

electroejaculation. Use of donor's sperm has also been attempted. Others have taken preemptive steps to avoid this situation by performing autologous semen cryostorage. However, the additional cost involved is sometimes not very attractive to patients. Furthermore, patients that fail to ejaculate on the DOR do not necessarily show signs of this potential situation during the performance of semen analysis for male evaluation. In this case, the authors describe an alternate and simpler method of obtaining spermatozoa for ICSI from cervical mucus collected on DOR when accompanied with semen collection failure.

DESIGN: Case report.

MATERIALS AND METHODS: On the DOR, the husband was instructed to collect a semen specimen for analysis and processing 90 min prior to oocyte retrieval. Failure to collect the semen specimen was reported by the patient. The embryologist recommended collecting the cervical mucus before oocyte retrieval as a back-up source of sperm. The cervical mucus was aspirated and was analyzed for the presence of viable sperm and incubated further. The patient was asked to attempt additional semen collections during the day. The performance of ICSI was modified; aliquots of cervical mucus were added to a drop of micromanipulation media for selection of sperm before transfer to PVP for immobilization.

RESULTS: The patient was unable to ejaculate after four collection attempts during the day even with partner's assistance. Indicators of possible problems were an increase in the time required to collect the semen as compared to the time taken during previous semen analyses. In this case, the initial semen collection attempt was prolonged for up to 45-50 min. The volume of cervical mucus was approximately 0.3 mL. The rheologic properties of the cervical mucus made direct addition to PVP difficult. The presence of mucin and cervical cells also impaired the handling of sperm for ICSI. Addition of cervical mucus aliquots to drops of micromanipulation allowed for sperm to swim-out of the mucus. A total of 10 MII oocytes were injected resulting in a FR of 60%. Two embryos were transferred on day 3 resulting in a positive pregnancy (quantitative β -hCG).

CONCLUSION: It is important to realize that the effect of initial semen collection failure often inhibits the male's proper sexual response, which may manifest as failure to achieve erection, emission and subsequent ejaculation. Indicators to prevent this potential problem may be identified by timing the ejaculatory interval during semen collection. Recovery of sperm in cervical mucus represents a non-invasive alternative to those patients unable to collect a semen specimen on the DOR due to anxiety or stress. In our clinic, patients are advised routinely to have intercourse around the time of hCG administration (36 hrs to retrieval), allowing sperm to be available in the cervix on the DOR. Specimens collected in this way may be harvested as a backup source of sperm in case further attempts fail to produce a semen specimen on the DOR/IVF.

Supported by: Centro de Fertilidad del Caribe

P-1008

MICRO TESTICULAR SPERM EXTRACTION (MICROTESE) AND IVF-ICSI OUTCOME IN MEN WITH NON-OBSTRUCTIVE AZOOSPERMIA. P. Ravizzini, L. Salgueiro, V. Abdelmassih, S. Abdelmassih, P. T. Salgueiro, R. Abdelmassih. Clinic and Research Center for Human Reproduction Roger Abdelmassih, São Paulo, Brazil.

OBJECTIVE: Evaluate the efficiency of surgical Micro Testicular Sperm Extraction (MicroTESE) and the outcome of IVF-ICSI related patients.

DESIGN: Retrospective study in a private clinic.

MATERIALS AND METHODS: Twenty one patients who previously underwent unsuccessful sperm retrieval attempts with Percutaneous Epididymal Sperm Aspiration (PESA) and Testicular Sperm Aspiration (TESA) were submitted to the MicroTESE technique under general anesthesia. All patients had non-obstructive azoospermia, testicular atrophy, and elevated levels of FSH. Open testicular dissection under 25 to 40x microscopic vision and selective retrieval of seminiferous tubules was performed. While extracted, tubules were sent to the lab and immediately dissected and analyzed for the presence of sperm. Same setting bilateral exploration was carried out when no sperm were found in the exploration of the first testicle. The procedure was scheduled one day in advance of trans-vaginal ultrasound oocyte aspiration. The sperm retrieved were kept in culture media to be used for oocyte injection in the following day. Sperm retrieval rate, mean ICSI, embryo and transference number and pregnancy rate were accessed. Pregnancy rate was calculated individually per couple independent from the number of cycles carried out to achieve clinical pregnancy.

