

# **AUSTRALIAN PRODUCT INFORMATION – TELNASAL ALLERGY SPRAY (MOMETASONE FUROATE AS MONOHYDRATE) 50 MICROGRAM/SPRAY NASAL SPRAY**

## **1 NAME OF THE MEDICINE**

Mometasone furoate monohydrate

## **2 QUALITATIVE AND QUANTITATIVE COMPOSITION**

Telnasal Allergy Spray is a metered-dose, manual pump spray unit containing a suspension of mometasone furoate. Each actuation delivers approximately 100 mg of mometasone furoate monohydrate suspension, containing mometasone furoate monohydrate equivalent to mometasone furoate 50 µg.

Telnasal Allergy Spray contains mometasone furoate 0.5 mg/g (as the monohydrate). Mometasone also contains benzalkonium chloride 0.2 mg/g as preservative.

For the full list of excipients, see Section 6.1 List of excipients.

## **3 PHARMACEUTICAL FORM**

Aqueous nasal spray.

## **4 CLINICAL PARTICULARS**

### **4.1 THERAPEUTIC INDICATIONS**

For the treatment of symptoms associated with seasonal allergic rhinitis and perennial allergic rhinitis and the prophylaxis of seasonal allergic rhinitis for up to 6 months in adults and children 12 years of age and over.

## 4.2 DOSE AND METHOD OF ADMINISTRATION

DO NOT EXCEED THE RECOMMENDED DOSAGE.

The effect of mometasone aqueous nasal spray 0.05 % is not immediate. Full therapeutic benefit takes a few days to develop. Dosage should be administered as directed and not to be taken by the patients at will for symptomatic relief.

### Allergic Rhinitis

In patients who have a history of moderate to severe symptoms of seasonal allergic rhinitis, prophylactic treatment with mometasone is recommended two to four weeks prior to the anticipated start of the pollen season.

**Adults and children 12 years of age and over:** The usual recommended dose for prophylaxis and treatment is two sprays (50 µg/spray) in each nostril once daily (total daily dose 200 µg). Once symptoms are controlled, reducing the dose to one spray in each nostril (total daily dose 100 µg) may be effective for maintenance.

After the first dose of mometasone, clinically significant improvement of symptoms was achieved within 12 hours in 28 % of a group of patients (n=190) with seasonal allergic rhinitis (median = 36 hours). However, the full benefit of treatment may not be achieved in the first 48 hours, therefore, the patient should continue regular use to achieve full therapeutic benefit.

**Instructions to patients:** Shake container well before each use. **Do not** pierce the nasal applicator. After the initial priming of the mometasone aqueous nasal spray 0.05 % pump (10 actuations, until a uniform spray is observed), each actuation delivers approximately 100 µg of mometasone furoate suspension, containing mometasone furoate monohydrate equivalent to 50 µg of mometasone furoate. If the spray pump has not been used for 14 days or longer, it should be reprimed with 2 actuations, until a uniform spray is observed, before the next use.

**Cleaning your nasal spray:** It is important to clean your nasal spray regularly, otherwise it may not work properly. Remove the dust cap and gently pull off the nozzle. Wash the nozzle and dust cap in warm water and then rinse under a running tap. **Do not try to unblock the nasal applicator by inserting a pin or other sharp object as this will damage the applicator and cause you not to get the right dose of medicine.** Allow to dry in a warm place. Push the nozzle back onto the bottle and replace the dust cap. The spray will need to be re-primed with 2 sprays when first used after cleaning.

### Do not use

1. Patients should not use Telnasal Allergy Spray for more than 6 months without the advice of a pharmacist or doctor.
2. Do not use Telnasal Allergy Spray in children under 12 years of age.

### **4.3 CONTRAINDICATIONS**

Patients with known hypersensitivity to mometasone furoate or any of the excipients.

Severe nasal infection, especially candidiasis.

Persons with haemorrhagic diathesis or with a history of recurrent nasal bleeding.

Use in children under 12 years of age.

Use for longer than six months without the advice of a doctor or pharmacist.

### **4.4 SPECIAL WARNINGS AND PRECAUTIONS FOR USE**

Improvement should be seen within seven days of starting treatment. Treatment should be reassessed if there is no improvement within seven days of continuous use, or if symptoms have improved but are not adequately controlled after seven days of continuous use.

