# MECLIZINE HYDROCHLORIDE- meclizine hydrochloride tablet Northwind Pharmaceuticals, LLC

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#### MECLIZINE HYDROCHLORIDE

# DESCRIPTION

Meclizine hydrochloride, an oral antiemetic, is a white, slightly yellowish, crystalline powder which has a slight odor and is tasteless.

The chemical name is 1-(p-chloro-alpha-phenylbenzyl)-4-(m-methyl-benzyl) - piperazine dihydrochloride monohydrate.

Meclizine Hydrochloride Tablets are available in 12.5 mg, and \*25 mg strengths for oral administration.

\*Contains FD&C Yellow #5 (see PRECAUTIONS).

Each tablet contains the following inactive ingredients: colloidal silicon dioxide, lactose, magnesium stearate, microcrystalline cellulose, sodium starch glycolate, starch, and stearic acid. In addition, the 12.5 mg tablet contains FD&C Blue #1; and the 25 mg tablet contains D&C Yellow #10 and FD&C Yellow #5.

# **CLINICAL PHARMACOLOGY**

Meclizine hydrochloride is an antihistamine which shows marked protective activity against nebulized histamine and lethal doses of intravenously injected histamine in guinea pigs. It has a marked effect in blocking the vasodepressor response to histamine, but only a slight blocking action against acetylcholine. Its activity is relatively weak in inhibiting the spasmogenic action of histamine on isolated guinea pig ileum.

# Pharmacokinetics

The available pharmacokinetic information for meclizine following oral administration has been summarized from published literature.

# Absorption

Meclizine is absorbed after oral administration with maximum plasma concentrations reaching at a median Tmax value of 3 hours post-dose (range: 1.5 to 6 hours) for the tablet dosage form.

# Distribution

Drug distribution characteristics for meclizine in humans in unknown.

#### Metabolism

The metabolic fate of meclizine in humans in unknown. In an in vitro metabolic study using human hepatic microsome and recombinant CYP enzyme, CYP2D6 was found to be the dominant enzyme for metabolism of meclizine.

The genetic polymorphism of CYP2D6 that results in extensive-, poor-,intermediate- and ultrarapid metabolizer phenotypes could contribute to large inter-individual variability in meclizine exposure.

# Elimination

Meclizine has a plasma elimination half-life of about 5 to 6 hours in humans.

# **INDICATIONS & USAGE**

Based on a review of this drug by the National Academy of Sciences – National Research Council

and/or other information, FDA has classified the indications as follows:

Effective: Management of nausea and vomiting, and dizziness associated with motion sickness.

Possibly Effective: Management of vertigo associated with diseases affecting the vestibular system.

Final classification of the less than effective indications required further investigation.

#### **CONTRAINDICATIONS**

Meclizine hydrochloride is contraindicated in individuals who have shown a previous hypersensitivity to it.

#### WARNINGS

Since drowsiness may, on occasion, occur with use of this drug, patients should be warned of this possibility and cautioned against driving a car or operating dangerous machinery.

Patients should avoid alcoholic beverages while taking the drug. Due to its potential anticholinergic action, this drug should be used with caution in patients with asthma, glaucoma, or enlargement of the prostate gland.

Usage in Children

Clinical studies establishing safety and effectiveness in children have not been done; therefore, usage is not recommended in children under 12 years of age.

Usage in Pregnancy

Pregnancy Category B. Reproduction studies in rats have shown cleft palates at 25 to 50 times the human dose. Epidemiological studies in pregnant women, however, do not indicate that meclizine increases the risk of abnormalities when administered during pregnancy. Despite the animal findings, it would appear that the possibility of fetal harm is remote. Nevertheless, meclizine, or any other medication, should be used during pregnancy only if clearly necessary.

#### **PRECAUTIONS**

The Meclizine Hydrochloride Tablets, 25mg contain FD&C Yellow #5 (tartrazine) which may cause allergic-type reactions (including bronchial asthma) in certain susceptible individuals. Although the overall incidence of FD&C Yellow #5 (tartrazine) sensitivity in the general population is low, it is frequently seen in patients who also have aspirin hypersensitivity.

**Nursing Mothers** 

It is not known whether this drug is excreted in human milk. Because many drugs are excreted in human milk, caution should be exercised when meclizine is administered to a nursing woman.

