

 **7 April 2021**

**SUMMARY OF PRODUCT CHARACTERISTICS**

**for**

**Clindamycin "Terix", pessaries**

**0. D.SP.NO.**

31433

**1. NAME OF THE MEDICINAL PRODUCT**

Clindamycin "Terix"

**2. QUALITATIVE AND QUANTITATIVE COMPOSITION**

Each pessary contains clindamycin phosphate equivalent to 100mg clindamycin.

For the full list of excipients, see section 6.1.

**3. PHARMACEUTICAL FORM**

Pessaries

Semisolid, off-white to yellowish pessaries (approximately 21 mm×13 mm).

**4. CLINICAL PARTICULARS**

**4.1 Therapeutic indications**

Clindamycin "Terix" is indicated for the treatment of bacterial vaginosis (formerly referred to as *Haemophilus* vaginitis, *Gardnerella* vaginitis, nonspecific vaginitis, *Corynebacterium* vaginitis, or anaerobic vaginosis).

Consideration should be given to official guidance on the appropriate use of antibacterial agents.

**4.2 Posology and method of administration**

Posology

The recommended dose is one pessary intravaginally at bedtime, for three consecutive days (see section 6.6).

*Older people*

The use of Clindamycin "Terix" has not been studied in patients over 65 years of age.

*Patients with renal impairment*

The use of Clindamycin "Terix" has not been studied in patients with impaired renal function.

*Paediatric population*

The safety and efficacy of Clindamycin "Terix" in children under 16 years of age has not been established.

Method of administration

Clindamycin "Terix" should be administered intravaginally (see section 6.6).

**4.3 Contraindications**

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

Clindamycin "Terix" is also contraindicated in individuals with a history of antibiotic-associated colitis.

**4.4 Special warnings and precautions for use**

Before or after initiation of therapy with Clindamycin "Terix", other infections including *Trichomonas vaginalis*, *Candida albicans*, *Chlamydia trachomatis* and gonococcal infections may need to be investigated by adequate laboratory tests.

The use of Clindamycin "Terix" may result in the overgrowth of non-susceptible organisms, particularly yeasts.

Onset of symptoms suggestive of pseudomembranous colitis may occur during or after antimicrobial treatment (see section 4.8). Pseudomembranous colitis has been reported with nearly all antibacterial agents, including clindamycin, and may range in severity from mild to life-threatening. Therefore, it is important that this is considered in patients who present with diarrhoea subsequent to the administration of antibacterial agents. Moderate cases may improve following withdrawal of the drug.

Clindamycin treatment must be stopped if pseudomembranous diarrhoea occurs. An adequate antibacterial therapy should be prescribed. Drugs inhibiting peristalsis are contra-indicated in this situation.

Caution is advised in patients when prescribing Clindamycin "Terix" to individuals with Inflammatory Bowel Disease such as Crohn’s Disease or Ulcerative Colitis.

As with all vaginal infections, sexual intercourse during treatment with Clindamycin "Terix" is not recommended. Latex condoms and diaphragms may be weakened if exposed to the suppository base used in Clindamycin "Terix" (see section 6.2). The use of such products within 72 hours following treatment with Clindamycin "Terix" is not recommended as such use could be associated with diminished contraceptive efficacy or protection against sexually transmitted disease.

The use of other vaginal products (such as tampons and douches) during the treatment with Clindamycin "Terix" is not recommended.

Safety and efficacy studies have not been performed with Clindamycin "Terix" in the following populations: pregnant, lactating women, patients with impaired hepatic function, immunodeficency or colitis.

Paediatric population

Safety and efficacy of Clindamycin "Terix" in paediatric patients has not been established (see section 4.2).

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

No information is available on the concomitant use of other vaginal medications with Clindamycin "Terix".

Systemic clindamycin phosphate has been shown to have neuromuscular blocking properties that may enhance the action of other neuromuscular blocking agents. Therefore, it should be used with caution in patients receiving such agents (see sections 4.9 and 5.2).

**4.6 Fertility, pregnancy and lactation**

Pregnancy

Studies in animals have shown reproductive toxicity (see section 5.3).

Use of Clindamycin "Terix" is not recommended during the first trimester, as there are no adequate and well-controlled studies in pregnant women over this period.

In clinical trials, intravaginal use of Clindamycin vaginal products in pregnant women during second trimester and systemic use of clindamycin phosphate during the second and third trimester has not been associated with congenital abnormalities.

Clindamycin "Terix" may be used to treat pregnant women if clearly necessary during the second and third trimester of pregnancy. Digital application of the pessary is recommended during pregnancy.

