

**PERBANDINGAN WAKTU PULIH SADAR ANTARA  
ANESTESI INHALASI *LOW FLOW* DENGAN  
*TOTAL INTRAVENOUS ANESTHESIA*  
DI RSI MUHAMMADIYAH KENDAL**

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**ABSTRAK**

**Latar Belakang:** Teknik anestesi umum dapat dilakukan dengan 2 cara, anestesi inhalasi dan anestesi *total intravea*. Anestesi inhalasi dilakukan dengan jalan memberikan kombinasi obat anestesi inhalasi yang berupa gas dan atau cairan yang mudah menguap melalui alat atau mesin anestesi langsung ke udara inspirasi. Anestesi intravena total atau *total intravenous anesthesia* teknik anestesi umum hanya menggunakan obat-obat anestesi yang dimasukkan lewat jalur intravena, obat diabsorbsi oleh ginjal yang akhirnya akan dieksresikan sesuai dengan farmakodinamikanya masing-masing. Teknik antara anestesi *low flow* dan anestesi intravena total ini memberikan efek anestesi dengan cara dan farmakologi yang berbeda sehingga memberikan dampak yang berbeda terhadap waktu pulih sadar.

**Tujuan:** Mengetahui perbandingan waktu pulih sadar antara anestesi inhalasi *low flow* dan anestesi *total intravena* di RSI Muhammadiyah Kendal

**Metode:** Sampel penelitian 52 pasien dengan teknik inhalasi *low flow* dan *total intravena* yang diukur dengan *Alderete score*. Data dilakukan uji normalitas menggunakan *Kolmogorov-smirnov*, uji homogenitas *Levene's test* dan uji *Mann whitney*,

**Hasil:** Analisis data menggunakan uji *Mann Whitney*, terdapat perbedaan waktu pulih sadar antara teknik anestesi inhalasi *low flow* dengan teknik *intravena total* dengan *p value* sebesar 0.004 (*p*<0.05). Angka *mean rank* waktu pulih sadar anestesi inhalasi *total intravena* lebih cepat dibandingkan dengan anestesi *intravena total* dengan rata-rata waktu pulih sadar pada kelompok dengan teknik anestesi inhalasi *low flow* 21.71 menit, sedangkan rata-rata waktu pulih sadar pada kelompok *total intravena* 14.61 menit.

**Kesimpulan:** waktu pulih sadar anestesi *total intravena* lebih cepat dibandingkan dengan anestesi inhalasi *low flow*.

**Kata Kunci:** Waktu pulih sadar, anestesi inhalasi *low flow*, anestesi *total intravena*.

**COMPARISON OF RECOVERY TIME BETWEEN  
INHALATION LOW FLOW ANESTHESIA AND  
TOTAL INTRAVENOUS ANESTHESIA  
AT RSI MUHAMMADIYAH KENDAL**

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**ABSTRACT**

**Background:** There are 2 methods of general anesthesia, inhalation anesthesia and total intravenous anesthesia. Inhalation anesthesia is carried out by giving a combination of inhalation anesthetics in the form of gases and or volatile liquids through anesthetic device or machine directly into the inspired air. Total intravenous anesthesia is general anesthetic technique only uses anesthetic drugs that are inserted through the intravenous line, the drug is absorbed by the kidneys which will eventually be excreted according to their respective pharmacodynamics. The technique between low flow anesthesia and total intravenous anesthesia provides anesthetic effects in different ways and pharmacology so that it has a different impact on recovery time.

**Objective:** The purpose of this study was to determine the comparison of recovery time between low flow inhalation anesthesia and intravenous total anesthesia at RSI Muhammadiyah Kendal.

**Methods:** The study sample was 52 patients with low flow inhalation technique and total intravenous as measured by the Alderete score. The data was tested for normality using the Kolmogorov-Smirnov test, Levene's test for homogeneity test and the Mann Whitney test

**Results:** Data analysis using the Mann Whitney test, there is a difference in recovery time between the low flow inhalation anesthetic technique and the total intravenous technique with the result p value of 0.004 ( $p < 0.05$ ). The mean rank recovery time for intravenous total inhalation anesthesia was faster than total intravenous anesthesia with the average recovery time in the group using the low flow inhalation anesthetic technique of 21.71 minutes, while the average recovery time in the total intravenous group was 14.61 minutes.

**Conclusion:** The recovery time of intravenous total anesthesia is faster than low flow inhalation anesthetics.

**Keywords:** Recovery time, low flow inhalation anesthesia, intravenous total anesthesia.