A Peer Reviewed, Open Access, International Journal www.scienticreview.com ISSN (E): 2795-4951

Volume 24, February 2024

Optimization Of Anesthesiology Management in Gynecology Practice

Khudoyberdieva Gulrukh Sobirjonovna

Samarkand State Medical University, Samarkand, Uzbekistan

In recent years, uterine extirpation surgery has been performed in the gynecology department. Uterine extirpation occurs in 60% of cases when conservative treatment of uterine myoma has failed. According to research conducted at the Department of Gynecology of the multidisciplinary clinic of the Samarkand State Medical University, in 2022-2023, uterine myoma, which is a component of the extirpation of 150 laparotomy operations, is about 56.2%.

Purpose: to improve the efficiency and safety of anesthesia.

Method: use of various types of anesthesia in uterine extirpation surgery in women with uterine fibroids.

Result: all methods of anesthesiological support had an effective level of analgesia. There was no significant difference between the different methods.

Enter. The most common method of surgical intervention in gynecology is hysterectomy [1]. This is because, despite drug therapy, surgery remains the leading method of uterine fibroid treatment today [2]. In Russia, frequent hysterectomy for uterine fibroids is 40-42% of the total number of hysterectomies performed for other diseases [4]. According to the data of the multidisciplinary clinic of the Samarkand State Medical University in 2022 alone, extirpation for uterine fibroids from a total of 228 laparotomy operations is 56.2%. Effective and safe pain relief is one of the most important tasks during surgical interventions, both to ensure adequate analgesia and to prevent the development of possible complications. Long-term immobilization of the patient can be observed both with low supply and with increased analgesia and, accordingly, the risk of complications, leading to the appearance of cardiopulmonary and thromboembolic complications [1]. The choice of tactics, dosage and method of pain relief depends entirely on the individual case, and this question arises before the anesthesiologist. General anesthesia is the most acceptable, but in recent years, central neuroactional block (MNB) methods: spinal, epidural and combined spinal-epidural anesthesia are widely used in practice [3]. The "gold standard" of pain relief in abdominal surgery is neuroaxial anesthesia methods [4].

The main advantages of CNB:

1. When performed successfully, local anesthesia has excellent analgesic properties. In the postoperative period, patients respond better than those who underwent UVIA.

2. In the postoperative period, the need to administer narcotic analgesics is rare, which significantly reduces the need for extradoses of opioids ("resquedose"). This reduces the possibility of side effects

3.Patients' rehabilitation stays and hospital stays are reduced[2].

Among CNB techniques, at the beginning of the 21st century, the technique of combining SA and EA in the form of combined spinal-epidural anesthesia (CSEA) became popular [1].

CSEA is a relatively new technique for regional anesthesia that expands the arsenal of anesthesiologists and avoids long delays. The method allows to combine the

Global Scientific Review

A Peer Reviewed, Open Access, International Journal www.scienticreview.com

Volume 24, February 2024

ISSN (E): 2795-4951

advantages of both methods and to some extent compensate for their disadvantages, primarily by reducing the dose of intrathecal anesthetics [2].

The purpose of the study: to study the effectiveness and safety of the intraoperative anesthesia method with different options of anesthesia.

Duties:

1. To determine the proportion of patients with insufficient intraoperative efficiency and safety under various types of anesthesia.

2. The optimal doses of painkillers used and the time of mobilization of patients into groups with different types of anesthesia are determined.

Materials and methods: The study was conducted in the department of anesthesiology and resuscitation of the multidisciplinary clinic of Samarkand Medical University, 61 patients aged 20 to 65 years were involved in the study.

Groups were compared for sex, age, and comorbidity.

The patients' functional status corresponded to class 2 ASA-50; Class 3 - 11 patients. Exclusion criteria were:

• age of patients is less than 18 years, more than 65 years;

• presence of cognitive impairment, dementia, delirium;

• history of alcohol and drug abuse;

• existence of a language barrier;

• refusal of the patient to participate in the study. Patients were divided into 3 groups: Group I (n=16) - general intravenous anesthesia under conventional endotracheal oxygenation (ETO);

Group II (n=25) - spinal anesthesia (SA) technique,

Group III (n = 10) - under conditions of combined spinal-epidural anesthesia (CSEA). Groups were compared for sex, age, and comorbidity.

