

ABSTRACT

Traditionally, stress urinary incontinence (SUI) has been managed through pelvic floor physiotherapy, vaginal ring pessary (Introl or Contiform) and /or surgery.

Historically, vaginal rings were more suitable for older women not fit for surgery, or younger women who either wished to delay surgery until completion of their families or were only incontinent during certain activities.

The Contiform device has been proven to have a dry rate of 54%¹ but has had low uptake due to short term durability and thus cost. A new device, the Continence Dish (**Figure 1**), has been in use since 2011. However, to date, there has been one review article which does not contain objective outcome data².

OBJECTIVES

To determine the efficacy of the continence dish for SUI (and mixed urinary incontinence (MUI)).

METHODS

All patients fitted with the Continence Dish since 2011 were contacted. The primary outcome (ICIQ, score 0-21) was collected prior to dish insertion and post treatment, along with Incontinence Impact Questionnaire (IIQ, reported on 0-100)³.

Efficacy was measured by a 24-hour pad test with dish in situ. Patients with pure SUI and MUI were analysed separately (Wilcoxon rank).

RESULTS

Patients with SUI or MUI (n=92) were fitted with a continence dish, of whom 47% (43/92) did not continue using due to:

- A) inability to retain ring (16%, 7/43);
- B) minimal benefit (20/43, 46.5%);
- C) proceeded to surgical repair by patient choice (8/43, 18.6%).

Data could not be collected in 8 (18.6%): because they declined to join the study, moved out of area or where found medically unfit to participate.

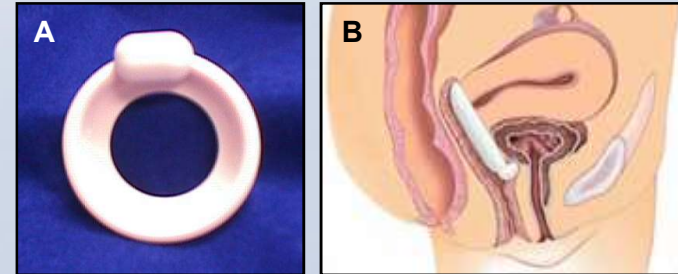
Thus, 49 patients who continued to use the Continence Dish were enrolled. Baseline demographic data, including age and duration of use (**Table 1**).

Table 1: Demographics data.

Patient characteristics	
Median age (yrs)	68
Postmenopausal	39/49 (80%)
Vaginal oestrogen use	44/49 (90%)
Type of Incontinence	
Pure SUI	10/49 (20%)
MUI	39/49 (80%)
Duration of continence dish use for:	
Pure SUI (months)	15 (IQR 11 – 21)
MUI (months)	24 (IQR 14 – 38)

RESULTS

Figure 1: A. "Pink" and B. "White" Continence Dish



The majority of women presented within the last 4 years (with 5 women seen earlier). More than half (27/49) of the women were able to self-remove and reinsert the dish (recruitment continues).

Table 2: Pre- and post-continence dish outcome measures.

Outcome Measure	Pre-therapy (IQR)	Post-therapy (IQR)	P-value	% dry
ICIQ				
Mixed	16 [13–19]	9 [5–14]	0.28	37%
Pure SUI	10 [7–16]	7 [1–12]	0.25	50%
24h pad test (g)				
Mixed	-----	5.4 [0.4–15]		37%
Pure SUI	-----	0 [0–1.6]		88%
IIQ				
Mixed	-----	14 [2.4–43]		77%
Pure SUI	-----	29 [0–57]		75%

The outcome measure of 24h pad-test demonstrates a dry rate of 88% in pure SUI compared to lower rates of 37% in Mixed incontinence as expected (**Table 2**).

Since abstract submission, a further 6 patients have been enrolled (5 pure SUI and 1 MUI). The results remains materially unchanged, enrolment continues.

CONCLUSIONS

The pure SUI patients had dry rate of 88% on pad test, 50% on ICIQ, and 75% were "Good" on IIQ. Not surprisingly, women with MUI had lower dry rates (37%, 37% and 77%, respectively).

This is the first report about Continence Dish objective efficacy, showing 88% of SUI women were dry on pad test.

In view of concerns re mesh-based mid-urethral slings, these data should be available to incontinent women.

REFERENCES

- Morris & Moore, *Int J Urogynaecol.* (2003), 14:412-417.
- Nager et al., *Int J Urogynaecol.* (2009), 20:1023-1028.
- Karmakar et al., *Int J Urogynaecol.* (2017), 28:95-100.