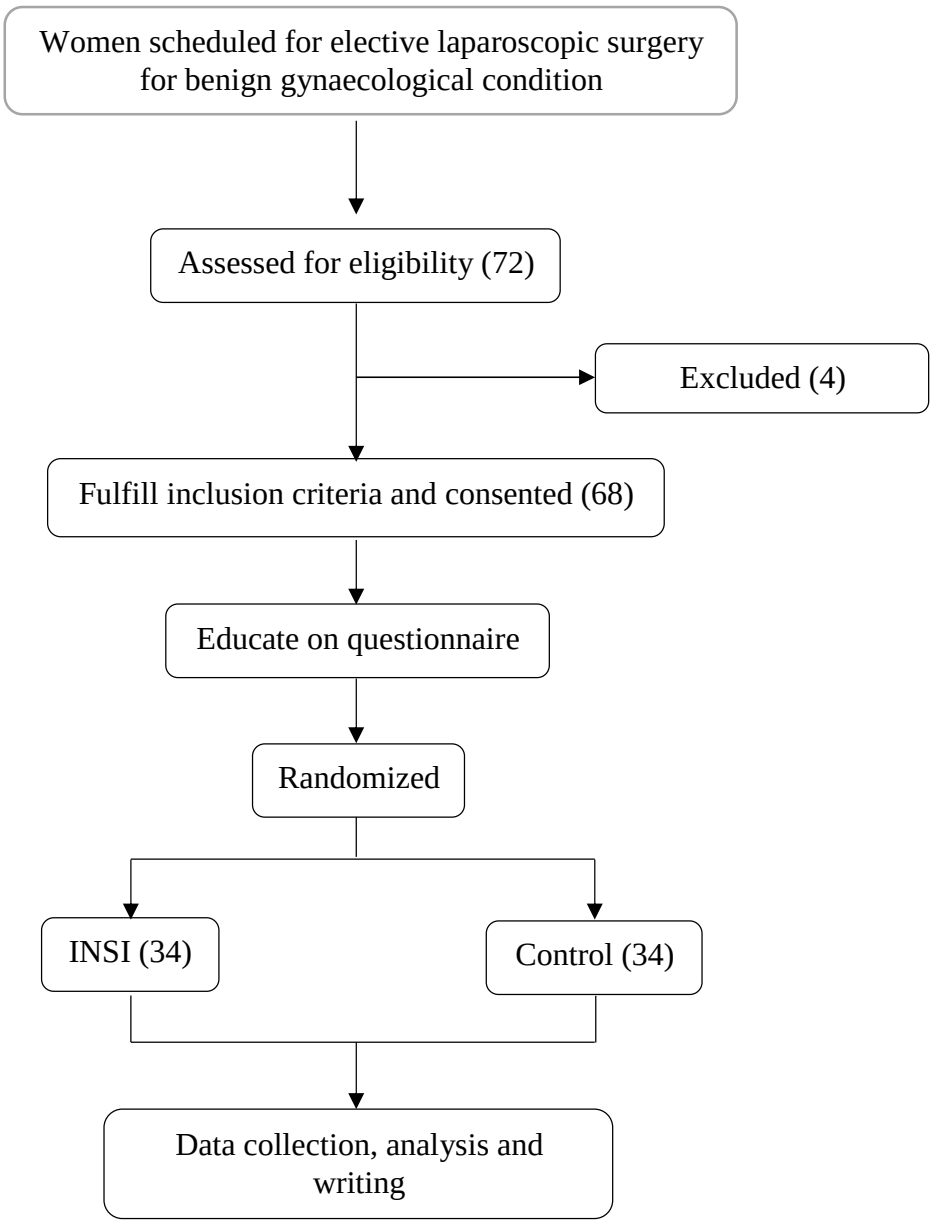
Participant flow



Baseline characteristics

Variables	Control N=34	Intraperitoneal Normal Saline (INSI) N=34	*p*
Age (year)	36.1 (±8.9)	35.6 (±8.9)	0.948
Parity			0.332
Nulliparous	16 (47.1%)	12 (35.3%)	
Parous	18 (52.9%)	22 (64.7%)	
Married	30 (88.2%)	29 (85.3%)	0.596
Race			0.809
Malay	19 (55.9%)	22 (64.7%)	
Chinese	8 (23.5%)	3 (8.8%)	
Indian	4 (11.8%)	7 (20.6%)	
Others	3 (8.8%)	2 (5.9%)	
Body Mass Index (kg/m^2)	25.2 (±5.4)	27.9 (±6.7)	0.063
ASA classification			0.455
I	22 (64.7%)	20 (58.8%)	
II	12 (35.3%)	14 (41.2%)	
Previous abdominal surgery	10 (29.4%)	10 (29.4%)	0.860
Indication for surgery			0.173
Hysterectomy	0 (0%)	1 (2.9%)	
Myomectomy	2 (5.9%)	1 (2.9%)	
Ovarian cystectomy	8 (23.5%)	10 (29.4%)	
Tubal ligation	2 (5.9%)	1 (2.9%)	
Diagnostic laparoscopy	5 (14.7%)	2 (5.9%)	
Salpingectomy	8 (23.5%)	13 (38.2%)	
Salpingo-oophorectomy	5 (14.7%)	1 (2.9%)	
TLHBSO	4 (11.8%)	4 (11.8%)	
Operative Time (mins)	80.2 (±37.2)	93.2 (±40.5)	0.170
Estimated blood loss (mls)	409 (±453)	365 (±232)	0.698
Trocars inserted			0.134
2	4 (11.8%)	0 (0.0%)	
3	25 (73.5%)	29 (85.3%)	
4	5 (14.7%)	4 (14.7%)	
Postoperative hospital stay (days)	1.8 (±0.7)	1.8 (±0.8)	0.871

Data expressed as mean ± standard deviation; median (interquartile range); number (%) as appropriate.
Analyses by Fisher exact test for 2x2 categorical data and Chi square test for larger than 2x2 categorical data;

Student t test for comparison of mean for continuous data which is normally distributed; Mann-whitney test for non-normally distributed data.

Outcome measures

1. **Post-operative shoulder pain**

	Control N=34	INSI N=34	P value
At rest			
24h	13 (38.2%)	5 (14.7%)	0.028
48h	9 (26.5%)	3 (8.8%)	0.058
72h	2 (5.9%)	5 (14.7%)	0.079
Numeric rating scale			
24h	0 (0-1)	0 (0-0)	0.055
48h	0 (0-1)	0 (0-0)	0.066
72h	0 (0-0)	0 (0-0)	0.079
On movement			
24h	15 (44.1%)	8 (23.5%)	0.075
48h	11 (32.4%)	6 (17.6%)	0.144
