



Peribulbar block vs. general anaesthesia for corneal transplantation: Analgesic requirements and pain control

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BACKGROUND

- Effective anaesthesia for corneal transplantation (CT) can be achieved with general (GA) or regional anaesthesia (RA)
- CT has usually been performed under GA
- We believe that PBB can achieve effective surgical anaesthesia and postoperative analgesia with lower analgesic requirements and similar surgical conditions, compared to GA

GOAL OF THE STUDY

To compare the analgesic efficacy of PBB and GA for CT.

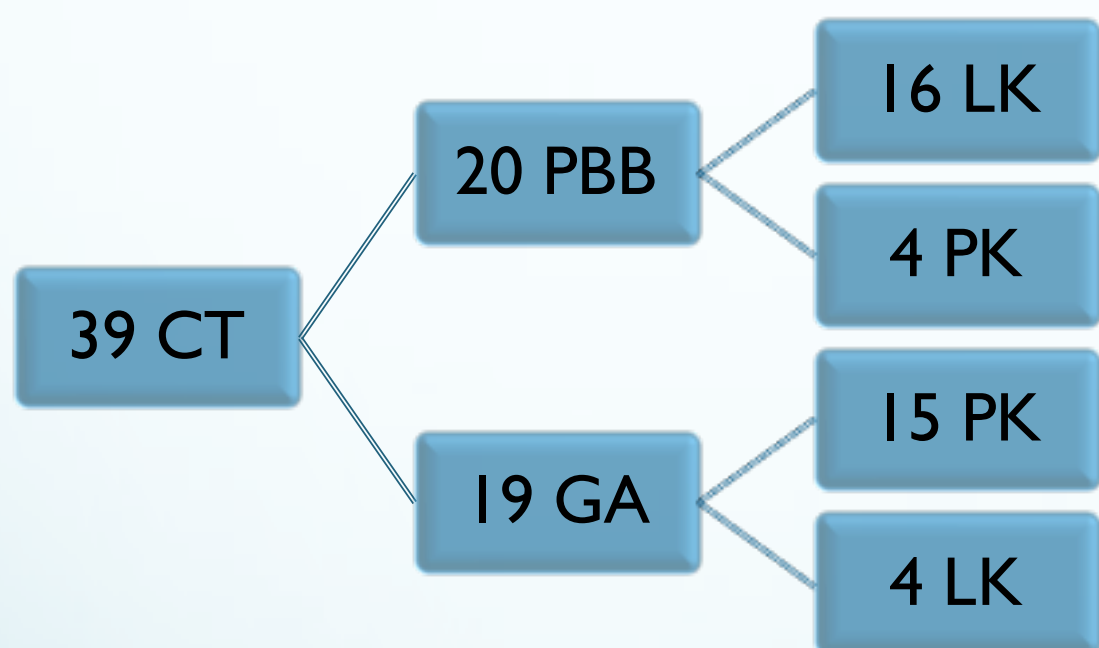
MATERIALS AND METHODS

- Prospective observational study
- Between August and November 2017
- Statistical tests: Chi-squared and Mann-Whitney U
- Statistical significance: $p < 0.05$

Data collected:

- ✓ Age, gender, height, weight
- ✓ ASA physical score
- ✓ Procedure and anaesthesia lengths
- ✓ Analgesic drug administration
- ✓ VAS pain score (PACU arrival and 30 minutes after surgery)
- ✓ Postoperative analgesic needs
- ✓ Opinion of the ophthalmologist

RESULTS AND DISCUSSION



- No difference in pain score on PACU arrival
- Trend towards lower pain scores 30 minutes after surgery in the PBB group ($p = 0.077$).
- No difference was observed regarding the surgeon's opinion of surgical conditions.

CONCLUSIONS

CT under PBB provided comparable pain control and surgical conditions to GA, with much lower systemic analgesic requirements.

		GA	PBB	p
Age (average, years)		58 (23-84)	71 (48-94)	0,057
BMI (average, kg/m ²)		27,95 ± 4,56	26,6 ± 5,47	0,194
Gender	F	11 (57,9%)	11 (55%)	0,855
	M	8 (42,1%)	9 (45%)	
ASA-PS	1	-	1 (5%)	0,579
	2	13 (68,4%)	12 (60%)	
	3	6 (31,6%)	7 (35%)	
Fentanyl (average dose, µg)		154 ± 81	48 ± 38	< 0,001
Paracetamol (n. of patients)		18 (94,7%)	10 (50%)	0,002
Tramadol (n. of patients)		10 (52,6%)	2 (10 %)	0,004
AINE (n. of patients)		11 (57,9%)	2 (10 %)	0,002
Morphine (n. of patients)		1 (5,3%)	0	0,299