All patients received standard premedication of intramuscular atropine 0.1%-1.0 ml + diphenhydramine 1%-1.0 ml + omnopony 2%-1.0 ml 30-40 minutes before anesthesia. For sedation, in some cases, Sibazon 10-20 mg was used.

Depending on the type of anesthesia performed, all patients included in the study were divided into 3 groups:

Group I (n=16) intravenous general anesthesia under conventional endotracheal oxygenation (ETO). In this group of patients, propofol 1.5-4.5 8 mg/kg/h, ketamine 7-8 mg/kg/h together with fentanyl 5-8 mg/kg/h, general intravenous anesthesia with mechanical ventilation based on Arduani was used. . 0.04-0.06 mg/kg/h.

Group II (n = 25) after spinal anesthesia (SA).

In the second group, the subarachnoid space was punctured at the level of L3-4 with 24-25 G needles in the operating room, the patients were sitting or lying on their side. 12.5-15 mg of 0.5% hyperbaric Longocaine-Heavy solution was injected into the subarachnoid space, and after the needle was removed, the patient was turned on his back. Sensory-motor blockade occurred within 5-8 minutes.

Sodium oxybutyrate 50 mg/kg was administered for sedation. Group III (n=10) - under conditions of combined spinal-epidural anesthesia, it was performed by intrathecal injection of 12-15 mg 0.5% Longocaine-Heavy hyperbaric solution, followed by insertion of an epidural catheter. increased.

CSEA was performed using a "needle-by-needle" type using a spinal-epidural anesthesia kit manufactured by Portex.

To begin, a puncture was performed with a Tuohy 18G needle and the epidural space was identified using the "resistance loss" method, after which a 27G spinal "pencil point" needle was inserted into the hole. Catheterization of the epidural space was

Global Scientific Review

A Peer Reviewed, Open Access, International Journal www.scienticreview.com

Volume 24, February 2024

ISSN (E): 2795-4951

performed after the dura mater was punctured with a Tuohy needle and 2.4 ± 0.25 mL of 0.5% hyperbaric solution of Longocaine-Heavy was injected intrathecally. The needle is removed and the catheter is advanced cranially through the Tuohy needle.An aspiration test is performed. In this case, the "test dose" is not informative (the clinical manifestation of SA develops immediately). In aseptic conditions, the patient is placed on the operating table: sagittal plane: tilted 15 degrees to the left. The frontal plane is horizontal. The head rises 15-20 degrees.

Anesthetics and analgesics were used in recommended doses, taking into account anthropometric data and the duration of the operation.

Results:

In group I (TBA), 6.25% of cases had an increase to the pathological level.

In group II (SMA) up to 8%.

No increase was observed in group III (CSEA).

Average score in Group I (TBA) = 1.9375.

Mean score in group II (SMA) = 1.92.

In group III (CSEA) average score = 1.9.

There was no significant difference between the different techniques.

The initial (preoperative) blood pressure level was taken as 100%. Later, the following changes were noted in the indicators:

In group I (TBA) patients, the dynamics of blood pressure did not exceed 15%, but arterial hypertension was often observed, which required the use of various pharmacological corrections. In particular, a series of ganglion-blocking drugs were used.

In patients of group II (SA), the dynamics of blood pressure did not exceed 11%, and intraoperative hypotension was observed in all cases, which was easily compensated by intravenous crystalloids.

Blood pressure dynamics in group III (CSEA) patients did not exceed 8%, and intraoperative hypotension was observed in all cases, which was easily compensated by intravenous injection of crystalloids. Heart rate and SpO2 did not differ significantly in both groups of patients.

Conclusion: All methods of gynecological anesthesia provided an effective level of anesthesia. But the KSEA technique had the best performance, which ensures a smooth course of anesthesia and reliably protects the patient's body from surgical stress. In addition, this method has a more stable hemodynamics compared to the other two groups (TVA and SA), which has a beneficial effect on the operation process. In the postoperative period, a number of patients in group 1 experienced discomfort and moderate pain, and patients in groups 2 and 3 did not complain of pain or discomfort.

The obtained results indicate that local anesthesia can be fully considered as an alternative to TVA.

