Uses and Administration

Methylprednisolone is a corticosteroid with mainly glucocorticoid activity (p.1490); 4 mg of methylprednisolone is equivalent in anti-inflammatory activity to about 5 mg of prednisolone.

It is used, either in the form of the free alcohol or in one of the esterified forms, in the treatment of conditions for which corticosteroid therapy is indicated (see p.1495) except adrenocortical-deficiency states, for which hydrocortisone with supplementary fludrocortisone is preferred.

The dose is usually expressed in terms of the base, and the following are each equivalent to about 40 mg of methylprednisolone:

- methylprednisolone acetate 44 mg
- methylprednisolone hydrogen succinate 51 mg
- methylprednisolone sodium succinate 53 mg

When given **orally**, methylprednisolone usually has an initial dosage range of 4 to 48 mg daily but higher initial doses of up to 100 mg or more daily may be used in acute severe disease.

For **parenteral use** in **intensive** or **emergency therapy**, methylprednisolone sodium succinate may be given by intramuscular or intravenous injection or by intravenous infusion. The intravenous route is preferred for its more rapid effect in emergency therapy. The usual initial intramuscular or intravenous dose ranges from the equivalent of 10 to 500 mg of methylprednisolone daily. Large intravenous doses (over 250 mg) should normally be given slowly over at least 30 minutes; doses up to 250 mg should be given over at least 5 minutes. High doses should generally not be given for prolonged periods; emergency treatment should only be used until the patient is stabilised. High doses given intermittently for a limited period have sometimes been known as 'pulse therapy' (see Administration, below) and in graft rejection (see Organ and Tissue Transplantation, p.1810) up to 1 g has been given daily for up to 3 days. In intensive therapy of acute spinal cord injury (p.1513) initial doses of the equivalent of up to 30 mg/kg of methylprednisolone have been given by bolus intravenous injection over 15 minutes and followed, after a 45-minute pause, by intravenous infusion of 5.4 mg/kg per hour over 24 hours or longer. For slow intravenous infusion methylprednisolone sodium succinate is dissolved in an appropriate volume of glucose 5% or sodium chloride 0.9% or sodium chloride 0.9% and glucose 5%.

Parenteral doses in children have varied considerably, depending on the condition: a range of 1 to 30 mg/kg of methylprednisolone daily has been given by the intravenous or intramuscular routes. A total dose of 1 g daily should not normally be exceeded.

Methylprednisolone acetate may be given by intramuscular injection for a prolonged systemic effect, the dose varying from 40 mg every 2 weeks to 120 mg weekly.

For **intra-articular injection** and for **injection into soft tissues** methylprednisolone acetate as an aqueous suspension is used. The dose by intra-articular injection varies from 4 to 80 mg according to the size of the affected joint. The acetate may also be given by intralesional injection in doses of 20 to 60 mg.

For use in the treatment of various skin disorders methylprednisolone acetate may be applied **topically**, usually in concentrations of 0.25%. The aceponate, which may exhibit modified topical activity, has also been applied as a 0.1% cream, lotion, or ointment. For recommendations concerning the correct use of corticosteroids on the skin, and a rough guide to the clinical potencies of topical corticosteroids, see p.1497.

Other esters of methylprednisolone that have occasionally been used include the cipionate and the suleptanate.

◊ General references.

1. Cronstein BN. Clinical use of methylprednisolone sodium succinate: a review. *Curr Ther Res* 1995; **56:** 1–15.

Administration. For short-term intensive corticosteroid therapy or in certain emergency situations a technique known as 'pulse therapy' has been used. Methylprednisolone has often been used in this manner. Typically, high doses of about 1 g intravenously have been given, daily or on alternate days or weekly, for a limited number of doses; the most common regimen appears to be 1 g daily for 3 days.

Blood disorders. Methylprednisolone is one of the corticosteroids that have been used in the management of haemangioma (p.1505) and the Kasabach-Merritt syndrome.[1] There are also reports of benefit from very high-dose therapy in a few patients with refractory primary acquired pure red cell aplasia,[2] or aplasia due to Blackfan-Diamond anaemia.[3]

1. Özsoylu Ş, *et al.* Megadose methylprednisolone therapy for Kasabach-Merritt syndrome. *J Pediatr* 1996; **129:** 947.
2. Kadikoylu G, *et al.* High-dose methylprednisolone therapy in pure red cell aplasia. *Ann Pharmacother* 2002; **36:** 55–8.
3. Bernini JC, *et al.* High-dose intravenous methylprednisolone therapy for patients with Diamond-Blackfan anemia refractory to conventional doses of prednisone. *J Pediatr* 1995; **127:** 654–9.

