

1. Name of the medicinal product

AUROTIDIN (Loratadine Oral Solution USP 5 mg/5 ml)

2. Qualitative and quantitative composition

Each 5ml contains:

Loratadine USP 5 mg

Colour: Sunset yellow

In a flavoured syrupy base q.s.

3. Pharmaceutical form

Oral Solution

An orange coloured flavoured syrup

4. Clinical particulars

4.1 Therapeutic indications

AUROTIDIN (Loratadine Oral Solution USP 5 mg/5 ml) is indicated for the symptomatic treatment of allergic rhinitis and chronic idiopathic urticarial in adults and children over the age of 2 years.

4.2 Posology and method of administration

Adults and children over 12 years of age:

10ml (10mg) of the oral solution once daily.

Paediatric population

Children 2 to 12 years of age are dosed by weight:

Body weight more than 30kg: 10ml (10mg) of the oral solution once daily;

Body weight 30kg or less: 5ml (5mg) of the oral solution once daily.

Efficacy and safety of this medicine in children under 2 years of age has not been established.

Patients with hepatic impairment

Patients with severe liver impairment should be administered a lower initial dose because they may have reduced clearance of loratadine. An initial dose of 10mg every other day is recommended for adults and children weighing more than 30kg, and for children weighing 30kg or less, 5ml (5mg) every other day is recommended.

Patients with renal impairment

No dosage adjustments are required in the elderly or in patients with renal insufficiency.

Elderly

No dosage adjustments are required in the elderly.

Method of administration

Oral use. The oral solution may be taken without regard to meal time.

4.3 Contraindications

AUROTIDIN is contraindicated in patients who are hypersensitive to the active substance or to any of the excipients listed in section 6.1.

4.4 Special warnings and precautions for use

AUROTIDIN should be administered with caution in patients with severe liver impairment (see section 4.2).

AUROTIDIN contains sucrose; patients with rare hereditary problems of fructose intolerance, glucose-galactose malabsorption or sucrase-isomaltase insufficiency should not take this medicine.

The administration of **AUROTIDIN** should be discontinued at least 48 hours before skin tests since antihistamines may prevent or reduce otherwise positive reactions to dermal reactivity index.

4.5 Interaction with other medicinal products and other forms of interaction

When administered concomitantly with alcohol, this medicine has no potentiating effects as measured by psychomotor performance studies.

Potential interaction may occur with all known inhibitors of CYP3A4 or CYP2D6 resulting in elevated levels of loratedine (see section 5.2), which may cause an increase in adverse events.

Increase in plasma concentrations of loratadine has been reported after concomitant use with ketoconazole, erythromycin, and cimetidine in controlled trials, but without clinically significant changes (including electrocardiographic).

Paediatric population

Interaction studies have only been performed in adults.

4.6 Pregnancy and lactation

Pregnancy

A large amount of data on pregnant women (more than 1000 exposed outcomes) indicate no malformative nor feto/neonatal toxicity of loratadine. Animal studies do not indicate direct or indirect harmful effects with respect to reproductive toxicity (see section 5.3). As a precautionary measure, it is preferable to avoid the use of this medicine during pregnancy.

Breast-feeding

Loratadine is excreted in breast milk, therefore the use of loratadine is not recommended in breast-feeding women.

Fertility

There are no data available on male and female fertility.

4.7 Effects on ability to drive and use machines

In clinical trials that assessed driving ability, no impairment occurred in patients receiving loratedine. However, patients should be informed that very rarely some people experience drowsiness, which may affect their ability to drive or use machines.

4.8 Undesirable effects

a. Summary of the safety profile

In clinical trials involving adults and adolescents in a range of indications including AR and CIU, at the recommended dose of 10mg daily, adverse reactions with loratadine were reported in 2% of patients in excess of those treated with the placebo. The most frequent adverse reactions reported in excess of placebo were somnolence (1.2%), headache (0.6%), increased appetite (0.5%) and insomnia (0.1%).

b. <u>Tabulated list of adverse reactions</u>

The following adverse reactions reported during the post-marketing period are listed in the following table by System Organ Class. Frequencies are defined as very common ($\geq 1/10$), common ($\geq 1/100$) to < 1/100), uncommon ($\geq 1/1000$), rare ($\geq 1/1000$) and not known (cannot be estimated from the available data).

Within each frequency grouping, adverse reactions are presented in order of decreasing seriousness.

System Organ Class	Frequency	Adverse Reaction
Immune system disorders	Very rare	Hypersensitivity reactions(including angioedema and anaphylaxis)
Nervous system disorders	Very rare	Dizziness, Convulsion
Cardiac disorders	Very rare	Tachycardia, palpitation
Gastrointestinal disorders	Very rare	Nausea, dry mouth, gastritis
Hepato-biliary disorders	Very rare	Abnormal hepatic function
Skin and subcutaneous tissue disorders	Very rare	Rash, alopecia
General disorders and administration site conditions	Very rare	Fatigue

c. Paediatric population

In clinical trials in a paediatric population children aged 2 through 12 years, common adverse reactions reported in excess of placebo were headache (2.7%), nervousness (2.3%), and fatigue (1%).

Reporting of suspected adverse reactions

Reporting suspected adverse reactions after authorisation of the medicinal product is important. It allows continued monitoring of the benefit/risk balance of the medicinal product. Healthcare professionals are asked to report any suspected adverse reactions via the Yellow Card Scheme at www.mhra.gov.uk/yellowcard.