Breastfeeding

It is unknown whether clindamycin is excreted in human breast milk following vaginal administration, but it is used in much lower doses than systemic clindamycin, and approximately 30% (range 6%-70%) is systemically absorbed. Following systemic use, clindamycin has been reported to appear in human breast milk in ranges from <0.5 to 3.8 μg/mL. If clindamycin is administered systemically to a breastfeeding mother, there is a risk for adverse effects on the breastfed infant’s gastrointestinal flora such as diarrhea or blood in the stool, or rash. Use of Clindamycin "Terix" in a breastfeeding woman can be considered if the expected benefit to the mother outweighs the risks for the child.

Fertility

Studies in animals revealed no effect on fertility.

**4.7 Effects on ability to drive and use machines**

No traffic warning.

Clindamycin "Terix" has no or negligible influence on the ability to drive and use machines.

**4.8 Undesirable effects**

The safety of Clindamycin pessaries was evaluated in non-pregnant patients in clinical trials. Frequencies reported are as follows:

Common (≥ 1/100 to < 1/10); Uncommon (≥ 1/1,000 to < 1/100).

|  |  |  |
| --- | --- | --- |
| **System Organ Class** | **Common** **≥ 1/100 to < 1/10** | **Uncommon** **≥ 1/1,000 to < 1/100** |
| **Infections and infestations** | Fungal infection, candida infection |  |
| **Nervous system disorders** | Headache |  |
| **Gastrointestinal disorders** | Abdominal pain, diarrhoea, nausea  | Vomiting |
| **Skin and subcutaneous tissue disorders** | Pruritus (non-applicable site) | Rash |
| **Musculoskeletal and connective tissue disorders** |  | Flank pain |
| **Renal and urinary disorders** |  | Pyelonephritis, dysuria |
| **Reproductive system and breast disorders** | Vulvovaginal candidiasis, vulvovaginal pain, vulvovaginal disorder | Vaginal infection,vaginal discharge,menstrual disorder |
| **General disorders and administration site conditions** |  | Application site pain, pruritus (topical applicable site), localized oedema, pain, pyrexia  |

Pseudomembranous colitis is a class event for antibacterials.

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:

Lægemiddelstyrelsen

Axel Heides Gade 1

DK-2300 København S

Websted: www.meldenbivirkning.dk

**4.9 Overdose**

There are no reports of overdose with Clindamycin "Terix" pessaries.

Vaginally applied clindamycin phosphate contained in Clindamycin "Terix" can be absorbed in sufficient amounts to produce systemic effects.

In the event of overdosage, general symptomatic and supportive measures are indicated as required.

Accidental oral intake can lead to effects comparable with those of therapeutic concentrations of orally administered clindamycin.

**4.10 Legal status**

B

**5. PHARMACOLOGICAL PROPERTIES**

**5.0 Therapeutic classification**

ATC code: G 01 AA 10. Anti-infectives and antiseptics, excl. combinations with corticosteroids, antibiotics.

**5.1 Pharmacodynamic properties**

Mechanism of action

Clindamycin is a lincosamide antibiotic that inhibits bacterial protein synthesis at the level of the bacterial ribosome. The antibiotic binds preferentially to the 50S ribosomal subunit and affects the translation process. Although clindamycin phosphate is inactive *in vitro*, rapid *in vivo* hydrolysis converts this compound to the antibacterially active clindamycin.

Clindamycin, like most protein synthesis inhibitors, is predominantly bacteriostatic and efficacy is associated with the length of time the concentration of active ingredient remains above the MIC of the infecting organism.

Resistance

Clindamycin resistance in vaginal bacteria may develop during topical therapy.

Resistance to clindamycin is mostly due to modifications of the target site on the ribosome, usually by chemical modification of RNA bases or by point mutations in RNA or occasionally in proteins. Cross-resistance has been demonstrated *in vitro* between lincosamides, macrolides and streptogramins B in some organisms. Cross resistance has been demonstrated between clindamycin and lincomycin.

Susceptibility *in vitro*

Clindamycin is active *in vitro* against most strains of the following organisms that have been reported to be associated with bacterial vaginosis:

*Bacteroides spp.*

*Gardnerella vaginalis*

*Mobiluncus spp.*

*Mycoplasma hominis*

*Peptostreptococcus spp.*

Standard methodology for the susceptibility testing of the potential bacterial vaginosis pathogens, *Gardnerella vaginalis, Mobiluncus spp.,* or *Mycoplasma hominis,* has not been defined.

Break-points of relevant organism have not been determined for topical agents.

