## **SUMMARY OF PRODUCT CHARACTERISTICS**

# Sporidex Suspension 125 mg / 5 mL, 250 mg / 5ml

(Cefalexin for Oral Suspension BP)

## 1. NAME OF THE MEDICINAL PRODUCT

### **SPORIDEX SUSPENSION**

# 2. QUALITATIVE AND QUANTITATIVE COMPOSITION

# SPORIDEX SUSPENSION 125 mg/5 mL

# SPORIDEX SUSPENSION 250 mg/5 mL

For excipients, see section 6.1

### 3. PHARMACEUTICAL FORM

**Oral Suspension** 

### 4. CLINICAL PARTICULARS

# 4.1 Therapeutic indications

Cefalexin is a semisynthetic cephalosporin antibiotic for oral administration.

Cefalexin is indicated in the treatment of the following infections due to susceptible microorganisms:

- Respiratory tract infections
- Otitis media
- Skin and soft tissue infections

- Bone and joint infections
- Genito-urinary tract infections, including acute prostatitis
- Dental infections

# 4.2 Posology and method of administration

## **Posology**

#### Adults

The adult dosage ranges from 1-4 g daily in divided doses; most infections will respond to a dosage of 500 mg every 8 hours. For skin and soft tissue infections, streptococcal pharyngitis and mild, uncomplicated urinary tract infections, the usual dosage is 250 mg every 6 hours, or 500 mg every 12 hours.

For more severe infections or those caused by less susceptible organisms, larger doses may be needed. If daily doses of cefalexin greater than 4 g are required, parenteral cephalosporins, in appropriate doses, should be considered.

## The elderly and patients with impaired renal function

As for adults. Reduce dosage if renal function is markedly impaired (see section 4.4).

## Paediatric population

The usual recommended daily dosage for children is 25-50 mg/kg (10-20 mg/lb) in divided doses. For skin and soft tissue infections, streptococcal pharyngitis and mild, uncomplicated urinary tract infections, the total daily dose may be divided and administered every 12 hours. For most infections the following schedule is suggested:

Children under 5 years: 125 mg every 8 hours. Children 5 years and over: 250 mg every 8 hours.

In severe infections, the dosage may be doubled. In the therapy of otitis media, clinical studies have reported that a dosage of 75 to 100 mg/kg/day in 4 divided doses is required.

In the treatment of beta-haemolytic streptococcal infections, a therapeutic dose should be administered for at least 10 days.

### Method of administration

For oral use.

For instructions on reconstitution of the medicinal product before administration, see section 6.6.

### 4.3 Contraindications

Hypersensitivity to the active substance or to any of the excipients listed in section 6.1.

Cefalexin is contraindicated in patients with known allergy to the cephalosporin group of antibiotics or to any of the excipients listed in section 6.1.

# 4.4 Special warnings and precautions for use

Before instituting therapy with cefalexin, every effort should be made to determine whether the patient has had previous hypersensitivity reactions to the cephalosporins, penicillins, or other drugs. Cefalexin should be given cautiously to penicillin-sensitive patients. There is some reorted clinical and laboratory evidence of partial cross-allergenicity of the penicillins and cephalosporins. Patients have had severe reactions (including anaphylaxis) to both drugs.

Pseudomembranous colitis has been reported with virtually all broad-spectrum antibiotics, including macrolides, semi-synthetic penicillins, and cephalosporins. It is important, therefore, to consider its diagnosis in patients who develop diarrhoea in association with the use of antibiotics. Such colitis may range in severity from mild to life-threatening. Mild cases of pseudomembranous colitis usually respond to drug discontinuance alone. In moderate to severe cases, appropriate measures should be taken.

If an allergic reaction to cefalexin occurs, the drug should be discontinued and the patient treated with the appropriate agents.

Prolonged use of cefalexin may result in the overgrowth of non-susceptible organisms. Careful observation of the patient is essential. If super-infection occurs during therapy, appropriate measures should be taken.

Reports of neurotoxicity have been identified in association with cephalosporin treatment. Symptoms may include encephalopathy, myoclonus and seizures. Elderly patients, patients with severe renal impairment or central nervous system disorders are particularly at risk. Cefalexin should be administered with caution in the presence of markedly impaired renal function. Careful clinical and laboratory studies should be made because safe dosage may be lower than that usually recommended. If dialysis is required for renal failure, the daily dose of cefalexin should not exceed 500mg. If cephalexin associated neurotoxicity is suspected, discontinuation of cefalexin should be considered.

