

CO RELATION BETWEEN ANAL SQUEEZE PRESSURE AND PELVIC MUSCLE SQUEEZE – A PROSPECTIVE STUDY OF 117 PATIENTS.

Aims of study

The aim of this prospective study was to look at the co relation between digital pelvic muscle squeeze and anal and rectal squeeze pressures.

Study design, materials and methods

Faecal incontinence poses remains a distressing and under reported condition. Physiotherapy including bio feedback has been effectively used in the management of faecal incontinence. One hundred and seventeen serially reporting patients with urinary incontinence had anal manometry and vaginal digital assessment of pelvic muscle squeeze. The best of three squeezes were recorded on ano rectal manometry. Pelvic muscle squeeze was recorded after urodynamics and ano rectal manometry again using 'best of three' squeezes by an independent assessor. The physiologist and the assessor were blinded to each others' findings. Patients who were unable to generate any reading on ano rectal manometry were excluded from the study.

Results

Data was analysed using SSPS 6 software.

Correlations

		PMS	ARP	ASP	RRP	RSP
PMS	Pearson Correlation	1	.058	.159	-.098	.079
	Sig. (2-tailed)		.536	.088	.293	.399
	N	117	117	117	117	117
ARP	Pearson Correlation	.058	1	.735(**)	.248(**)	.211(*)
	Sig. (2-tailed)	.536		.000	.007	.022
	N	117	117	117	117	117
ASP	Pearson Correlation	.159	.735(**)	1	.099	.218(*)
	Sig. (2-tailed)	.088	.000		.286	.018
	N	117	117	117	117	117
RRP	Pearson Correlation	-.098	.248(**)	.099	1	.612(**)
	Sig. (2-tailed)	.293	.007	.286		.000
	N	117	117	117	117	117
RSP	Pearson Correlation	.079	.211(*)	.218(*)	.612(**)	1
	Sig. (2-tailed)	.399	.022	.018	.000	
	N	117	117	117	117	117

** Correlation is significant at the 0.01 level (2-tailed).

* Correlation is significant at the 0.05 level (2-tailed).

Interpretation of result/ conclusion

There is good linear co relation between anal and rectal squeeze pressures and anal and rectal resting pressures. This indicates that continent subjects are able to use their external sphincter and levator sling effectively. There is poor co relation between digital pelvic squeeze

pressure and all ano rectal manometric parameters. This may indicate that vaginal pelvic muscle squeeze may not be used as an effective tool to measure levator squeeze either for diagnosis or during treatment of faecal disorders.