**5.2 Pharmacokinetic properties**

Absorption

Systemic absorption of clindamycin was estimated following a once-a-day intravaginal dose of one clindamycin phosphate vaginal suppository (equivalent to 100 mg clindamycin) administered to 11 healthy female volunteers for 3 days. Approximately 30% (range 6% to 70%) of the administered dose was absorbed systemically on day 3 of dosing based on area under the concentration-time curve (AUC). Systemic absorption was estimated using a sub-therapeutic 100 mg intravenous dose of clindamycin phosphate as a comparator in the same volunteers as well as a 100 mg dose of clindamycin phosphate vaginal cream. The mean AUC following day 3 of dosing with the suppository was 3.2 µg•hr/mL (range 0.42 to 11 µg•hr/mL). The Cmax observed on day 3 of dosing with the suppository averaged 0.27 µg/mL (range 0.03 to 0.67 µg/mL) and was observed about 5 hours after dosing (range 1 to 10 hours). In contrast, the AUC and Cmax after the single intravenous dose averaged 11 µg•hr/mL (range 5.1 to 26 µg•hr/mL) and 3.7 µg/mL (range 2.4 to 5.0 µg/mL), respectively. The mean apparent elimination half-life after dosing with the suppository was 11 hours (range 4 to 35 hours) and is considered to be limited by the absorption rate.

The results from this study showed that systemic exposure to clindamycin (based on AUC) from the suppository was, on average, three-fold lower than that from a single sub-therapeutic 100 mg intravenous dose of clindamycin. Relative to a comparable dose of clindamycin vaginal cream, systemic absorption of the suppository was approximately 7-fold greater than that following dosing of the vaginal cream with average values of AUC and Cmax of 0.4 µg.hr/mL (range 0.13 to 1.16µg.hr/mL) and 0.02µg/mL (range 0.01 to 0.07µg/mL) respectively for the clindamycin vaginal cream. In addition, the recommended daily and total doses of intravaginal clindamycin suppository are far lower than those typically administered in oral or parenteral clindamycin therapy (100 mg of clindamycin per day for 3 days equivalent to about 30 mg absorbed per day from the suppository relative to 600 to 2700 mg/day for up to 10 days or more, orally or parenterally). The overall systemic exposure to clindamycin from clindamycin vaginal suppositories is substantially lower than the systemic exposure from therapeutic doses of oral clindamycin hydrochloride (two-fold to 20-fold lower) or parenteral clindamycin phosphate (40-fold to 50-fold lower).

**5.3 Preclinical safety data**

Toxicology

Clindamycin phosphate (5 mg) suspended in a hard fat (a suppository base consisting of a mixture of glycerides of saturated fatty acids) suppository was tested in the ovariectomized rat model. The results indicated that the formulation caused mild vaginal irritation during treatment that quickly reversed after treatment was stopped.

Carcinogenicity/mutagenicity

Long-term studies have not been performed in animals with clindamycin to evaluate carcinogenic potential. A rat micronucleus and an Ames genotoxicity test were negative.

Toxicity to reproduction

Fertility studies in rats treated orally with up to 300mg/kg/day of clindamycin revealed no effects on fertility or mating ability. No animal fertility studies have been performed using the vaginal route of administration.

In oral embryo-fetal development studies in rats and subcutaneous embryo-fetal development studies in rats and rabbits, embryo-fetal toxicity was observed at doses that produced maternal toxicity. In rats, maternal death occurred with exposure margins of approximately 400-fold relative to patient exposure. In rabbits, maternal toxicity, including abortions, occurred at exposure margins of 50-fold relative to patient exposure. Embryo-fetal toxicity, including post-implantation loss and decreased viability, occurred in rabbits at exposure margins of 120-fold. Clindamycin was not teratogenic in rats and rabbits.

Exposure margins from rat and rabbit developmental NOAELs (250 and 5 mg/kg/day, respectively) were 39 times and 5 times the mean AUC (3.2 μg•h/mL) of clindamycin in healthy female volunteers administered clindamycin phosphate vaginal suppository (equivalent to 100 mg clindamycin) once daily for 3 days.

**6. PHARMACEUTICAL PARTICULARS**

**6.1 List of excipients**

Hard Fat

**6.2 Incompatibilities**

No information is available on concomitant use with other intravaginal products. The use of latex condoms is not recommended during therapy with Clindamycin "Terix". There are no data available regarding the effect of Clindamycin "Terix" on latex diaphragms.

**6.3 Shelf-life**

36 months.

**6.4 Special precautions for storage**

Store below 30 °C.

**6.5 Nature and contents of container**

White PVC-PE strips packed in a carton box.

Pack sizes: 3 pessaries.

Not all pack sizes may be marketed.

**6.6 Special precautions for disposal and other handling**

Do not use this product if the strips containing pessaries are torn, opened, or incompletely sealed.

Insertion

* Remove the pessary from the strip.
* Lie on your back with your knees drawn up to your chest.
* Insert the pessary into the vagina with the tip of your third (middle) finger as far as possible without causing discomfort.

Any unused medicinal product or waste material should be disposed of in accordance with local requirements

**7. MARKETING AUTHORISATION HOLDER**

Terix Labs Ltd.

1 Menandrou Street

FROSIA Building, 5th floor, Flat/Office 502

1066 Nicosia

Cyprus

**8. MARKETING AUTHORISATION NUMBER(S)**

62057

**9. DATE OF FIRST AUTHORISATION**

29 October 2020

**10. DATE OF REVISION OF THE TEXT**

7 April 2021