Concurrent administration with certain other drug substances, such as aminoglycosides, other cephalosporins, or furosemide (frusemide) and similar potent diuretics, may increase the risk of nephrotoxicity.

Positive direct Coombs' tests have been reported during treatment with the cephalosporin antibiotics. In haematological studies, or in transfusion cross-matching procedures when antiglobulin tests are performed on the minor side, or in Coombs' testing of newborns whose mothers have received cephalosporin antibiotics before parturition, it should be recognized that a positive Coombs' test may be due to the drug.

A false positive reaction for glucose in the urine may occur with Benedict's or Fehling's solutions, or with copper sulphate test tablets.

Acute generalised exanthematous pustulosis (AGEP) has been reported in association with cefalexin treatment. At the time of prescription patients should be advised of the signs and symptoms and monitored closely for skin reactions. If signs and symptoms suggestive of these reactions appear, cefalexin should be withdrawn immediately and an alternative treatment considered. Most of these reactions were reported most likely in the first week during treatment.

# **Excipients**

**SPORIDEX SUSPENSION 125 mg / 5 ml, 250 mg/ 5 ml** contains sugar as one of the excipients. Patients with rare hereditary problems of fructose intolerance, glucose-galactose malabsorption, or sucrose-isomaltase insufficiency should not take this medicine.

This product also contains Allura Red AC (E129), which may cause allergic reactions.

## 4.5 Interaction with other medicinal products and other forms of interaction

As with other beta-lactam drugs, renal excretion of cefalexin is inhibited by probenecid.

An increase in plasma metformin C<sub>max</sub> and AUC by an average of 34% and 24%, respectively, and decrease in metformin renal clearance has been reported in the healthy subjects with co-administration of single 500 mg doses of cefalexin and metformin. No side-effects were reported in the healthy subjects in this study. No information is available about the interaction of cefalexin and metformin following multiple dose administration. The clinical significance of this study is unclear, particularly as no cases of "lactic acidosis" have been reported in association with concomitant metformin and cefalexin treatment.

Hypokalaemia has been reported in patient taking cytotoxic drugs for leukaemia when they were given gentamicin and cefalexin.

# 4.6 Pregnancy and lactation

## **Pregnancy**

Although laboratory and clinical studies have reported no evidence of teratogenicity, caution should be exercised when prescribing for the pregnant patient.

#### Lactation

The excretion of cefalexin in human breast milk reportedly increased up to 4 hours following a 500 mg dose. The drug reached a maximum level of 4 micrograms/ml, then decreased gradually and had disappeared 8 hours after administration. Caution should be exercised when cefalexin is administered to a nursing woman, since the neonate is presented with the risk of *candidasis* and CNS toxicity due to immaturity of the blood-brain barrier. There is a theoretical possibility of later sensitisation.

## 4.7 Effects on ability to drive and use machines

None known

#### 4.8 Undesirable effects

Gastro-intestinal: Symptoms of pseudomembranous colitis may appear either during or after antibiotic treatment. Nausea and vomiting have been reported rarely. The most frequent side-effect has been diarrhoea. It was very rarely severe enough to warrant cessation of therapy. Dyspepsia and abdominal pain have also occurred. As with some penicillins and some other cephalosporins, transient hepatitis and cholestatic jaundice have been reported rarely.

Hypersensitivity: Allergic reactions have been reported in the form of rash, urticaria, angioedema, and, rarely, erythema multiforme, Stevens-Johnson syndrome, and toxic epidermal necrolysis. These reactions usually subsided upon discontinuation of the drug, although in some cases supportive therapy may be necessary. Anaphylaxis has also been reported.

Haemic and lymphatic system: Eosinophilia, neutropenia, thrombocytopenia, and haemolytic anaemia have been reported.

Skin and subcutaneous tissue disorders: Acute generalised exanthematous pustulosis (AGEP) has been reported with unknown frequency.

Other: These have included genital and anal pruritus, genital candidiasis, vaginitis and vaginal discharge, dizziness, fatigue, headache, agitation, confusion, hallucinations, arthralgia, arthritis, and joint disorder. Reversible interstitial nephritis has been reported rarely. Slight

elevations in AST and ALT have been reported. There have been reports of neurological sequelae including tremor, myoclonia, convulsions, encephalopathy with drugs belonging to the class of cephalosporins. Most cases reported in patients with renal impairment who received doses that exceeded the recommended dose and resolved following discontinuation of treatment.