If signs or symptoms of eye pain and/or visual disturbance develop, discontinuance of mometasone nasal spray use or appropriate treatment may be required.

Mometasone aqueous nasal spray 0.05 % should not be used in the presence of untreated localized infection involving the nasal mucosa.

Because of the inhibitory effect of corticosteroids on wound healing, patients who have experienced recent nasal surgery or trauma should not use a nasal corticosteroid until healing has occurred.

Following 12 months of treatment with mometasone aqueous nasal spray 0.05 %, there was no evidence of atrophy of the nasal mucosa. Mometasone furoate tended to reverse the nasal mucosa closer to a normal histological phenotype. As with any long-term treatment, patients using mometasone aqueous nasal spray 0.05 % over several months or longer should be examined periodically for possible changes in the nasal mucosa. If localized fungal infection of the nose or pharynx develops, discontinuance of mometasone aqueous nasal spray 0.05 % therapy or appropriate treatment may be required.

Persistence of nasopharyngeal irritation may be an indication for discontinuing mometasone aqueous nasal spray 0.05 %.

Mometasone aqueous nasal spray 0.05 % should be used with caution, if at all, in patients with active or quiescent tuberculous infections of the respiratory tract, or in untreated fungal, bacterial, systemic viral infections or ocular herpes simplex.

Topical corticosteroids may be absorbed in amounts that can have systemic effects. Use of excessive doses may suppress HPA function. Physicians should be alert for evidence of systemic effects, especially in chronically treated patients.

However, there is no evidence of hypothalamic-pituitary-adrenal (HPA) axis suppression following prolonged treatment with mometasone aqueous nasal spray 0.05 %. Patients who are transferred from long-term administration of systemically active corticosteroids to mometasone aqueous nasal spray 0.05% require careful attention. Systemic corticosteroid withdrawal in such patients may result in adrenal insufficiency for a number of months until recovery of HPA axis function. If these patients exhibit signs and symptoms of adrenal insufficiency, systemic corticosteroid administration should be resumed and other modes of therapy and appropriate measures instituted.

During transfer from systemic corticosteroids to mometasone aqueous nasal spray 0.05 %, some patients may experience symptoms of withdrawal from systemically active corticosteroids (e.g. joint and/or muscular pain, lassitude and depression initially) despite relief from nasal symptoms and will require encouragement to continue mometasone aqueous nasal spray 0.05% therapy. Such transfer may also unmask pre-existing allergic conditions such as allergic conjunctivitis and eczema, previously suppressed by systemic corticosteroid therapy.

Patients receiving corticosteroids who are potentially immunosuppressed should be warned of the risk of exposure to certain infections (e.g. chickenpox, measles) and of the importance of obtaining medical advice if such exposure occurs.

Following the use of intranasal aerosolized corticosteroids, instances of nasal septum perforation or increased intraocular pressure have been reported very rarely.

### **Use in Elderly**

No data available.

### **Paediatric use**

Telnasal Allergy Spray should not be used in children under 12 years of age.

Controlled clinical trials have shown that intranasal corticosteroids may cause a reduction in growth velocity in children. This effect has been observed in the absence of laboratory evidence of hypothalamic-pituitary-adrenal (HPA) axis suppression, suggesting that growth velocity is a more sensitive indicator of systemic corticosteroid exposure in children than some commonly used tests of HPA-axis function. The long-term effects of this reduction in growth velocity associated with intranasal corticosteroids, including the impact on final adult height, are unknown. The potential for "catch up" growth following discontinuation of treatment with intranasal corticosteroids has not been adequately studied.

The growth of children receiving intranasal corticosteroids should be monitored routinely (e.g. via stadiometry). The potential growth effects of prolonged treatment should be weighed against the clinical benefits and the availability of safe and effective non- corticosteroid alternatives. To minimize the systemic effects of intranasal corticosteroids, each patient should be titrated to his/her lowest effective dose.

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However, no reduction in growth velocity was observed in a placebo-controlled clinical trial in which pediatric patients were administered mometasone aqueous nasal spray 0.05 % 100 µg daily for one year. The effects of treatment for periods of greater than one year have not been studied.

#### **Effects of laboratory tests**

No data available.