Hepatic Impairment

The effect of hepatic impairment on the pharmacokinetic of meclizine has not been evaluated. As meclizine undergoes metabolism, hepatic impairment may result in increased systemic exposure of the drug. Treatment with meclizine should be administered with caution in patients with hepatic impairment.

# Renal Impairment

The effect of renal impairment on the pharmacokinetics of meclizine has not been evaluated. Due to a potential for drug/metabolite accumulation, meclizine should be administered with caution in patients with renal impairment and in the elderly as renal function generally declines with age.

# **Drug Interactions**

There may be increased CNS depression when meclizine is administered concurrently with other CNS

depressants, including alcohol, tranquilizers, and sedatives. (see WARNINGS).

Based on in-vitro evaluation, meclizine is metabolized by CYP2D6. Therefore there is a possibility for a drug interaction between meclizine and CYP2D6 inhibitors.

# ADVERSE REACTIONS

Anaphylactoid reaction, drowsiness, dry mouth, headache, fatigue, vomiting and, on rare occasions, blurred vision have been reported.

#### **DOSAGE & ADMINISTRATION**

Vertigo

For the control of vertigo associated with diseases affecting the vestibular system, the recommended dose is 25 to 100mg daily, in divided dosage, depending upon clinical response.

Motion Sickness: The initial dose of 25 to 50 mg meclizine hydrochloride, should be taken one hour prior to embarkation for protection against motion sickness. Thereafter, the dose may be repeated every 24 hours for the duration of the journey.

# PRINCIPAL DISPLAY PANEL

NDC: 51655-134-52

MFG: 49884-035-10

MECLIZINE HYDROCHLORIDE 25 MG

30 TABLETS

**RX ONLY** 

Lot#:

Exp. Date:

Each tablet contains: meclizine hydrochloride, USP....25 mg

Dosage: See prescribing information

Store at 68 to 77 degrees F.

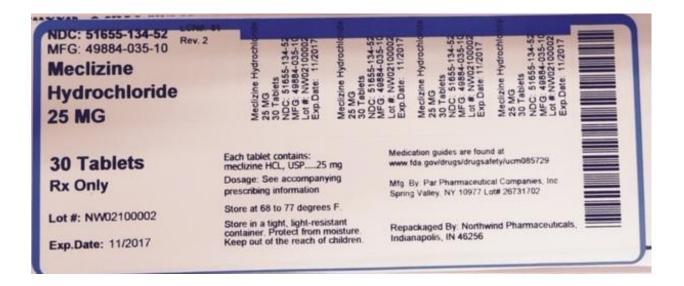
Store in a tight, light-resistant container. Protect from moisture. Keep out of the reach of children.

Medication guides are found at www.fda.gov/drugs/drugsafety/ucm085729

Mfg. by Par Pharmaceutical Companies, Inc

Spring Valley, NY 10977 Lot#

Repackaged by Northwind Pharmaceuticals, Indianapolis, IN 46256



# MECLIZINE HYDROCHLORIDE

meclizine hydrochloride tablet

Product Information			
Product Type	HUMAN PRESCRIPTION DRUG	Item Code (Source)	NDC:51655-134(NDC:49884-035)
Route of Administration	ORAL		

# **Active Ingredient/Active Moiety**

Ingredient Name Basis of Strength Strength

MECLIZINE HYDRO CHLO RIDE (UNII: HDP7W44CIO) (MECLIZINE - UNII:3L5TQ84570) MECLIZINE HYDRO CHLO RIDE | 25 mg

Product Characteristics				
Color	yello w	Score	no score	
Shape	OVAL	Size	6mm	
Flavor		Imprint Code	Par;035	
Contains				

F	ackaging			
#	Item Code	Package Description	Marketing Start Date	Marketing End Date
1	NDC:51655-134-52	30 in 1 BOTTLE, DISPENSING		

Marketing Information			
Marketing Category	Application Number or Monograph Citation	Marketing Start Date	Marketing End Date
ANDA	ANDA087128	02/26/2015	

# Labeler - Northwind Pharmaceuticals, LLC (036986393)

# Registrant - Northwind Pharmaceuticals, LLC (036986393)

Establishment				
Name	Address	ID/FEI	Business Operations	
Northwind Pharmaceuticals, LLC		036986393	repack(51655-134)	

Revised: 3/2015 Northwind Pharmaceuticals, LLC