#### 4.9 Overdose

Symptoms of oral overdose may include nausea, vomiting, epigastric distress, diarrhoea, and haematuria.

In the event of severe overdosage, general supportive care is recommended, including close clinical and laboratory monitoring of haematological, renal, and hepatic functions, and coagulation status until the patient is stable. Forced diuresis, peritoneal dialysis, haemodialysis, or charcoal haemoperfusion have not been established as beneficial for an overdose of cefalexin. It would be extremely unlikely that one of these procedures would be indicated.

Unless 5 to 10 times the normal total daily dose has been ingested, gastro-intestinal decontamination should not be necessary.

There have been reports of haematuria, without impairment of renal function, in children accidentally ingesting more than 3.5 g of cefalexin in a day. Treatment has been supportive (fluids) and no sequelae have been reported.

### 5. PHARMACOLOGICAL PROPERTIES

### 5.1 Pharmacodynamic properties

Pharmacotherapeutic group: Antibacterials for systemic use, first-generation cephalosporins, ATC code: J01DB01

*In vitro* tests reported that cephalosporins are bactericidal because of their inhibition of cell-wall synthesis.

Cefalexin is active against the following organisms in vitro:

Beta-haemolytic streptococci

Staphylococci, including coagulase-positive, coagulase-negative, and penicillinase-producing strains

Streptococcus pneumoniae

Escherichia coli

Proteus mirabilis

*Klebsiella* species

Haemophilus influenzae

#### Branhamella catarrhalis

Most strains of enterococci (Streptococcus faecalis) and a few strains of staphylococci are resistant cefalexin. It is active against strains to not most of Enterobacter species, Morganella morganii, and Pr. vulgaris. It has no activity against Pseudomonas or Herellea species or Acinetobacter calcoaceticus. Penicillinresistant Streptococcus pneumoniae is usually cross-resistant to beta-lactam antibiotics. Staphylococci has been reported to exhibit cross-resistance between cefalexin and methicillintype antibiotics.

## 5.2 Pharmacokinetics properties

## **Absorption**

Cefalexin is acid stable and may be given without regard to meals.

Cefalexin is reported to be almost completely absorbed from the gastro-intestinal tract, and 75-100% is rapidly excreted in active form in the urine. Absorption is reported to be slightly reduced if the drug is administered with food. The reported half-life is approximately 60 minutes in patients with normal renal function. Haemodialysis and peritoneal dialysis will remove cefalexin from the blood.

### Distribution

Peak blood levels have been reported to be achieved one hour after administration, and therapeutic levels are maintained for 6-8 hours.

### **Elimination**

Approximately 80% of the active drug is reportedly excreted in the urine within 6 hours. No accumulation was reported with dosages above the therapeutic maximum of 4 g/day.

The half-life may be increased in neonates due to their renal immaturity, but there is no accumulation reported when given at up to 50 mg/kg/day.

### 5.3 Preclinical safety data

No adverse effect on fertility, foetal viability, foetal weight, or litter size were reported on daily oral administration of cefalexin to rats in doses of 250 or 500 mg/kg prior to and during pregnancy, or to rats and mice during the period of organogenesis only.

No enhanced toxicity in weanling and newborn rats as compared with adult animals were reported with cephalexin.

The reported oral LD<sub>50</sub> of cefalexin in rats is 5,000 mg/kg.

## 6. PHARMACEUTICAL PARTICULARS

# 6.1 List of excipients

# 6.2 Incompatibilities

Not applicable

## 6.3 Shelf life

36 months

# 6.4 Special precautions for storage

Store at or below 30° C

## 6.5 Nature and contents of container

100 ml Bottle

## 6.6 Special precautions for disposal and other handling

Not applicable

## 7. MARKETING AUTHORISATION HOLDER

Ranbaxy Nigeria Limited

# 8. MARKETING AUTHORISATION NUMBER(S)

04-1356

## 9. DATE OF FIRST AUTHORISATION/RENEWAL OF THE AUTHORISATION

### 10. DATE OF REVISION OF THE TEXT

December 2023

## REFERENCES

• Summary of Product Characteristics of Cefalexin Suspension 250 mg / 5ml, Flynn Pharma Limited, UK, November 2023.