4.9 Overdose

Overdosage with loratadine increased the occurrence of anticholinergic symptoms. Somnolence, tachycardia, and headache have been reported with overdoses.

In the event of overdose, general symptomatic and supportive measures are to be instituted and maintained for as long as necessary. Administration of activated charcoal as a slurry with water may be attempted. Gastric lavage may be considered. Loratadine is not removed by haemodialysis and it is not known if loratadine is removed by peritoneal dialysis. Medical monitoring of the patient is to be continued after emergency treatment.

5. Pharmacological properties

5.1 Pharmacodynamic properties

Pharmacotherapeutic group: anti histamines – H₁ antagonist,

ATC code: R06A X13.

Loratadine, the active ingredient in Loratadine 5mg/5ml Syrup, is a tricyclic antihistamine with selective, peripheral H₁-receptor activity.

Loratadine has no clinically significant sedative or anticholinergic properties in the majority of the population and when used at the recommended dosage. During long-term treatment there were no clinically significant changes in vital signs, laboratory test values, physical examinations or electrocardiograms.

Loratadine has no significant H_2 -receptor activity. It does not inhibit norepinephrine uptake and has practically no influence on cardiovascular function or on intrinsic cardiac pacemaker activity.

5.2 Pharmacokinetic properties

After oral administration, loratadine is rapidly and well absorbed and undergoes an extensive first pass metabolism, mainly by CYP3A4 and CYP2D6. The major metabolite-desloratadine (DL)- is pharmacologically active and responsible for a large part of the clinical effect. Loratadine and DL achieve maximum plasma concentrations (T_{max}) between 1-1.5 hours and 1.5-3.7 hours after administration, respectively.

Increase in plasma concentrations of loratadine has been reported after concomitant use with ketoconazole, erythromycin, and cimetidine in controlled trials, but without clinically significant changes (including electrocardiographic).

Loratadine is highly bound (97% to 99%) and its active metabolite moderately bound (73% to 76%) to plasma proteins.

In healthy subjects, plasma distribution half-lives of loratadine and its active metabolite are approximately 1 and 2 hours, respectively. The mean elimination half lives in healthy adult subjects were 8.4 hours (range=3 to 20 hours) for loratadine and 28 hours (range-8.8 to 92 hours for the major active metabolite).

Approximately 40% of the dose is excreted in the urine and 42% in the faeces over a 10 day period and mainly in the form of conjugated metabolites. Approximately 27% of the dose is eliminated in the urine during the first 24 hours. Less than 1% of the active substance is excreted unchanged in active form, as lorated in DL.

The bioavailability parameters of loratadine and of the active metabolite are dose proportional.

The pharmacokinetic profile of loratadine and its metabolites is comparable in healthy adult volunteers and in healthy geriatric volunteers.

Concomitant ingestion of food can delay slightly the absorption of loratadine but without influencing the clinical effect.

In patients with chronic renal impairment, both the AUC and peak plasma levels (C_{max}) increased for loratedine and its metabolite as compared to the AUCs and peak plasma levels (C_{max}) of patients with normal renal function. The mean elimination half-lives of loratedine and its metabolite were not significantly different from that observed in normal subjects. Haemodialysis does not have an effect on the pharmacokinetics of loratedine or its active metabolite in subjects with chronic renal impairment.

In patients with chronic alcoholic liver disease, the AUC and peak plasma levels (C_{max}) of loratadine were double while the pharmacokinetic profile of the active metabolite was not significantly changed from that in patients with normal liver function. The elimination half-lives for loratadine and its metabolite were 24 hours and 37 hours, respectively, and increased with increasing severity of liver disease.

Loratadine and its active metabolite are excreted in the breast milk of lactating women.

5.3 Preclinical safety data

Preclinical data reveal no special hazard based on conventional studies of safety, pharmacology, repeated dose toxicity, genotoxicity and carcinogenic potential.

In reproductive toxicity studies, no teratogenic effects were observed. However, prolonged parturition and reduced viability of offspring were observed in rats at plasma levels (AUC) 10 times higher than those achieved with clinical doses.

6. Pharmaceutical particulars

6.1 List of excipients

Sr. No.	Raw Material	Pharmacopoeia
1.	Sucrose	BP
2.	Propylene Glycol	BP
3.	Citric Acid	BP
4.	Liquid Sorbitol 70 %	BP
5.	Saccharin Sodium	BP
6.	Methyl Hydroxybenzoate	BP
7.	Propyl Hydroxybenzoate	BP
8.	Sodium Benzoate	BP
9.	Disodium Edetate	BP
10.	Colour Sunset Yellow	IHS
11.	Essence Mixed Fruit Flavour	IHS
12.	Essence American Ice Cream Soda	IHS
13.	Purified Water*	BP

6.2 Incompatibilities

None known

6.3 Shelf life

36 months

6.4 Special precautions for storage

Store below $30^{\circ}\,\mathrm{C}$ in dry and dry place. Do not freeze.

6.5 Nature and contents of container

60ml filled in an amber coloured PET bottle packed in a carton.

6.6 Special precautions for disposal and other handling

No special requirements.

7. Marketing Authorisation Holder

Kilitch Drugs (India) Limited 37, Ujagar Industrial Estate, W.T Patil Marg, Deonar, Mumbai 400 088,Maharashtra, India. Website- www.kilitch.com

8. Marketing Authorisation Number (S) issued by Ethiopian FDA

08290/07581/VAR/2021

9. Date of First Authorisation/Renewal of the Authorisation

13-07-2022

10. Date of Revision of the Text

04/07/2023