#### **4.5 INTERACTIONS WITH OTHER MEDICINES AND OTHER FORMS OF INTERACTIONS**

There have been no formal interaction studies performed.

#### **4.6 FERTILITY, PREGNANCY AND LACTATION**

##### **Effects on Fertility:**

As with other corticosteroids, at exposure levels associated with marked signs of systemic corticosteroid toxicity, mometasone furoate had progestogenic effects on the female reproductive tract and mammary glands. However, fertility was unimpaired in a reproductive toxicity study carried out in rats.

##### **Use in Pregnancy (Category B3):**

In animal studies, small quantities of mometasone furoate were found to cross the placenta barrier. Like other corticosteroids, at doses associated with signs of systemic toxicity, mometasone furoate reduced fetal growth and was teratogenic in mice, rats and rabbits after subcutaneous or topical application. Higher doses had progestogenic effects in pregnant rats, associated with prolonged gestation, dystocia and reduced pup survival.

There are no adequate or well-controlled studies in pregnant women. Low levels of systemic mometasone have been measured following nasal administration of mometasone aqueous nasal spray 0.05 %.

As with other nasal corticosteroid preparations, mometasone aqueous nasal spray 0.05 % should be used in pregnant women only if the potential benefit justifies the potential risk to the mother or fetus. Infants born of mothers who received corticosteroids during pregnancy should be observed carefully for hypoadrenalism.

## **Use in Lactation**

After oral administration, small quantities of mometasone furoate and/or its metabolites were transferred into the milk of lactating rats. There are no data on the extent of passage of mometasone furoate and/or its metabolites into the breast milk of women using mometasone furoate nasal spray 0.05 %. As with other nasal corticosteroid preparation, mometasone should be used by lactating mother only if the potential benefit justifies any potential risk to the infant.

## **4.7 EFFECTS ON ABILITY TO DRIVE AND USE MACHINES**

The effects of this medicine on a person's ability to drive and use machines were not assessed as part of its registration.

## **4.8 ADVERSE EFFECTS (UNDESIRABLE EFFECTS)**

### **Adult Population**

Treatment-related local adverse events reported in clinical studies include headache (8 %), epistaxis (e.g. frank bleeding, blood-tinged mucus and blood flecks) (8 % vs placebo 5 %), nasal burning (2 % vs placebo 3 %), and nasal irritation (2 % vs placebo 2 %) and nasal ulceration, which are typically observed with the use of a corticosteroid nasal spray.

Epistaxis was generally self-limiting and mild in severity, and occurred at a comparable or lower incidence compared to other active control nasal corticoids used in clinical studies (up to 15 %). The incidence of all other effects was comparable with that of placebo.

In the elderly, the more common adverse events were epistaxis (12 % vs placebo 5 %), headache (9 % vs placebo 6 %) and pharyngitis (4 % vs placebo 2 %).

In patients treated for nasal polyposis, the overall incidence of adverse events was comparable to placebo and similar to that observed for patients with allergic rhinitis.

### **Paediatric Population**

In the paediatric population, the most common adverse effects were epistaxis (6 % vs placebo 6 %), headache (3 % vs placebo 4 %), nasal irritation (2 % vs placebo 1 %) and sneezing (2 % vs placebo 4 %).

Rarely, immediate hypersensitivity reactions (e.g. bronchospasm, dyspnea) may occur after intranasal administration of mometasone furoate monohydrate. Very rarely, anaphylaxis and angioedema have been reported.

Disturbances of taste and smell have been reported very rarely.

Growth suppression has been reported in association with administration of intranasal corticosteroids (see 4.4 SPECIAL WARNINGS AND PRECAUTIONS FOR USE, Pediatric use).

## **Acute rhinosinusitis**

In patients treated for acute rhinosinusitis, the overall incidence of adverse events was comparable to placebo and similar to that observed for patients with allergic rhinitis.

Treatment related adverse events reported most frequently in the mometasone 200 µg twice daily group include epistaxis (3.7 % vs. placebo 2.6 %), diarrhoea (2.1 % vs. placebo 0.8 %), headache (1.7 % vs. placebo 2.4 %), nausea (1.7 % vs. placebo 0.6 %) and abdominal pain (1.7 % vs. placebo 1.0 %).