72h	5 (14.7%)	2 (5.9%)	0.221
Numeric rating scale			
24h	0 (0-3)	0 (0-2)	0.115
48h	0 (0-1)	0 (0-0)	0.186
72h	0 (0-0)	0 (0-0)	0.213

Data expressed as median (interquartile range); number (%) as appropriate.

Analyses by Fisher exact test for 2x2 categorical data and Chi square test for larger than 2x2 categorical data;

Student t test for comparison of mean for continuous data which is normally distributed; Mann-Whitney test for non-normally distributed data.

2. Post-operative abdominal pain

	Control N=34	INSI N=34	P value
At rest			
24h	28 (82.4%)	28 (82.4%)	1.000
48h	24 (70.6%)	20 (58.8%)	0.214
72h	12 (35.3%)	6 (17.6%)	0.102
Numeric rating scale			
24h	3.32 (±2.33)	2.56 (±2.05)	0.155
48h	2 (2-3)	1 (0-2)	0.059
72h	3 (3-4)	0 (0-0)	0.092
On movement			
24h	33 (97.1%)	34 (100%)	0.321
48h	31 (91.2%)	26 (76.5%)	0.103
72h	23 (67.6%)	13 (38.2%)	0.015
Numeric rating scale			
24h	5.18 (±1.90)	4.35 (±2.17)	0.101
48h	3.29 (±1.77)	2.21 (±1.97)	0.019
72h	1 (0-3)	0 (0-1)	0.006

Data expressed as median (interquartile range); number (%) as appropriate.

Analyses by Fisher exact test for 2x2 categorical data and Chi square test for larger than 2x2 categorical data;

Student t test for comparison of mean for continuous data which is normally distributed; Mann-Whitney test for non-normally distributed data.

3. Post operative variables

	Control N=34	INSI N=34	P value
Extra analgesia			
D1	0 (0%)	0 (0%)	-
D2	0 (0%)	0 (0%)	-
D3	0 (0%)	0 (0%)	-
Nausea			
D1	3 (8.8%)	4 (11.8%)	0.692
D2	0 (0%)	0 (0%)	-
D3	0 (0%)	0 (0%)	-
Vomit			
D1	2 (5.9%)	1 (2.9%)	0.558
D2	0 (0%)	0 (0%)	-
D3	0 (0%)	0 (0%)	-
Abdominal distension			
D1	13 (38.2%)	8 (23.5%)	0.193
D2	1 (2.9%)	1 (2.9%)	0.100
D3	0 (0%)	0 (0%)	-

Data expressed as number (%)

Analyses by Fisher exact test for 2x2 categorical data and Chi square test for larger than 2x2 categorical data.

Adverse events

There were no adverse events associated with this study.