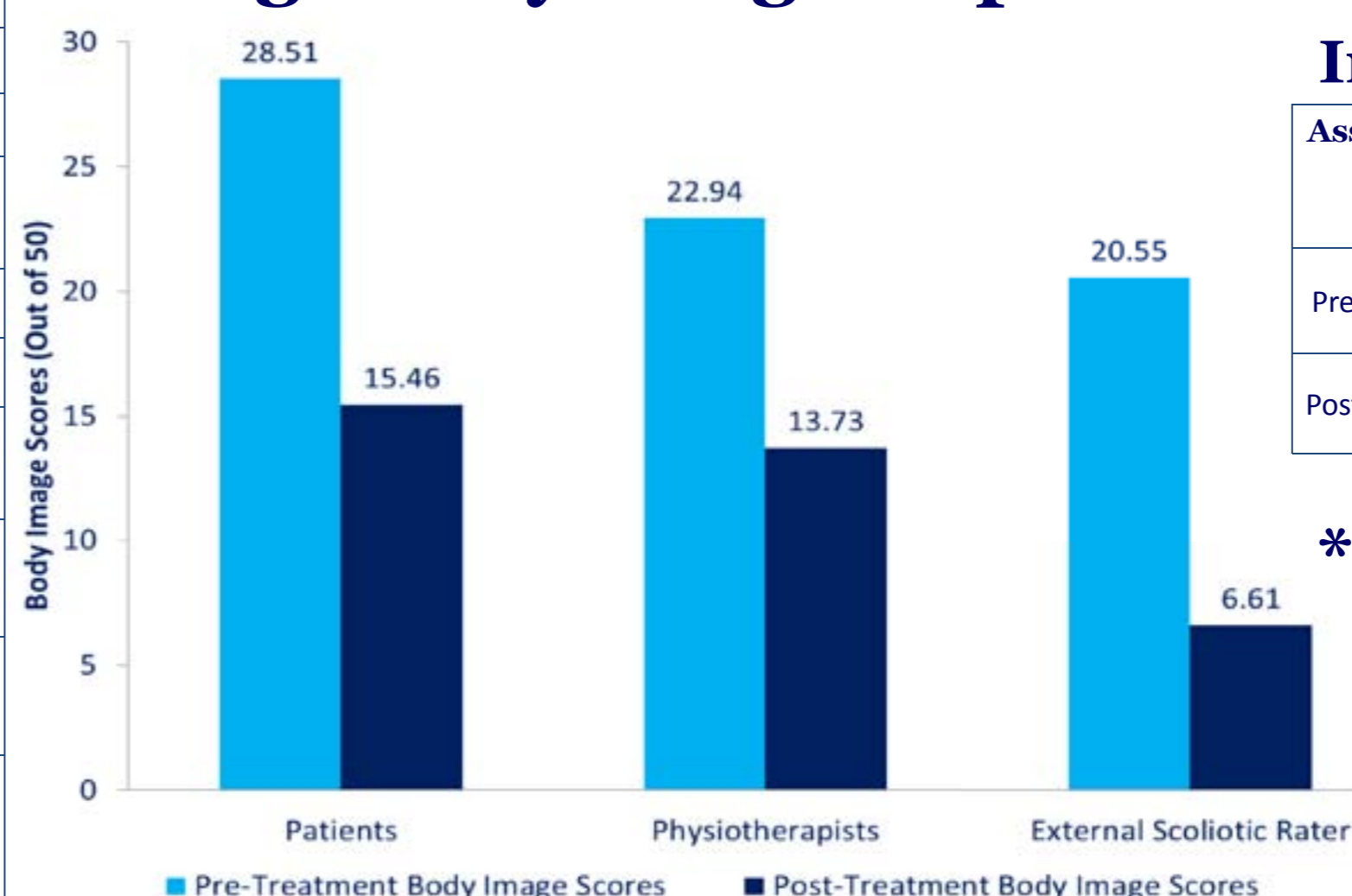


Patient Number	82
Sex (F:M)	70:12
Mean Age (years)	30.79
Age Range (years)	10 – 81

Results

	Mean Total Scores (out of 50)	Standard Deviation	P-value
Patient Pre-treatment	28.51	8.76	-
Patient Post-treatment	15.46	7.40	-
Patient Change (Pre → Post Treatment)	13.05	-	<0.001
Therapist Pre-treatment	22.94	6.01	-
Therapist Post-treatment	13.73	5.88	-
Therapist Change (Pre → Post Treatment)	9.21	-	<0.001
External Scoliotic Rater Pre-treatment	20.55	7.27	-
External Scoliotic Rater Post-treatment	6.61	4.10	-
External Scoliotic Rater Change (Pre → Post Treatment)	13.94	-	<0.001

Average Body Image Improvement



Inter-rater Correlations[†]

Assessment Time	Patient & Therapist	Patient & External Rater	Therapist & External Rater
Pre-treatment	0.28 (fair)	0.19 (slight)	0.58 (moderate)
Post-treatment	0.34 (fair)	0.28 (fair)	0.59 (moderate)

Results Explained

As Body Image was scored out of 50, a **high score = poor Body Image** and a **low score = good Body Image**.



Before Treatment

After Treatment

Conclusion

- Statistically significant improvements in patients' Body Image post treatment.
- Improvements in a range of patients; juvenile, adolescent & adult scoliosis
- Results substantiate intensive exercise (e.g. ScolioGold) for treating scoliosis-related Body Image & also as an alternative to surgery (usually considered a cosmetic procedure).
- Significant variation exists between patients, their physiotherapists and an external scoliotic rater when scoring Body Image. Highlights the subjectivity of this outcome measure and the importance of patient-rated Body Image in our treatment approach.

[†] Landi and Koch Agreement Criteria: <0.20 Slight, 0.21-0.40 Fair, 0.41-0.60 Moderate, 0.61-0.80 Substantial, > 0.81 Almost Perfect