IDIOPATHIC THROMBOCYTOPENIC PURPURA. High-dose intravenous methylprednisolone may be used as part of the emergency management of acute idiopathic thrombocytopenic purpura (p.1505), for example when major acute bleeding or intracranial haemorrhage supervene. There is some evidence that methylprednisolone is less effective than normal immunoglobulins. Methylprednisolone has also been used by mouth or intravenously in the management of the chronic form, although prednisolone or prednisone are more frequently used for oral therapy and good controlled trials are scanty.

References.

1. von dem Borne AEGKR, *et al.* High dose intravenous methylprednisolone or high dose intravenous gammaglobulin for autoimmune thrombocytopenia. *BMJ* 1988; **296:** 249–50.
2. Özsoylu S, *et al.* Megadose methylprednisolone for chronic idiopathic thrombocytopenic purpura. *Lancet* 1990; **336:** 1078–9.
3. Akoğlu T, *et al.* Megadose methylprednisolone pulse therapy in adult idiopathic thrombocytopenic purpura. *Lancet* 1991; **337:** 56.
4. Özsoylu S. Mega-dose methylprednisolone for chronic idiopathic thrombocytopenic purpura. *Lancet* 1991; **337:** 1611–12.
5. Rosthøj S, *et al.* Randomized trial comparing intravenous immunoglobulin with methylprednisolone pulse therapy in acute idiopathic thrombocytopenic purpura. *Acta Paediatr* 1996; **85:** 910–15.
6. Alpdoğan Ö, *et al.* Efficacy of high-dose methylprednisolone as a first-line therapy in adult patients with idiopathic thrombocytopenic purpura. *Br J Haematol* 1998; **103:** 1061–3.
7. Godeau B, *et al.* Intravenous immunoglobulin or high-dose methylprednisolone, with or without oral prednisone, for adults with untreated severe autoimmune thrombocytopenic purpura: a randomised, multicentre trial. *Lancet* 2002; **359:** 23–9.

Rheumatoid arthritis. Methylprednisolone given in intravenous pulses has been reported[1-7] to be effective in the treatment of rheumatoid arthritis (p.11) including juvenile idiopathic arthritis. Some studies have shown this treatment to be of greatest benefit when given with a disease-modifying antirheumatic drug (DMARD),[1,2,4] although others showed the addition of methylprednisolone to existing therapy to have no extra benefit.[6] A comparatively low dose of 100 mg was found to be as effective as 1000 mg in one study.[3] Monthly doses of methylprednisolone by deep intramuscular injection were also an effective adjunct to gold therapy.[8]

A preliminary study in children has found intravenous pulses of methylprednisolone 30 mg/kg to be effective treatment for systemic flares of juvenile idiopathic arthritis.[7]

1. Walters HT, Cawley MID. Combined suppressive drug treatment in severe refractory rheumatoid disease: an analysis of the relative effects of parenteral methylprednisolone, cyclophosphamide and sodium aurothiomalate. *Ann Rheum Dis* 1988; **47:** 924–9.
2. Smith MD, *et al.* The clinical and immunological effects of pulse methylprednisolone therapy in rheumatoid arthritis I: clinical effects. *J Rheumatol* 1988; **15:** 229–32.
3. Igelhart IW, *et al.* Intravenous pulsed steroids in rheumatoid arthritis: a comparative dose study. *J Rheumatol* 1990; **17:** 159–62.
4. Smith MD, *et al.* Pulse methylprednisolone therapy in rheumatoid arthritis: unproved therapy, unjustified therapy, or effective adjunctive treatment? *Ann Rheum Dis* 1990; **49:** 265–7.
5. Kapisinszky N, Keszthelyi B. High dose intravenous methylprednisolone pulse therapy in patients with rheumatoid arthritis. *Ann Rheum Dis* 1990; **49:** 567–8.
6. Hansen TM, *et al.* Double blind placebo controlled trial of pulse treatment with methylprednisolone combined with disease modifying drugs in rheumatoid arthritis. *BMJ* 1990; **301:** 268–70.
7. Adebajo AO, Hall MA. The use of intravenous pulsed methylprednisolone in the treatment of systemic-onset juvenile chronic arthritis. *Br J Rheumatol* 1998; **37:** 1240–2.
8. Corkill MM, *et al.* Intramuscular depot methylprednisolone induction of chrysotherapy in rheumatoid arthritis: a 24-week randomized controlled trial. *Br J Rheumatol* 1990; **29:** 274–9.

