

## ABSTRACT

Pain is a frequent complaint in patients undergoing breast cancer surgery, which may increase the demand for analgesics and length of hospital stay. Excessive demand for systemic analgesics increases serious adverse events, such as vomiting, ileus, thromboembolism, and infarction.

In 2011, Blanco et al. described a technique of regional anesthetic blockade that, through application of interfascial anesthetic guided by ultrasound in the pectoral muscles, brought good anesthetic control. Through the same technique (PECS II) performed intraoperatively, we sought to evaluate pain control in the immediate and late postoperative period. Here we bring the first results of applicability of the technique.

## OBJECTIVE

Evaluate pain control in the immediate (first week after surgery) and late postoperative period (6 months after surgery).

## REFERENCES

## METHODS

It will include 200 patients diagnosed with breast cancer who will undergo breast surgery in a tertiary hospital in São Paulo, Brazil. During the surgical procedure, regional intraoperative anesthetic block with 0.375% ropivacaine will be performed using the PECS II technique, described by Blanco et al: by direct visualization, injection of 10mL of the solution between the pectoralis major and pectoralis minor muscles; in the sequence, still under direct vision, injection of another 10mL of the solution between the minor pectoral and anterior serratus muscles. During hospitalization, patients will be approached for pain control through a verbal numerical scale (0 to 10). At outpatient follow-up visits, the patients will be evaluated after 6 months for evaluation of chronic pain.

Figure 1: example of PECS II technique performed after total mastectomy, with direct visualization of muscular structures



## RESULTS

As preliminary results, 20 patients undergoing mammary oncology surgery were included. The mean time of execution of the regional anesthetic block procedure was 5 minutes. The patients were submitted to conservative surgery or mastectomy. The mean pain reported in the immediate postoperative period – using verbal numerical scale – was 4. There were no adverse events regarding the execution of the procedure so far.

## CONCLUSIONS

The first results of the study show great applicability of the PECS II technique intraoperatively - it is an easily replicable technique, which adds a little more time to the surgical procedure. In the context of cancer patients, in whom the complaint of postoperative pain is frequent, the application of a regional anesthetic block technique may increase comfort and patient satisfaction. We recommend the technique as a good alternative for routine use in breast cancer patient care services.