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PREVENTION OF POSTSURGICAL PAIN BY A STANDARD PROTOCOL IN A GENERAL SURGERY DEPARTMENT: HOW EFFECTIVE IS IT?

General Surgery

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ABSTRACT

Introduction: Postsurgical pain is a well-known entity among health professionals in general and surgical department practitioners in particular. However, patients are not always satisfied with the action of analgesic treatments used as a preventative measure. **Methods:** We conducted a prospective study in 70 hospitalized patients operated in the general surgery department of our hospital, who benefited from a standard preventive therapeutic protocol for postsurgical pain and who underwent a pain evaluation according to a numerical scale 24 hours after surgery. **Results:** Of 70 patients included in the study, 51 (73%) were male and 19 (27%) were female.37 (53%) underwent general anesthesia and 33 (47%) underwent local regional anesthesia.61(87%) scheduled intervention and 9(13%) urgent interventions.18%(13) of patients had unbearable pain, 27%(19) of patients had severe pain, 27%(19) of patients had moderate pain, 23%(16) of patients had mild pain and 4%(3) of patients who felt no pain. **Conclusion:** The adoption of a standardized protocol to prevent postsurgical pain remains insufficient for the management of patients with variable needs. A global, flexible and patient-adapted approach seems more judicious.

KEYWORDS

pain prevention, postsurgical pain,analgesic,general surgery.

INTRODUCTION :

Adequate perioperative pain management is integral to patient care and outcomes. Each of the biological, psychological and social dimensions of the pain experience should be considered and understood in order to provide optimum pain management in the postoperative setting (1).

In this study we want to evaluate the usefulness of a predefined preventive protocol for postoperative pain in patients in the general surgery department of our structure.

METHODS :

Principal research question was : How effective are we in assessing postoperative pain on D+1 in patients at the surgical department of the HASSAN 2 military hospital in Laayoune city of Morocco ?

Type of study was a descriptive, prospective, empirical study realised in the Laayoune Military Hospital witch is a health facility located in the south of the kingdom of Morocco. It is managed by the Royal Armed Forces and provides health care to the military and the civilian population of the region. The hospital has several medical departments, such as general medicine, surgery, radiology, ophthalmology, psychiatry, resuscitation, endocrinology and dentistry. In addition to providing medical care, the hospital is also involved in medical research and training activities. It works in collaboration with other health institutions in the region to improve the quality of health care in this region.

The target population of our study is represented by patients operated on at the trauma, urology, visceral, and ENT department (n = 70 patients).

1. Inclusion Criterias:

- Patient operated on at the HASSAN2 military hospital during the study period
- Operated on in the study departments (traumatology, visceral, urology, ENT)
- Patient on day 1
- patients who agreed to participate in the study

2. Exclusion Criterias:

- Patients hospitalized for medical reasons
- Patients hospitalized for ambulatory surgery
- Non-communicating patients
- Patients with contraindications to standard treatment
- Children

Data collection method:To answer the research question posed by this study, the design of a survey using a questionnaire intended for patients operated on or in the surgery department of the HASSAN 2 military hospital. With identity, date of birth, significant history, ASA class,type of intervention, numerical scale (EN) etc. The choice of this method is justified by several criteria such as the possibility of collecting data from a large number of individuals, a relatively low cost; it contributes to reliability by promoting better uniformity; it allows strict compliance with confidentiality rules and also allows the people questioned to feel more secure regarding the anonymity of the responses and, as a result, to express more freely the opinions that they consider more personal.

Several ethical considerations were taken into account for the conduct of this study in order to respect the ethical dimension of the research, in particular the free and informed consent of the participants, as well as the right to confidentiality, anonymity. Participants can change their decision to be part of the study at any time.

In order to ensure the smooth running of the data collection process, this study was conducted over a period of 6 weeks, from April 1 to May 15, 2023 in the surgery department.

The data collected from the questionnaire were analyzed by SPSS (Statistical Package for the Social Sciences) software to quantify and establish statistics. The results are displayed on graphs using SPSS.