Systemic lupus erythematosus. Methylprednisolone has been widely used to treat disease flares or severe manifestations of SLE (p.1513).

References.

1. Badsha H, Edwards CJ. Intravenous pulses of methylprednisolone for systemic lupus erythematosus. *Semin Arthritis Rheum* 2003; **32:** 370–7.
2. Danowski A, *et al.* Flares in lupus: Outcome Assessment Trial (FLOAT), a comparison between oral methylprednisolone and intramuscular triamcinolone. *J Rheumatol* 2006; **33:** 57–60.
3. Trevisani VF, *et al.* Cyclophosphamide versus methylprednisolone for treating neuropsychiatric involvement in systemic lupus erythematosus. Available in The Cochrane Database of Systematic Reviews; Issue 2. Chichester: John Wiley; 2006 (accessed 20/06/06).

Preparations

BP 2008: Methylprednisolone Acetate Injection; Methylprednisolone Tablets;
USP 31: Methylprednisolone Acetate Cream; Methylprednisolone Acetate Injectable Suspension; Methylprednisolone Sodium Succinate for Injection; Methylprednisolone Tablets; Neomycin Sulfate and Methylprednisolone Acetate Cream.

Proprietary Preparations (details are given in Part 3)
Arg.: Advantan; Cipridanol; Corticel†; Cortisolona†; Solu-Medrol; ***Austral.:*** Advantan; Depo-Medrol; Depo-Nisolone; Medrol†; Solu-Medrol; ***Austria:*** Advantan; Depo-Medrol; Solu-Medrol; Urbason; ***Belg.:*** Advantan; Depo-Medrol; Medrol; Solu-Medrol; ***Braz.:*** Advantan; Alergolon; Depo-Medrol; Predmetil; Solu-Medrol; Solu-Pred†; Solupren; Unimedrol; ***Canad.:*** Depo-Medrol; Medrol; Solu-Medrol; ***Chile:*** Depo-Medrol; Medrol; Solu-Medrol; ***Cz.:*** Advantan; Depo-Medrol; Medrol; Metypred†; Solu-Medrol; Urbason†; ***Denm.:*** Depo-Medrol; Medrol; Solu-Medrol; ***Fin.:*** Advantan; Depo-Medrol; Medrol; Solomet; Solu-Medrol; ***Fr.:*** Depo-Medrol; Medrol; Solu-Medrol; ***Ger.:*** Advantan; Depo-Medrate†; M-PredniHexal; Medrate; Metypred; Metysolon; Predni M; Urbason; ***Gr.:*** Advantan; Depo-Medrol; Depo-Medrone†; Lyo-drol†; Medrol; Solu-Medrol; ***Hong Kong:*** Advantan; Depo-Medrol; Medrol; Solu-Medrol; ***Hung.:*** Depo-Medrol; Medrol; Metypred; Solu-Medrol; ***India:*** Depo-Medrol; Solu-Medrol; Unidrol†; ***Indon.:*** Advantan; Depo-Medrol; Flason; Hexilon; Intidrol; Lameson; Lexcomet; Medixon; Medrol; Meprilon; Meproson; Mesol; Methylon; Metidrol; Metisol; Nichomedson; Prednicort; Prednox; Pretilon; Sanexon; Solu-Medrol; Somerol; Sonicor; Stenirol; Thimelon; Tison; Tropidrol; Urbason; Yalone; ***Irl.:*** Depo-Medrone; Solu-Medrone; ***Israel:*** A-Methapred†; Depo-Medrol; Medrol; Solu-Medrol; Vanderm†; ***Ital.:*** Advantan; Asmacortone; Avancort; Depo-Medrol; Esametone†; Medrol; Metilbetasone Solubile; Solu-Medrol; Supresol; Urbason; ***Malaysia:*** Depo-Medrol; Solu-Medrol; ***Mex.:*** Advantan; Cryosolona; Depo-Medrol; Metisona; Prednilem; Radilem; Solipred; Solu-Medrol; ***Neth.:*** Depo-Medrol; Metypresol†; Solu-Medrol; ***Norw.:*** Depo-Medrol; Medrol; Solu-Medrol; ***NZ:*** Advantan; Depo-Medrol; Medrol; Solu-Medrol; ***Philipp.:*** Adrena; Advantan; Depo-Medrol; Medixon; Medrol; Solu-Medrol; ***Pol.:*** Advantan; Depo-Medrol; Medrol; Metypred; Solu-Medrol; ***Port.:*** Advantan; Depo-Medrol; Medrol; Metilpren; Solu-Medrol; ***Rus.:*** Advantan (Адвантан); Depo-Medrol (Депо-медрол)†; Medrol (Медрол); Metypred (Метипред); Solu-Medrol (Солу-медрол); ***S.Afr.:*** Advantan; Depo-Medrol; Medrol; Metypresol; Solu-Medrol; ***Singapore:*** Solu-Medrol; ***Spain:*** Adventan; Depo Moderin†; Lexxema; Solu-Moderin; Urbason; ***Swed.:*** Depo-Medrol; Medrol; Solu-Medrol; ***Switz.:*** Advantan; Depo-Medrol; Medrol; Solu-Medrol; ***Thai.:*** Depo-Medrol; Solu-Medrol; ***Turk.:*** Advantan; Depo-Medrol; Prednol; ***UK:*** Depo-Medrone; Medrone; Solu-Medrone; ***USA:*** A-Methapred; depMedalone; Depo-Medrol; Depopred†; Medrol; Solu-Medrol; ***Venez.:*** Advantan; Depo-Medrol; Medrol; Prednicort; Solu-Medrol.

