

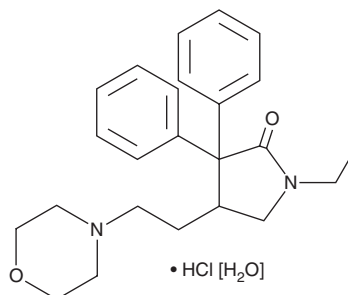
# PRODUCT INFORMATION



## Doxapram (hydrochloride hydrate)

Item No. 23794

**CAS Registry No.:** 7081-53-0  
**Formal Name:** 1-ethyl-4-[2-(4-morpholinyl)ethyl]-3,3-diphenyl-2-pyrrolidinone, monohydrochloride, monohydrate  
**Synonym:** AHR 619  
**MF:** C<sub>24</sub>H<sub>30</sub>N<sub>2</sub>O<sub>2</sub> • HCl [H<sub>2</sub>O]  
**FW:** 433.0  
**Purity:** ≥95%  
**Supplied as:** A solid  
**Storage:** -20°C  
**Stability:** ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

Doxapram (hydrochloride hydrate) is supplied as a solid. A stock solution may be made by dissolving the doxapram (hydrochloride hydrate) in the solvent of choice. Doxapram (hydrochloride hydrate) is slightly soluble in organic solvents such as methanol and DMSO, which should be purged with an inert gas.

### Description

Doxapram is a central respiratory stimulant.<sup>1</sup> It increases respiration and phrenic nerve activity in anesthetized cats at a dose of 1.0 mg/kg. Doxapram acts through carotid chemoreceptors, lacking activity in anesthetized cats following carotid denervation. Formulations containing doxapram have been used to increase respiration in patients with chronic pulmonary disease, respiratory depression induced by drug overdose, and to stimulate deep breathing post-anesthesia.

### Reference

1. Mitchell, R.A. and Herbert, D.A. Potencies of doxapram and hypoxia in stimulating carotid-body chemoreceptors and ventilation in anesthetized cats. *Anesthesiology* 42(5), 559-566 (1975).

**WARNING**  
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

**SAFETY DATA**  
This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

**WARRANTY AND LIMITATION OF REMEDY**  
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