## **Reporting suspected adverse effects**

Reporting suspected adverse reactions after registration 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 at [www.tga.gov.au/reporting-problems](http://www.tga.gov.au/reporting-problems).

## **4.9 OVERDOSE**

Because the systemic bioavailability of mometasone aqueous nasal spray is low and has been estimated as <1 %, overdose is unlikely to require any therapy other than observation. Treatment can be reinitiated at the usual recommended dose.

Inhalation or oral administration of excessive doses of corticosteroids may lead to suppression of hypothalamic-pituitary-adrenal (HPA) axis function.

For information on the management of overdose, contact the Poison Information Centre on 13 11 26 (Australia).

# **5 PHARMACOLOGICAL PROPERTIES**

## **5.1 PHARMACODYNAMIC PROPERTIES**

### **Mechanism of action**

Mometasone furoate is a topical glucocorticosteroid with local anti-inflammatory properties at doses that are not systemically active.

In studies utilising nasal antigen challenge, mometasone aqueous nasal spray 0.05 % has shown anti-inflammatory activity in both the early- and late-phase allergic responses. This has been demonstrated by decreases (vs placebo) in histamine and eosinophil activity and reductions (vs baseline) in eosinophils, neutrophils and epithelial cell adhesion proteins.

## Clinical trials

### **ADULT CLINICAL PROGRAM**

**Allergic Rhinitis:** The clinical program evaluated the efficacy and safety of mometasone aqueous nasal spray 0.05 % in the prophylaxis and treatment of seasonal allergic rhinitis and the treatment of perennial allergic rhinitis. Five Phase I clinical studies evaluated the systemic safety and local tolerability of mometasone. Other clinical studies included:

- One Phase II dose-ranging study conducted to determine the optimum dose for the Phase III program;
- Seven Phase III studies designed to assess the safety and efficacy of mometasone in treating seasonal allergic rhinitis for 28 days (including two studies which evaluated the prophylactic efficacy of mometasone in preventing the symptoms of seasonal allergic rhinitis, and two which evaluated inflammatory response markers following nasal provocation with allergens); and
- Five Phase III studies designed to assess the safety and efficacy of mometasone in the treatment of perennial allergic rhinitis for 12 weeks. Four studies investigated the long term safety and maintenance of therapeutic effect of mometasone over 52 weeks; one perennial allergic rhinitis study was conducted in the elderly population; and three open-label perennial allergic rhinitis studies included a "variable-dose group" in which the dose of mometasone varied from 100 to 400 µg daily depending on symptoms.

During the course of the Phase II/III clinical program, 3120 patients (12 years of age and older) were treated with mometasone aqueous nasal spray 0.05 %. The majority (65 %) of patients was treated with 200 µg once daily. The remainder received mometasone in a dose ranging from 50 µg to 800 µg once daily. A total of 712 patients were treated with mometasone for at least 6 months and 350 patients were treated for 12 months or longer.

The results of the efficacy studies demonstrated that mometasone aqueous nasal spray 0.05 % 200 µg/day was consistently superior to placebo in relieving the symptoms of both seasonal allergic rhinitis and perennial allergic rhinitis and was of comparable efficacy to other commonly used topical corticosteroid sprays. In the case of seasonal allergic rhinitis it is also superior to placebo in the prophylaxis of symptoms. In the long-term studies in perennial allergic rhinitis there was no evidence of any diminution of its efficacy over time.

After the first dose of mometasone, clinically significant improvement of symptoms was achieved within 12 hours in 28 % of a group of patients (n=190) with seasonal allergic rhinitis (median = 36 hours). However, the full benefit of treatment may not be achieved in the first 48 hours, therefore, the patient should continue regular use to achieve full therapeutic benefit.



## 5.2 PHARMACOKINETIC PROPERTIES

Systemic bioavailability of mometasone furoate was investigated in 24 healthy volunteers following intranasal administration of 400 µg of the suspension. Mometasone was detectable in plasma (at sporadic time points) in only 4 of the 24 subjects, despite the use of a sensitive assay with a limit of quantitation of 50 pg/mL. Thus, there were no relevant pharmacokinetic data for this dosage form.