Multi-ingredient: ***Austral.:*** Neo-Medrol; ***Austria:*** Depo-Medrol mit Lidocain; ***Belg.:*** Depo-Medrol + Lidocaine; ***Canad.:*** Depo-Medrol with Lidocaine; Medrol Acne Lotion; Neo-Medrol Acne; Neo-Medrol Veriderm†; ***Fin.:*** Depo-Medrol cum Lidocain; Neo-Medrol comp†; Solomet c bupivacain hydrochlorid; ***Hong Kong:*** Depo-Medrol with Lidocaine; Neo-Medrol Acne; ***Irl.:*** Depo-Medrone with Lidocaine; ***Israel:*** Depo-Medrol with Lidocaine; Neo-Medrol; ***Ital.:*** Depo-Medrol + Lidocaina; Medrol Lozione Antiacne†; Neo-Medrol Veriderm†; ***Malaysia:*** Neo-Medrol; ***Neth.:*** Depo-Medrol + Lidocaine; ***Norw.:*** Depo-Medrol cum Lidocain; ***NZ:*** Depo-Medrol with Lidocaine; ***Pol.:*** Depo-Medrol z Lidokaina; ***Port.:*** Depo-Medrol com Lidocaina; ***S.Afr.:*** Depo-Medrol with Lidocaine; Neo-Medrol; ***Singapore:*** Neo-Medrol; ***Spain:*** Moderin Acne†; ***Swed.:*** Depo-Medrol cum Lidocain; ***Switz.:*** Depo-Medrol Lidocaine; ***Thai.:*** Depo-Medrol with Lidocaine†; Neo-Medrol; ***UK:*** Depo-Medrone with Lidocaine.

Mometasone Furoate *(BANM, USAN, rINNM)* ⊗

Furoato de mometasona; Mométasone, furoate de; Mometasonfuroat; Mometason-furoát; Mometasoni furoas; Mometasonifuroaatti; Mometazon Furoat; Mometazon-furoát; Mometazono furoatas; Mometazonu furoinian; Sch-32088. 9α,21-Dichloro-11β,17-dihydroxy-16α-methylpregna-1,4-diene-3,20-dione 17-(2-furoate).