The protocol adopted consists of an alternation of 1g of paracetamol in injection every 8 hours and a slow infusion of nefopan in a glucose serum every 8 hours in intervals of 4hours. titrated morphine is administered if both medications fail every 10 min by the nurse on duty until the pain resolves

RESULTS :

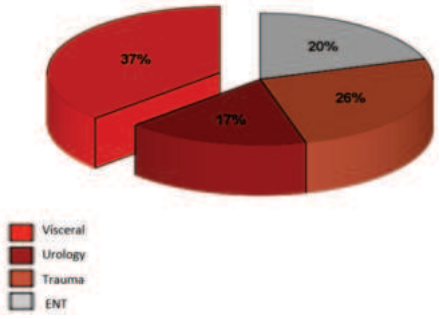
Sociodemographic characteristics of the population studied

		n=70	
Gender	Male	51	(73)
	Female	19	(27)
Age average	Male	52	[16-88]
	Female	39	[20-58]
ASA	1	61	(87)
	2	8	(11)
	3	1	(2)
Type of anestesia	General	37	(53)
	Localregional central		

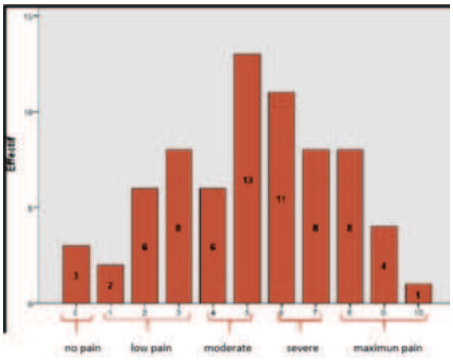
	Peripheral	19	(27)
		14	(20)
Type of surgery	Scheduled		
		61	(87)
	Urgent		
Surgical speciality	Visceral	9	(13)
		26	(37)
	Trauma		
		19	(27)
	EN		
	Urology	14	(20)
		11	(16)

Legende :
() for percentage .
[] for minimum and miximum age.

Distribution Of Patients By Surgical Specialty



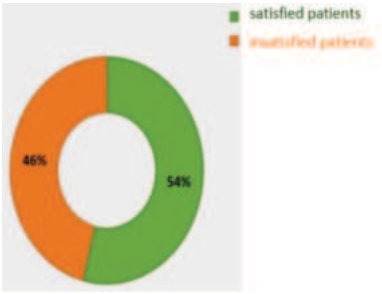
Results Of The Numerical Assessment Of Pain From 1 To 10 In Patients At Day +1



In our serie,18% (13) of patients had unbearable pain, 27%(19) of patients had severe pain, 27%(19) of patients had moderate pain, 23%(16) of patients had low pain and 4%(3) of patients who felt no pain.

On the total sample of patients included (n=70): 54% (n=38) of patients rated their pain as less than 6 and pain prevention protocol is considered as adequat.46% (n=32) rated it as greater than or equal to 6 and this is a therapeutic failure. On average, the numeric pain scale at D+1 is rated at 5.13.

Patient Satisfaction With Analgesic Treatment



According to this graph, 54% of patients are satisfied with the analgesic treatment and 46% of patients are not satisfied.

DISCUSSION :

Almost half of the patients operated on in our department do not benefit from the preventive action against postoperative pain expected from the adopted protocol. It is the same conclusion of other stydies from europe,united states and china (2).

Pain after surgery is often poorly managed, and up to 40% of patients report severe pain that negatively impacts on their recovery(3).In our stady 46% of patients continue to suffer despite treatment and it is a real daily challenge to contribute to change this situation .

One of the adverse events following surgery is uncontrolled or undertreated postsurgical pain which sometimes transitions into chronic postsurgical pain(4),that is why we tray rethinking pain management to prioritize multimodal analgesia.

The relief from suffering leads to early mobilization, less hospital stay, reduced hospital costs, and increased patient satisfaction(5).

CONCLUSION :

Efficacy against postsurgical pain remains poor. A preventive protocol to manage postoperative pain must include techniques other than systemic analgesics as part of multimodal management adapted to the needs of the patient.

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REFERENCES :

1. C. Small and H. Laycock . Acute postoperative pain management .BJS 2020; 107: e70–e80. DOI: 10.1002/bjs.11477
2. Yanhong Liu et al. Postoperative pain-related outcomes and perioperative pain management in China: a population-based study The Lancet Regional Health - Western Pacific 2023;39: 100822 Published Online 10 J. https://doi.org/10. 1016/j.lanwpc. 2023. 100822
3. Nicholas Levy et al. Post-surgical pain management: time for a paradigm shift. British Journal of Anaesthesia, 123 (2): e182ee186 (2019). doi: 10.1016/j.bja.2019.05.031
4. Paladini A, Rawal N, Coca Martinez M, et al. (August 04, 2023) Advances in the Management of Acute Postsurgical Pain: A Review. Cureus 15(8): e42974. DOI 10.7759/cureus.42974
5. Alexandros Kolettas et al. Postoperative pain management J Thorac Dis2015;7 (S1):S62-S72 doi: 10.3978/j.issn.2072-1439.2015.01.15