Systemic absorption of mometasone furoate suspension administered as aqueous nasal spray, 200 µg single dose, was measured using a sensitive assay with a lower quantitation limit of 0.25 pg/mL. Mean C max was 5.77 pg/mL (CV % 32) and mean AUC (0-12 hr) 29.6 pg.hr/mL (CV % 37). When compared with dose adjusted PK data for IV mometasone administration from earlier studies with a quantitation limit of 50 pg/mL and longer sampling duration, the estimated relative systemic (or 'absolute') bioavailability is < 1 %. The bioavailability of mometasone following intranasal administration is low.

Systemic effects were not detected in adults, adolescents or children following the administration of mometasone furoate aqueous nasal spray.

Mometasone furoate suspension is very poorly absorbed from the gastrointestinal tract, and the small amount that may be swallowed and absorbed undergoes extensive first- pass metabolism prior to excretion in urine and bile.

## 5.3 PRECLINICAL SAFETY DATA

### Genotoxicity

Mometasone furoate is not considered to be genotoxic. There was no evidence of mutagenicity in *in vitro* tests which included tests for reverse mutation in *Salmonella typhimurium* and *Escherichia coli* and forward gene mutation in a mouse lymphoma cell line. Limited evidence of clastogenicity was obtained in Chinese Hamster ovary cells, although this finding was not confirmed in a second assay in Chinese Hamster lung cells *in vitro*, nor *in vivo* assays including a chromosomal aberration assay in mouse spermatogonia, a mouse micronucleus assay or in a rat bone marrow clastogenicity assay. Mometasone furoate did not cause DNA damage in rat liver cells.

### Carcinogenicity

No data available.

## **6 PHARMACEUTICAL PARTICULARS**

### **6.1 LIST OF EXCIPIENTS**

Cellulose microcrystalline, carmellose sodium, citric acid monohydrate, sodium citrate, glycerol, polysorbate 80 and water purified with benzalkonium chloride 0.2 mg/g as preservative.

### **6.2 INCOMPATIBILITIES**

Incompatibilities were either not assessed or not identified as part of the registration of this medicine.

### **6.3 SHELF LIFE**

In Australia, information on the shelf life can be found on the public summary of the Australian Register of Therapeutic Goods (ARTG). The expiry date can be found on the packaging.

### **6.4 SPECIAL PRECAUTIONS FOR STORAGE**

Store Telnasal Allergy Spray below 25 °C. Do not freeze.

### **6.5 NATURE AND CONTENTS OF CONTAINER**

Telnasal Allergy Spray is supplied in a HDPE Pump Actuated Metered Dose Aerosol containing mometasone furoate (as the monohydrate) 50 µg/actuation; 140 metered doses or in a twin pack 140 x2.

### **6.6 SPECIAL PRECAUTIONS FOR DISPOSAL**

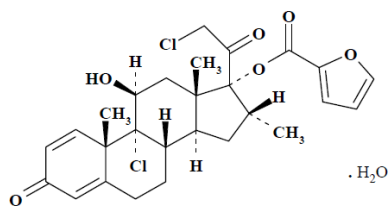
In Australia, any unused medicine or waste material should be disposed of by taking to your local pharmacy.

### **6.7 PHYSICOCHEMICAL PROPERTIES**

Mometasone furoate is a white to almost white powder and it is practically insoluble in water; soluble in acetone and in methylene chloride, slightly soluble in ethanol 96%, methanol and isopropanol.

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**Chemical structure:**



**Formula**

$C_{27}H_{32}Cl_2O_7 \cdot H_2O$

**Molecular weight**

539.4 g/mol

**CAS number**

83919-23-7 (Mometasone furoate anhydrous)

**Chemical name**

Mometasone furoate monohydrate is 9,21-dichloro-11 $\beta$ -hydroxy-16 $\alpha$ -methyl-3,20- dioxopregna-1,4-dien-17-yl furan-2-carboxylate. monohydrate

**7 MEDICINE SCHEDULE (POISONS STANDARD)**

Pharmacy medicine (S2)

**8 SPONSOR**

Sanofi-Aventis Australia Pty Ltd

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Macquarie Park, NSW 2113

Freecall: 1800 818 806

**9 DATE OF FIRST APPROVAL**

17 February 2020

## 10 DATE OF REVISION

22 February 2021

### SUMMARY TABLE OF CHANGES

Section Changed	Summary of new information
6.5	Addition of twin pack 2 x 140