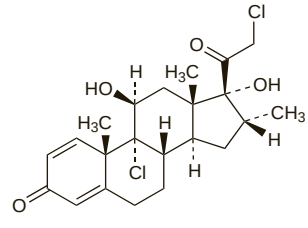
Мометазона Фуроат

$C_{27}H_{30}Cl_2O_6$ = 521.4.

CAS — 105102-22-5 (mometasone); 83919-23-7 (mometasone furoate).

ATC — D07AC13; R01AD09; R03BA07.

ATC Vet — QD07AC13; QR01AD09; QR03BA07.



(mometasone)

Pharmacopoeias. In *Eur.* (see p.vii) and *US.*

Ph. Eur. 6.2 (Mometasone Furoate). A white or almost white powder. Practically insoluble in water; slightly soluble in alcohol; soluble in acetone and in dichloromethane.

USP 31 (Mometasone Furoate). A white to off-white powder. Soluble in acetone and in dichloromethane.

Profile

Mometasone furoate is a corticosteroid used topically for its glucocorticoid activity (see p.1490) in the treatment of various **skin disorders**. It is usually used as a cream, ointment, or lotion containing 0.1%.

When applied topically, particularly to large areas, when the skin is broken, or under occlusive dressings, or when given intranasally, corticosteroids may be absorbed in sufficient amounts to cause systemic effects (see p.1490). The effects of topical corticosteroids on the skin are described on p.1492. For recommendations concerning the correct use of corticosteroids on the skin, and a rough guide to the clinical potencies of topical corticosteroids, see p.1497.

A nasal suspension of mometasone furoate 0.05%, as the monohydrate, is given in the treatment and prophylaxis of the symptoms of **allergic rhinitis** (p.565). The usual adult dose is the equivalent of 100 micrograms of mometasone furoate in each nostril once daily, increased if necessary to 200 micrograms in each nostril daily. Once symptoms are controlled a dose of 50 micrograms in each nostril daily may be effective for maintenance. In the UK, the dose for children aged between 6 and 11 years is the equivalent of 50 micrograms in each nostril once daily. In the USA, similar doses may be given to treat allergic rhinitis in children from 2 years of age.

The nasal suspension is also given for the treatment of **nasal polyps** in patients 18 years and older; the recommended initial dose in the UK is 100 micrograms into each nostril once daily, increased after 5 to 6 weeks to twice daily if needed. In the USA the recommended initial dose is 100 micrograms in each nostril twice daily, although once daily administration may be sufficient in some patients.

Mometasone furoate is used by dry powder inhaler for the prophylaxis of **asthma** (p.1108). Doses may differ between countries and dosage units may be expressed differently, as either the amount of drug released per actuation or the amount delivered from the mouthpiece. UK licensed product information includes an initial dose of 400 micrograms inhaled once daily in the evening for mild to moderate asthma in adults and adolescents aged 12 years and older. This may be adjusted to a maintenance dose of 200 micrograms once or twice daily. In severe asthma, an initial dose of 400 micrograms twice daily is used, then titrated to the lowest effective dose once symptoms are controlled. US doses are provided in terms of the amount of drug released per actuation (an actuation that releases 110 micrograms delivers 100 micrograms from the mouthpiece). An initial dose of 220 micrograms once daily in the evening is used in adults and adolescents, aged 12 years and older, who have been treated with inhaled therapy only (bronchodilators or corticosteroids); this may be increased to a maximum of 440 micrograms daily as a single dose or 2 divided doses. Patients receiving oral corticosteroids may be started on 440 micrograms twice daily. Children aged 4 to 11 years may be given 110 micrograms once daily in the evening, regardless of prior therapy; this is the maximum recommended daily dose.

◊ References.

