

NON-PHARMACOLOGICAL INTERVENTIONS USED BY PATIENTS AFTER SURGERY. PRELIMINARY FINDINGS, INTERNATIONAL PAIN REGISTRY, PAIN OUT Ana-Maria luonut<sup>1</sup><sup>2</sup>, Ruth Zaslansky<sup>3</sup>, Marcus Komann<sup>3</sup>, Lucian Fodor<sup>1</sup><sup>2</sup>, Winfried Meissner<sup>3</sup> <sup>1</sup> University of Medicine & Pharmacy "Iuliu Hatieganu", <sup>2</sup> Emergency Cluj County Hospital, Romania, <sup>3</sup> Department of Anaesthesia & Intensive Care, University Hospital Jena, Germany

### **Objectives**

To identify non-pharmacological interventions used or received by patients during the first day after a variety of surgical interventions.

## Methods

Patients were asked to report whether they used or received "non-medicine methods" to relieve their pain and to select method(s) they used from a pre-determined list. The interventions were divided into 3 major groups: stress reduction, attentional strategies and physical modalities (see Figure 1).

Patients made these evaluations when filling in the PAIN OUT International Pain Outcomes Questionnaire, which assesses Patient Reported Outcomes related to management of postoperative pain.

PAIN OUT is a European Union-funded project creating an international registry for pain after surgery (www.painout.eu).

Analysis was based on descriptive statistics. We did not differentiate between surgical specialty or country of the participating site.



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# Results

We reviewed 17,371 charts from patients undergoing orthopedic and trauma or general surgery in 11 medical centers in 9 European countries and whose data was entered into the registry between Feb 2010 - Jan 2012.

6741 patients answered the guestion about use of non-medicine methods;

44.7% of patients were male, aged 55 ( $\pm$  17.2) years. Over 40 % of patients reported using at least one method.

Christian	Talking to friends and relatives	35,2% (n=1421)
Stress Reduction	Talking to medical staff	34% (n=1368)
	Deep breathing	17,6% (n=1189)
	Prayer	16,2% (n=1091)
	Relaxation	13,7% (n=924)
	Walking	11,7% (n=792)
	Meditation	4,8% (n=322)
Attentional strategies	Distraction (watching TV, listening music, reading)	44,8% (n= 3017)
	Imagery or visualization	3,8% (n=256)
Physical modalities	Cold pack	36,6% (n=2466)
	Heat	4,7% (n=318)
	Massage	4,6% (n=308)
	TENS	0,7% (n=28)
	Acupuncture	0,5% (n=19)
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#### **Discussion & Conclusions**

✓ PAIN-OUT is an international, observational registry, assessing post-surgical outcomes related to pain.

✓ Major practice guidelines (e.g. 1) recommend that patients and family are taught to use behavioral modalities supplementary to pharmacological methods to manage pain.

✓ Evidence about the effectiveness of nonpharmacological interventions on patient outcomes is inconsistent and dependent on the modality used.

✓ Over 40% of patients reported using or receiving at least one non-pharmacological method during the first day of surgery.

✓ The most common methods were: distraction, cold pack, talking to friends & relatives & to medical staff.

✓ Methods rarely used were those which require teaching and time of healthcare providers, specific skills and technology: meditation, imagery or visualization, acupuncture, TENS.

✓ As the PAIN-OUT registry grows we will be able to better assess the effect that these interventions have on outcomes related to pain, side effects and use of medications.



<sup>1</sup> Practice Guidelines for Acute Pain Management in the Perioperative Setting: Anesthesiology 2012;116(2):248-273