

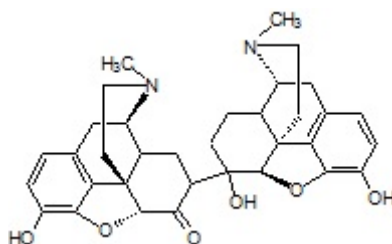
## Drug Status Report

**Drug:** Hydromorphone aldol dimer

**Drug Name Status:** Hydromorphone aldol dimer the common name.

**Chemical Name:** (5 $\alpha$ ,6 $\alpha$ )-(5' $\alpha$ ,6' $\alpha$ )-4,5:4',5'-Diepoxy-3,3',6-trihydroxy-17,17'-dimethyl-7,8'-bimorphinan-6'-one

**Chemical structure:**



**Molecular Formula:** C<sub>34</sub>H<sub>38</sub>N<sub>2</sub>O<sub>6</sub>

**Pharmacological class / Application:** Hydromorphone related substance

**International status:**

US: The substance is not listed on the schedules to the CSA and is not mentioned on the DEA website. However the definition of narcotic drug in the CSA “(A) Opium, opiates, derivatives of opium and opiates, including their isomers, esters, ethers, salts, and salts of isomers, esters, and ethers, whenever the existence of such isomers, esters, ethers, and salts is possible within the specific chemical designation” may include hydromorphone aldol dimer.

United Nations: The substance is not listed on the Yellow List - List of Narcotic Drugs under International Control nor the Green List - List of Psychotropic Substances under International Control.

Canadian Status: Hydromorphone aldol dimer is not listed on the schedules to the CDSA. Hydromorphone is subitem (17) of item 1 of Schedule I to the CDSA, Opium poppy (*Papaver somniferum*), its preparations, derivatives, alkaloids and salts, including opium, codeine, morphine and thebaine and the salts, derivatives and salts of derivatives of these four opium alkaloids. Several “dimeric” substances related to opiates are currently considered to be included in item 1 of Schedule I. These include bis-hydromorphone, pseudomorphine (2,2'-bimorphine), bis-naloxone, bis-nalbuphine, and bis-naltrexone. Hydromorphone aldol dimer is a derivative of hydromorphone formed by the aldol reaction.

Recommendation: Hydromorphone aldol dimer is included in item 1 of Schedule I to the CDSA

and is a controlled substance.

February 6, 2009