1. Prakash A, Benfield P. Topical mometasone: a review of its pharmacological properties and therapeutic use in the treatment of dermatological disorders. *Drugs* 1998; **55:** 145–63.
2. Onrust SV, Lamb HM. Mometasone furoate: a review of its intranasal use in allergic rhinitis. *Drugs* 1998; **56:** 725–45.
3. Meltzer EO, *et al.* A dose-ranging study of mometasone furoate aqueous nasal spray in children with seasonal allergic rhinitis. *J Allergy Clin Immunol* 1999; **104:** 107–14.
4. Meltzer EO, *et al.* Added relief in the treatment of acute recurrent sinusitis with adjunctive mometasone furoate nasal spray. *J Allergy Clin Immunol* 2000; **106:** 630–7.
5. Sharpe M, Jarvis B. Inhaled mometasone furoate: a review of its use in adults and adolescents with persistent asthma. *Drugs* 2001; **61:** 1325–50.
6. O'Connor B, *et al.* Dose-ranging study of mometasone furoate dry powder inhaler in the treatment of moderate persistent asthma using fluticasone propionate as an active comparator. *Ann Allergy Asthma Immunol* 2001; **86:** 397–404.
7. Lundblad L, *et al.* Mometasone furoate nasal spray in the treatment of perennial non-allergic rhinitis: a Nordic, multicenter, randomized, double-blind, placebo-controlled study. *Acta Otolaryngol* 2001; **121:** 505–9.
8. Schenkel E. Features of mometasone furoate nasal spray and its utility in the management of allergic rhinitis. *Expert Opin Pharmacother* 2003; **4:** 1579–91.
9. van Drunen C, *et al.* Nasal allergies and beyond: a clinical review of the pharmacology, efficacy, and safety of mometasone furoate. *Allergy* 2005; **60** (suppl 80): 5–19. Correction. *ibid.*; 1335.
10. Stjarne P, *et al.* A randomized controlled trial of mometasone furoate nasal spray for the treatment of nasal polyposis. *Arch Otolaryngol Head Neck Surg* 2006; **132:** 179–85.
11. McCormack PL, Plosker GL. Inhaled mometasone furoate: a review of its use in persistent asthma in adults and adolescents. *Drugs* 2006; **66:** 1151–68.
12. Zitt M, *et al.* Mometasone furoate nasal spray: a review of safety and systemic effects. *Drug Safety* 2007; **30:** 317–26.

Preparations

BP 2008: Mometasone Aqueous Nasal Spray; Mometasone Cream; Mometasone Ointment; Mometasone Scalp Application; ***USP 31:*** Mometasone Furoate Cream; Mometasone Furoate Ointment; Mometasone Furoate Topical Solution.

Proprietary Preparations (details are given in Part 3)

Arg.: Elocon; Fenisona; Metason; Momeplus; Nasonex; Novasone; Uniclar; ***Austral.:*** AllerMax†; Elocon; Nasonex; Novasone; ***Austria:*** Asmanex; Elocon; Elovent; Nasonex; ***Belg.:*** Elocom; Nasonex; ***Braz.:*** Asmanex†; Elocom; Nasonex; Topison; ***Canad.:*** Elocom; Nasonex; ***Chile:*** Dermenet†; Dermosona; Elocom; Flogocort; Lisoder; Momelab; Nasonex; Rinoval†; Uniclar; ***Cz.:*** Asmanex; Elocom; Nasonex; ***Denm.:*** Asmanex; Elocon; Nasonex; ***Fin.:*** Asmanex†; Elocon; Nasonex; ***Fr.:*** Nasonex; ***Ger.:*** Asmanex; Ecural; Nasonex; ***Gr.:*** Asmanex; Bioelementa; Ecelecort; Elocon; Elovent†; Esine; F-Din; Fremomet; Makiren; Metason; Mofur; Molken; Momecort; Movesan; Mozeton; Nasamet; Nasonex; Pharmecort; Yperod; ***Hong Kong:*** Elomet; Nasonex; Topcort; ***Hung.:*** Elocom; Nasonex; ***India:*** Elocon; Metaspray; Momate; Topcort; ***Indon.:*** Dermovel; Elocon; Eloskin; Elox; Intercon; Mefurosan; Mesone; Mofacort; Mofulex; Momet; Motaderm; Moteson; Nasonex; ***Irl.:*** Asmanex; Elocon; Nasonex; ***Israel:*** Elocom; Nasonex; ***Ital.:*** Altosone; Elocon; Nasonex; Rinelon; Uniclar†; ***Malaysia:*** Elomet; Momate; Nasonex; ***Mex.:*** Elica; Elomet; Elovent; Rinelon; Uniclar; ***Neth.:*** Asmanex; Elocon; Elovent; Nasonex; ***Norw.:*** Elocon; Nasonex; ***NZ:*** Asmanex; Bronconex; Elocon; ***Philipp.:*** Elica; Elocon; Momate; Nasonex; Rinelon; ***Pol.:*** Elocom; Elosone; Nasonex; ***Port.:*** Asmanex; Elocom; Elomet; Elovent; Nasomet; Prospiril; ***Rus.:*** Elocom (Элоком); Nasonex (Назонекс); ***S.Afr.:*** Elica†; Elocon; Nasonex; Rinelon†; ***Singapore:*** Elomet; Nasonex; ***Spain:*** Asmanex†; Elica; Elocom; Nasonex; Rinelon; ***Swed.:*** Asmanex; Elocon; Nasonex; ***Switz.:*** Asmanex; Elocom; Nasonex; ***Thai.:*** Elomet; Nasonex; Rinelon†; ***Turk.:*** Elocon; M-Furo; Nasonex; ***UK:*** Asmanex; Elocon; Nasonex; ***USA:*** Asmanex; Elocon; Nasonex; ***Venez.:*** Asmanex; Cortynase; Dergentil; Elocon; Eloconex†; Elomet; Nasonex; Uniclar†.

