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DEXMEDETOMIDINE FOR SEDATION IN CRITICALLY ILL PATIENTS: A SINGLE CENTRE EXPERIENCE

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OBJETIVE:

As the experience of use of Dexemdetomidine (Dex) in Spanish intensive cares unit (ICU) patients is still scarce, our aim is to describe the results of its use as a sedative, in a 20-bed general medical-surgical Spanish ICU and assess the adherence of the 2013-SEMICYUC-guideline recommendations

MATERIALS AND METHODS:

Retrospective six-month study (October/13 to March/14) of ICU patients treated with Dex for sedation.

The variables analyzed were:

Diagnosis	**Indication and duration**	**Doses : Starting-Maximum-Maintenance**
Time to Maintenance Dose	**Coadministration of other Sedatives**	**Patients in sedation range (RASS: -3-0)**
Duration of mechanical ventilation (MV)	**Adverse events**	**Causes of discontinuation**

RESULTS :

STUDY POPULATION		
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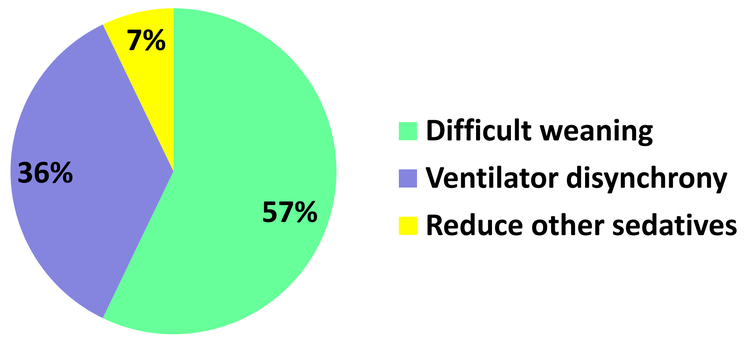
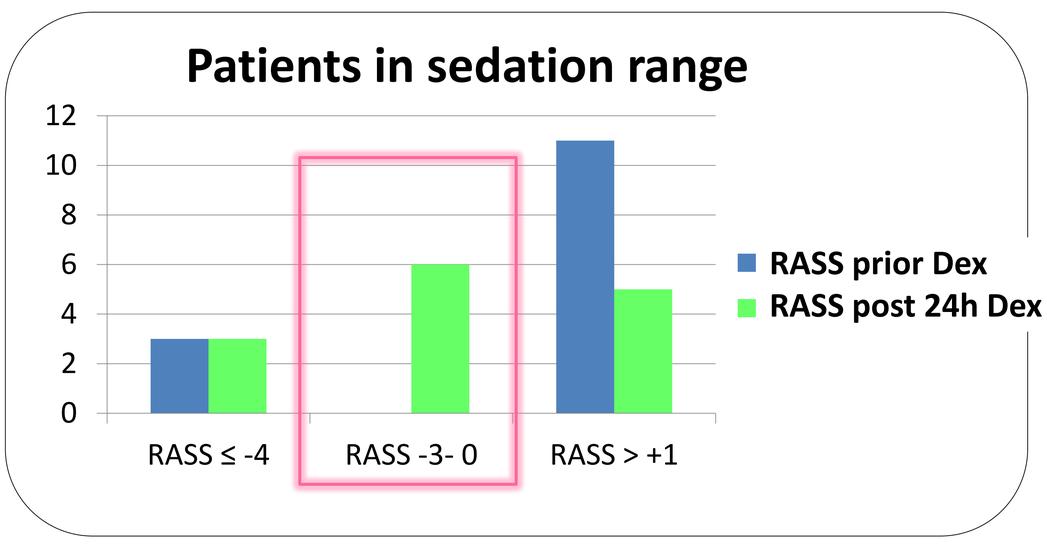
Diganosis	*Neurological*	*3 (21,4%)*
	Respiratory	*10 (71,4%)*
	Politraumamatized	*1 (7,2%)*

INDICATION OF DEX. USE



DEXDOR	Medium dose ± *CV* (mcg/kg/h)	Time to reach dose (range)
Starting	0,36 ± *0,15*	0
Maximum	0,91 ± *0,34*	41 hours (3-192)
maintenance	0,87 ± *0,33*	53,5 hours (3-192)
Medium length of the treatment		4,1 days (0,2-14,5).

Patients with other sedatives prior Dex	14 (100%)
Patients with other sedatives post 24h Dex	8 (57%)
Duration of MV (mean ± *CV)*	17,1 ±13 days



ADVERSE EVENTS AND DISCONTINUATION		
Patients with AE		14 (100%)
Most	*Hypotension*	*8 (57%)*
Common AE	*Bradycardia*	*6 (43%)*
Total AE		*28*
Causes of Discontinuation	Extubation	*8 (57%)*
	Lack of efficacy	*2 (14%)*
	AE (extreme bradycardia)	*2 (14%)*
	Exitus	*2 (14%)*

CONCLUSION:

The indications of Dex use were 100% adherence to *SEMICYUC-guidelines*, and Dex was useful in reaching sedation range and lead to extubation in selected patients. The initial infusion rate was 51%lower than the recommended and it lasted longer to achieve maintenance dose. The high rate of predictable adverse reactions and its limited use, make Dex a target drug for pharmaceutical monitoring and assessment .