RESULTS: From 21 patients submitted to MicroTESE, sperm were found in 14 (Retrieval Rate = 66.6%). Twelve had only rare and immotile spermatozoa and 2, grade C (motile in situ) spermatozoa. In the rare and immotile spermatozoa group, 5 patients attained clinical pregnancy in the first attempt (35.7%) and two failed the first attempt but successfully achieved clinical pregnancy in the subsequent cycle (14.3%) with their own thawed sperm previously retrieved with MicroTESE. In the grade C spermatozoa group, one couple achieved clinical pregnancy in the first attempt (7.1%). Overall clinical pregnancy was achieved in 57.1%. Intracytoplasmic sperm microinjection was performed in a mean of 7 oocytes per case (from 2 to 10) and fertilization was confirmed in a mean of 4.6 (from 1 to 9). Finally, 1 to 4 embryos were transferred per couple (mean of 2.9).

CONCLUSION: Surgical sperm retrieval using the MicroTESE technique is a viable option for men with Secretory Azoospermia and could be used in cases of unsuccessful PESA or TESA, prior to the indication of the use of donor sperm for ICSI. Comparable outcome of IVF-ICSI in related cases may be expected even with the use of immotile sperm.

Supported by: Private support

P-1009

SPERM MORPHOLOGY BEFORE AND AFTER CAPACITATION. L. Elberger, M. M. Grünwaldt, A. E. Divita, G. Arenas, P. S. Buxeda, E. S. Polak de Fried. CER Medical Institute, Capital Federal, Argentina.

OBJECTIVE: The objective of this study is to evaluate if sperm morphology is modified by capacitation.

DESIGN: Retrospective cohort study.

MATERIALS AND METHODS: In this retrospective study, fifty-two male infertile patients who consulted at our Department of Reproductive Medicine, were evaluated consecutively in a same period of time. A semen analysis was performed in each patient, and morphology was assessed according to the World Health Organization (WHO; 1987,1992) before and after capacitation by swim-up. The same trained operator in the same laboratory, under strict criteria, performed the procedures and evaluations. A value $\geq 20\%$ was considered normal. Semen samples were divided into two groups according to the basal morphology. Twenty-seven out of 52 had basal WHO $\leq 10\%$ and were assigned as Group A, and 25 out of 52 had a basal level $\geq 11\%$ and were assigned as Group B. Variables analyzed included: basal morphology, post swim-up morphology, shift's absolute value and shift's relative value. Statistical analysis was performed by means of Student-t test and Mann-Whitney test. Results were expressed as means of \pm SD. P value $< 0,05$ was considered statistically significant.

RESULTS: The mean morphology value of the overall samples was $10,75 \pm 7,48\%$ in the basal samples and $16,48 \pm 10,21\%$ in the post swim-up samples. The difference between the pre and post values was statistically significant ($P < 0,0001$). When this difference was analyzed in each group, it still conserved statistical difference ($P < 0,0001$ in Group A and B), being the mean morphology value $4,96 \pm 3,29\%$ vs. $9,19 \pm 5,87\%$ pre and post swim-up for Group A and $17,00 \pm 5,38\%$ vs. $24,36 \pm 7,74\%$ pre and post swim-up for Group B. The shift in pre and post swim-up values was analyzed in absolute and relative terms. When this variable was analyzed in absolute terms, a statistically significant difference between Group A and B ($4,22 \pm 3,46\%$ vs. $7,36 \pm 5,85\%$ respectively, $P 0,012$) was found. However if this shift is evaluated in relative terms, Group A showed a higher improvement post swim-up compared to the improvement achieved by Group B ($120,58 \pm 166,85\%$ vs. $46,64 \pm 40,01\%$ respectively, $P 0,003$).

CONCLUSION: According to our results, sperm morphology improves significantly after semen capacitation. This findings could have potential applications in the daily clinical practice.

Supported by: None

P-1010

IMPROVEMENT OF THE SEMEN COLLECTION ENVIRONMENT USING A NEW SEMEN COLLECTION DEVICE. S. Prien, D. Johnson. Texas Tech Univ. Health Sciences Center, Lubbock, TX.

OBJECTIVE: It is well established that rapid changes in specimen temperature can be detrimental to semen quality. While specimen containers are often warmed to 37°C prior to collection, it is not uncommon for the