Multi-ingredient: ***Arg.:*** Elosalic†; ***Austria:*** Elosalic; ***Chile:*** Velosalic; ***Cz.:*** Momesalic; Monsalic†; ***Ger.:*** Elosalic; ***Hong Kong:*** Elosalic; ***India:*** Momate-S; ***Indon.:*** Elosalic; ***Pol.:*** Elosalic; ***Port.:*** Monsalic; ***Rus.:*** Elocom-S (Элоком-С); ***S.Afr.:*** Elosalic; ***Swed.:*** Elosalic; ***Thai.:*** Elosalic†; ***Turk.:*** Elosalic; ***Venez.:*** Elosalic.

Paramethasone Acetate *(BANM, USAN, rINNM)* ⊗

Acetato de parametasona; 6α-Fluoro-16α-methylprednisolone 21-Acetate; Parametazon Asetat; Paraméthasone, Acétate de; Paramethasoni Acetas. 6α-Fluoro-11β,17α,21-trihydroxy-16α-methylpregna-1,4-diene-3,20-dione 21-acetate.

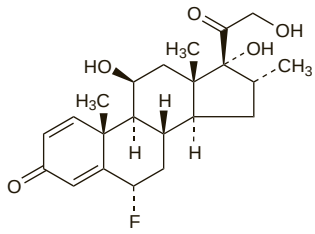
Параметазона Ацетат

$C_{24}H_{31}FO_6$ = 434.5.

CAS — 53-33-8 (paramethasone); 1597-82-6 (paramethasone acetate).

ATC — H02AB05.

ATC Vet — QH02AB05.



(paramethasone)

Pharmacopoeias. In *Fr.* and *US.*

USP 31 (Paramethasone Acetate). A white to creamy-white, fluffy, odourless, crystalline powder. Insoluble in water; soluble 1 in 50 of chloroform and 1 in 40 of methyl alcohol; soluble in ether. Store in airtight containers.

Profile

Paramethasone acetate is a corticosteroid that has been used systemically for its predominantly glucocorticoid activity (p.1490); 2 mg of paramethasone is equivalent in anti-inflammatory activity to about 5 mg of prednisolone. The disodium phosphate has also been used.

Preparations

USP 31: Paramethasone Acetate Tablets.

Proprietary Preparations (details are given in Part 3)

Mex.: Dilar; ***Spain:*** Cortidene; ***Turk.:*** Depo-Dilar.

Multi-ingredient: ***Mex.:*** Dilarmine.

Prednicarbate *(BAN, USAN, rINN)* ⊗

Hoe-777; Prednicarbato; Prednicarbatum; Prednikarbaatti; Prednikarbát; Prednikarbat; Prednikarbatas; S-77-0777. 11β,17,21-Trihydroxypregna-1,4-diene-3,20-dione 17-(ethyl carbonate) 21-propionate.

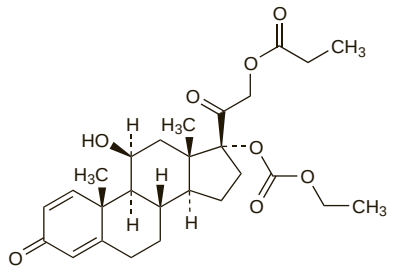
Предникарбат

$C_{27}H_{36}O_8$ = 488.6.