Literature

- 1. Матлубов, М. М., Худойбердиева, Г. С., & Хамдамова, Э. Г. (2023). ИНТРАОПЕРАЦИОННАЯ СЕДАЦИЯ ДЕКСМЕДЕТОМИДИНОМ ПРИ КЕСАРЕВОМ СЕЧЕНИИ В УСЛОВИЯХ СПИНАЛЬНОЙ АНЕСТЕЗИИ. World scientific research journal, 20(1), 139-144.
- 2. 2. Muratovich, M. M., Sobirovna, X. G., & Melikulovich, M. A. (2022). СРАВНИТЕЛЬНЫЙ АНАЛИЗ СЕДАЦИИ ДЕКСМЕДЕТОМИДИНОМ И

Global Scientific Review

A Peer Reviewed, Open Access, International Journal www.scienticreview.com

Volume 24, February 2024

ISSN (E): 2795-4951

ПРОПОФОЛОМ У БЕРЕМЕННЫХ ЖЕНЩИН ПРИ АБДОМИНАЛЬНОГО РОДОРАЗРЕШЕНИЯ. JOURNAL OF BIOMEDICINE AND PRACTICE, 7(3).

- 3. Худойбердиева, Г., Хамдамова, Э., & Пардаев, Ш. (2020). Премедикация, применяемая при операциях субтотальной гистерэктомии у женщин в менопаузе. *Журнал вестник врача*, *1*(4), 115-119.
- 4. Хайдаров, М. М., Мурадова, Р. Р., & Худойбердиева, Г. С. (2020). Оптимизация премедикации при хирургических вмешательствах в гинекологии. Достижения науки и образования, (5 (59)), 98-102.
- 5. Zayniddinovich, K. N., & Kuilievich, P. S. (2023). OPTIMIZATION OF ANESTHETIC SUPPORT DURING SIMULTANEOUS OPERATIONS ON THE ABDOMINAL AND PELVIC ORGANS. BARQARORLIK VA YETAKCHI TADQIQOTLAR ONLAYN ILMIY JURNALI, 3(1), 331-334.
- 6. Zayniddinovich, K. N., & Kuilievich, P. S. (2023). Improving the efficiency of anesthetic access during simultaneous abdominal and pelvic surgeries in patients with concomitant arterial hypertension. IQRO, 3(1), 12-15.
- 7. Zayniddinovich, K. N., & Kuilievich, P. S. (2023). STABILIZATION OF ANESTHETIC SUPPORT DURING SIMULTANEOUS ABDOMINAL AND PELVIC OPERATIONS. IJTIMOIY FANLARDA INNOVASIYA ONLAYN ILMIY JURNALI, 3(6), 122-124.
- 8. Kurbanov, N. Z., & Sharipov, I. L. (2023). IMPROVEMENT OF ANESTHETIC PROTECTION IN SIMULTANEOUS OPERATIONS ON ABDOMINAL AND PELVIC ORGANS. World scientific research journal, 20(1), 113-116.
- 9. Sharipov, I. L., Xolbekov, B. K., & Kurbonov, N. Z. (2023). BOLALAR OFTALMOLOJARROHLIGIDA ANESTEZIYANI TAKOMILLASHTIRISH. World scientific research journal, 20(1), 107-112.
- 10. Курбонов, Н. З. (2022). ОПТИМИЗАЦИЯ АНЕСТЕЗИОЛОГИЧЕСКОГО ДОСТУПА ПРИ ХИРУРГИИ РЕЦИДИВА ВЕНТРАЛЬНОЙ ГРЫЖИ У ПАЦИЕНТОВ С ОЖИРЕНИЕМ И АРТЕРИАЛЬНОЙ ГИПЕРТЕНЗИЕЙ. IJODKOR O'QITUVCHI, 2(24), 431-439.
- 11. Zayniddinovich, K. N., Qo'yliyevich, P. S., & Muratovich, M. M. (2022). OPTIMIZATION OF ANESTHESIOLOGICAL APPROACH IN RECURRENT ABDOMINAL HERNIA SURGERY IN PATIENTS WITH THIRD-DEGREE OBESITY. Journal of new century innovations, 18(1), 188-194.
- 12. Zayniddinovich, Q. N., & Qo'yliyevich, P. S. (2022). QORIN BO'SHLIG'I SIMULTAN OPERATSIYALARDA ANESTEZIOLOGIK YONDOSHUV SAMARADORLIGINI TAKOMILLASHTIRISH. Journal of Integrated Education and Research, 1(5), 116-121.