

## OBJECTIVES

We examined the overstay and readmission rates in day surgery with a special focus on the effect of local versus general anesthesia. Unscheduled contacts not leading to readmission are also reported.

## METHODS

We conducted a retrospective study on all ENT and OHS day surgery patients within a 3-month period, using the hospital's surgery database and patient charts to collect data pertaining to anesthesia, overstays, readmissions and contacts within 30 days of day surgery.

## RESULTS

With general anesthesia, 3.2% (n=23) of ENT day surgery patients had an overstay or readmission compared to 1.4% (n=4) after local anesthesia. Using a multivariable logistic regression model including American Society of Anesthesiologists (ASA) class, age, gender and form of anesthesia, females and young adults (16-44 years old) had more outcomes of overstay, readmission or contact than males and other age groups.

With general anesthesia, 10% (n=5) of OHS day surgery patients had an overstay or readmission compared to 0.6% (n=3) after local/regional anesthesia. Using the same multivariate logistic regression model as with ENT patients, the form of anesthesia and gender were significant for overstay, readmission or contact.

## CONCLUSION

Our overstay, contact and readmission rates are on the same level, or even lower, than in international studies. Our findings suggest that more day surgery patients than currently could be treated safely using local or regional anesthesia.

Patient demographics in 1,011 ENT day surgery procedures				
	Ear surgery	Nasal surgery	Tonsil & adenoid surgery	Miscellaneous ENT procedures
Patients (n)	236	256	400	119
Male %	51.7	53.5	53.8	55.5
Age, median (range)	4.3 (0.5 - 76.2)	40.7 (3.4 - 81.4)	9.2 (0.6 - 70.7)	50.5 (2.6 - 87.0)
ASA class, %				
1	16.3	14.4	30	5
2	5.1	8.6	8.8	4.8
3	0.9	1.4	0.7	1.2
4	0.1	0	0.1	0.1
no information	0.9	0.9	0	0.6
<b>Anesthesia</b>				
Local anesthesia (%)	16.9	73.7		47.1
Regional anesthesia (%)				
General anesthesia (%)	83.1	26.3	100	52.9

Patient demographics in 542 OHS day surgery procedures			
	Hand surgery	Shoulder & elbow surgery	Lower limb surgery
Patients (n)	471	55	16
Male %	37.4	58.2	56.3
Age, median (range)	53.8 (16.2 - 92.5)	54.3 (23.2 - 72.2)	42.2 (21.1 - 63.3)
ASA class, median (range)	2 (1 - 4)	2 (1 - 4)	1 (1 - 3)
<b>Anesthesia</b>			
Local anesthesia (%)	42.7	10.9	
Regional anesthesia (%)	49.7	65.5	93.7
General anesthesia (%)	7.6	23.6	6.3

Table of the 10 most common day surgery procedures of both specialties in the study		
Procedure	No. of day surgery patients	Overall day surgery percentage in unit
Tonsillectomy	168	92
Grommet insertion	152	100
Maxillary antrotomy	129	88
Adenoidectomy	128	100
Tonsillectomy	78	98
Septoplasty	36	88
Closed reduction of nasal fracture	35	100
Excision of lesion of larynx	33	83
Stapedotomy	31	94
Myringoplasty	30	100
Other ENT procedures*	191	85
Decompression of median nerve	167	97
Decompression of sheath of tendon of wrist or hand	46	98
Decompression of ulnar nerve	43	98
Palmar fasciotomy of hand	42	100
Incomplete excision of soft tissue tumour of wrist or hand	36	92
Arthroplasty of first CMC joint	34	90
Excision of synovial ganglion of wrist or hand	25	100
Fusion of DIP joint	23	96
Open operation for osteochondritis of joint of wrist	22	96
Arthroscopic exploration of joint of wrist or hand	18	82
Other OHS procedures**	86	92

\* includes eg adenotonsillectomy, biopsy of larynx, polypectomy

\*\* includes eg. arthroscopic partial excision of meniscus of knee, partial fusion of wrist, removal of internal fixation device from wrist or hand

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