CAS — 73771-04-7.

ATC — D07AC18.

ATC Vet — QD07AC18.



Pharmacopoeias. In *Eur.* (see p.vii) and *US.*

Ph. Eur. 6.2 (Prednicarbate). A white or almost white, crystalline powder. It shows polymorphism. Practically insoluble in water; freely soluble in alcohol and in acetone; sparingly soluble in propylene glycol. Protect from light.

USP 31 (Prednicarbate). A white to almost white crystalline powder. Practically insoluble in water; freely soluble in alcohol and in acetone; sparingly soluble in propylene glycol. Protect from light.

Profile

Prednicarbate is a corticosteroid used topically for its glucocorticoid activity (see p.1490) in the treatment of various skin disorders. It has usually been used as a cream, ointment, or lotion, containing 0.1 to 0.25%.

When applied topically, particularly to large areas, when the skin is broken, or under occlusive dressings, corticosteroids may be absorbed in sufficient amounts to cause systemic effects (see p.1490). The effects of topical corticosteroids on the skin are described on p.1492. For recommendations concerning the correct use of corticosteroids on the skin, and a rough guide to the clinical potencies of topical corticosteroids, see p.1497.

◊ References.

1. Schäfer-Korting M, *et al.* Prednicarbate activity and benefit/risk ratio in relation to other topical glucocorticoids. *Clin Pharmacol Ther* 1993; **54:** 448–56.

Preparations

USP 31: Prednicarbate Cream; Prednicarbate Ointment.

Proprietary Preparations (details are given in Part 3)

Arg.: Primaderm†; ***Austria:*** Prednitop; ***Braz.:*** Dermatop; Invex; ***Canad.:*** Dermatop; ***Chile:*** Dermatop; ***Cz.:*** Dermatop; ***Ger.:*** Dermatop; Prednitop; ***Indon.:*** Dermatop; ***Ital.:*** Dermatop; ***Mex.:*** Alisyd; ***Spain:*** Batmen; Peitel; ***Switz.:*** Prednitop; ***Thai.:*** Dermatop; ***Turk.:*** Dermatop; ***USA:*** Dermatop.

Prednisolone *(BAN, rINN)* ⊗

1,2-Dehydrohydrocortisone; Deltahydrocortisone; Δ¹-Hydrocortisone; Metacortandralone; NSC-9120; Prednisolon; Prednisolona; Prednisoloni; Prednisolonum; Prednizolon; Prednizolonas. 11β,17α,21-Trihydroxypregna-1,4-diene-3,20-dione.

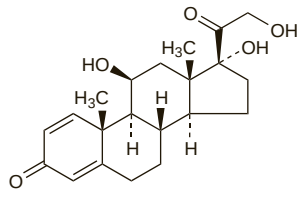
Преднизолон

$C_{21}H_{28}O_5$ = 360.4.

CAS — 50-24-8 (anhydrous prednisolone); 52438-85-4 (prednisolone sesquihydrate).

ATC — A07EA01; C05AA04; D07AA03; H02AB06; R01AD02; S01BA04; S02BA03; S03BA02.

ATC Vet — QA07EA01; QC05AA04; QD07AA03; QD07XA02; QH02AB06; QR01AD02; QS01BA04; QS01CB02; QS02BA03; QS03BA02.



Pharmacopoeias. In *Chin.*, *Eur.* (see p.vii), *Int.*, *Jpn*, and *Viet.* *US* allows the anhydrous form or the sesquihydrate.

Ph. Eur. 6.2 (Prednisolone). A white or almost white, hygroscopic, crystalline powder. It shows polymorphism. Very slightly soluble in water; soluble in alcohol and in methyl alcohol; sparingly soluble in acetone; slightly soluble in dichloromethane. Store in airtight containers. Protect from light.

USP 31 (Prednisolone). It is anhydrous or contains one and one-half molecules of water of hydration. A white to practically white, odourless, crystalline powder. Very slightly soluble in water; soluble 1 in 30 of alcohol, 1 in 50 of acetone, and 1 in 180 of chloroform; soluble in dioxan and in methyl alcohol.