

## CREATION OF A NEOVAGINA BY DIVIDING LABIAE MINORAE IN ROKITANSKI SYNDROME. FUNCTIONAL RESULTS AT 5 YEARS FOLLOW-UP.

### Hypothesis / aims of study

Our aim was to evaluate complications and functional results when creating a neo vagina by dividing in two the labiae minora in Rokitanski syndrome.

### Study design, materials and methods

This is a retrospective study about patients who underwent surgery for utero vaginal aplasia in our unit between 2000 and 2007. Patients operated since 2007 were excluded to only have long term follow-up.

Surgery was performed under general anaesthesia. After infiltration of diluted Xylocaïne – adrenaline, the recto vesical space is dissected up to the ischial spines. The labiae minora are dissected and divided into two flaps. These flaps are sutured in the new cavity with absorbable stitches. A dummy of about 15 cm long and 3 to 5 cm width (depending on the dimensions of the new cavity) is placed in the neovagina, and the patients were asked to keep it in place permanently for 1 month, during the night for the second month, then occasionally when there is no sexual activity. Patients were taught how to manage the dummy. Sexual intercourse were allowed when normal epithelium and healing was obtained.

All medical records have been retrospectively reviewed. Patients were contacted by phone call to explain the aim of the study and to propose a clinical evaluation. Patients were seen in consultation in June 2009 by the same physician (who did not perform any of these surgeries) with evaluation of anatomic characteristics of the neo vagina. Patients filled a sexuality questionnaire and Visual Analogic Scales were used for global satisfaction of management and results (0: very unsatisfied, to 10: very satisfied).

### Results

During the study period, 20 patients underwent surgery for utero vaginal aplasia in our unit. Eight patients could not be seen again as they have changed address, one did not wish to come and one forgot the appointment, leaving 10 patients for evaluation. Mean operating time was 53.76 min (+/- 9.16) and mean hospitalization length was 5 days. We observe no operative complication but persistent average bleeding in one at five days post op without need for blood transfusion and no life threatening condition. Re intervention was performed and bleeding was stopped by a simple suture. One patient had to be re operated at two months because of vaginal stenosis such as the dummy could no more be put in place; vaginal dilatation under general anaesthesia was performed and the dummy was placed. Follow up was uneventful for this patient, but she still uses the dummy permanently since her intervention two years ago; this patient fears a recurrent stenosis because she is not sexually active. All other nine patients have stopped using the dummy for at least 2 years.

Mean follow up at the time of consultation was 5.5 years (+/- 2.7). Mean length of the vagina is 5.78 cm (+/- 1.62), admitting two fingers (index and medius) width. Epithelium was considered normal in all cases. All patients declare they are heterosexual, 3 are single, 7 live in couple among which 2 got married since the surgery. All the 9 sexually active patients said they felt sexual desire, very regularly reaching orgasm during the prelude and had normal lubrication. None reported dyspareunia and only two exceptionally used lubricant in case of long lasting intercourse. Seven patients said they felt pleasure at time of penetration, 2 reaching orgasm. All patients and partners said they were happy with their sexuality. Mean global sexual VAS satisfaction was 8.25 (+/- 1.66).

### Interpretation of results

Our results show that this technique is simple and fast to perform, with a low complication rate. Laparoscopic techniques and Vecchiotti technique need longer operating time and require further vaginal dilatations. Sigmoidoplasty may lead to heavy complications. The Mac Indoe technique has a high rate of stenosis and dyspareunia. Modified techniques with skin grafts have an aesthetic impact at the level of the graft donor site.

Our present data show that the mean vaginal length is shorter than in some others techniques, but this does not seem to impact on the sexual satisfaction of our patients. The overall satisfaction on VAS is 8.25, and all our patients and their partners declare they are happy with their sexual life. One explanation could be the quality of the epithelium in the neo vagina due to the use of labia minora tissues, allowing an important elasticity during intercourse.

One limit of our study is the small number of patients, mostly due to the rare occurrence of this entity. We decided not to contact patients operated within the last 2 years in order to only focus on patients with sufficient long term follow up about sexual function. Half of our patients are lost to follow up because they have changed address and could not be reached any more.

Another limit of our study is the use of a non validated sexual function questionnaire. There is no French validated translation of the Female Sexual Function Index, and we designed a self made questionnaire based on the items usually used in publications about the same topic. This does not allow us to give a score and makes it difficult to compare with other techniques. However, the overall satisfaction rate of our patients and the absence of dyspareunia are in favour of good functional results.

### Concluding message

Creating a neo vagina by dividing in two the minora labiae is a simple technique with low complication rates. Our results show good functional results and high sexual satisfaction levels with 5 years follow up. We believe this technique is a good option when treating utero vaginal aplasia in Rokitanski syndrome.

<i>Is this a clinical trial?</i>	No
<i>What were the subjects in the study?</i>	HUMAN
<i>Was this study approved by an ethics committee?</i>	No
<i>This study did not require ethics committee approval because</i>	it is a retrospective study of functional results after a surgical technique that has already been described
<i>Was the Declaration of Helsinki followed?</i>	Yes
<i>Was informed consent obtained from the patients?</i>	Yes