

Prescribing and Clinical Effectiveness Bulletin

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PRESCRIBING GUIDANCE FOR HAY FEVER: SPRING / SUMMER 2011

PACEF Recommendations:

Non-sedating antihistamines: generic cetirizine 10mg or generic loratadine 10mg tablets

Intranasal steroid: Beclometasone aqueous nasal spray 50mcg (or Beconase) (200dose). Budesonide aqueous nasal spray 64mcg (120 dose) is a suitable alternative.

Anti-allergy eye-drops; generic sodium cromoglicate 2% eye-drops 13.5ml

Recommended medicines remain essentially the same as in previous years. Budesonide aqueous nasal spray 64mcg is once daily and has the lowest daily treatment cost of the intranasal steroids. It offers an alternative first line intranasal steroid to beclometasone aqueous nasal spray or Beconase.

- Prescribers are encouraged to utilize either generic cetirizine 10mg tablets or generic loratadine 10mg tablets as their first line non-sedating antihistamines of choice. The falling cost of fexofenadine 120mg makes it a cost-effective third-line choice. Wherever possible, patients who have historically taken desloratadine, levocetirizine, mizolastine or rupatadine should be reviewed and changed to either generic cetirizine or loratadine.
- Prescribers are encouraged to use beclometasone aqueous nasal spray or Beconase 50mcg (200dose) as their first line intranasal steroid of choice. Budesonide aqueous nasal spray 64mcg (120 dose) is a suitable alternative first-line choice. Wherever possible, patients who have historically used more expensive intranasal steroid formulations should be reviewed and changed to budesonide aqueous nasal spray 64mcg (120 dose), beclometasone aqueous nasal spray or Beconase 50mcg (200dose). Where an intermediate cost, third line intranasal steroid is indicated, mometasone (Nasonex) spray is recommended.
- Hay fever sufferers who are not exempt from prescription charges can purchase all the approved products (except budesonide aqueous nasal spray 64mcg) through pharmacies at a lower cost than the current prescription charge.
- Depot steroids should not be prescribed for hay fever. Evidence of safety is lacking, and there is a significant risk of side-effects which cannot be mitigated by withdrawal of the drug. These risks include suppression of the hypothalamic pituitary adrenal axis, osteoporosis, menstrual irregularities, glucose intolerance, increased susceptibility to infection and serious unpredictable events such as avascular necrosis of the head of femur.
- To cover important events (such as impending exams, weddings etc) where standard therapy is insufficient or has yet to reach full effect, a short course of oral steroids may be considered. Oral steroids should be used at the lowest effective dose for the shortest period possible and in combination with a topical nasal corticosteroid. A typical regimen for adults is prednisolone 0.5mg/kg (e.g. 20-40mg) orally in the morning with food for 5 to 10 days.
- Grazax (standard Timothy grass pollen allergen) is designated RED-RED and should not be prescribed.

Non-sedating antihistamines

There are a wide range of hay fever medicines that offer poor value for money to the NHS and are not recommended for use in Lincolnshire. Of particular concern are desloratadine (Neoclarityn) and levocetirizine (Xyzal), a major metabolite and a stereoisomer respectively of the originator brand products, loratadine (Clarityn) and cetirizine (Zirtek). There are no published studies that have shown desloratadine or levocetirizine to be superior to loratadine and cetirizine in relieving allergy symptoms. Fexofenadine may be less sedating than other antihistamines and presents a possible third line alternative in patients who fail to respond or experience sedation with generic cetirizine or loratadine. Fexofenadine 120mg tablets are now available generically and the price has begun to fall, although they are still more than twice the price of generic cetirizine or loratadine.

Other higher cost non-sedating antihistamines such as rupatadine (Rupafin) and mizolastine (Mizollen) are exceptionally poor value for money in comparison to recommended alternatives and should not be prescribed. Rupatadine (Rupafin) was assessed by PACEF in October 2010 and designated RED-RED due to lack of comparative data, lack of long-term safety data and a premium price (see *PACE Bulletin*, Vol 4, No 20 (November 2010)).

Cost Comparison: Non-sedating antihistamines (prices Feb 2011)

	Cost for 30 days
Cetirizine 10mg tablets	94p
Loratadine 10mg tablets	£1.15
Fexofenadine 120mg tablets	£2.62
Fexofenadine 180mg tablets (not licensed for hay-fever)	£3.12
Levocetirizine (Xyzal) 5mg tablets	£4.39
Rupatadine (Rupafin) 10mg tablet (RED-RED in Lincs Traffic Lights)	£5.00
Fexofenadine (Telfast) 30mg tablets	£5.46
Mizolastine (Mizollen) 10mg MR tablets	£5.77
Desloratadine (Neoclarityn) 5mg tablets	£6.77
	Cost per pack
Cetirizine 5mg/5ml soln (200ml)	£2.00
Loratadine 5mg/5ml syrup (100ml)	£2.43
Levocetirizine (Xyzal) 500 mcg/ml solution (200ml)	£6.00
Desloratadine (Neoclarityn) 2.5mg/5ml oral soln (150ml)	£10.15

(Preferred agents are highlighted in bold)

PACEF Recommendation

Prescribers are encouraged to utilize either generic cetirizine 10mg tablets or generic loratadine 10mg tablets as their first line non-sedating antihistamines of choice. Wherever possible, patients who have historically taken desloratadine, levocetirizine, mizolastine or rupatadine should be reviewed and changed to either generic loratadine or cetirizine for the Spring/Summer 2011 hay fever season. Generic fexofenadine 120mg tablets are recommended third line in those insufficiently responsive to or intolerant of either cetirizine or loratadine.

Intranasal steroid sprays

Beclometasone/Beconase aqueous nasal spray 50mcg and budesonide aqueous nasal spray 64mcg are recommended first line. Flunisolide (Syntaris), fluticasone propionate (Flixonase, Nasofan), fluticasone furoate (Avamys), mometasone furoate (Nasonex) and triamcinolone acetonide (Nasacort) all offer poor value for money in comparison. Budesonide nasal spray 64mcg (120 dose) is low cost and is licensed for once daily use. The claimed advantages of reduced systemic activity of mometasone furoate and fluticasone furoate are of little relevance over the short duration of treatment licensed in hay fever (no more than 3 months). Where an intermediate cost, third line intranasal steroid is indicated, mometasone (Nasonex) spray is recommended. Fluticasone furoate nasal spray (Avamys) was assessed by PACEF in May 2009 and designated RED-RED due to a lack of comparative trials, lack of long-term safety data and high cost in comparison to first line alternatives (see *PACE Bulletin*, Vol 3, No 7 (June 2009)).

Cost Comparison: Intranasal steroids (prices: February 2011)

	Unit cost	No of doses	28 day cost at standard adult dose	Standard adult dose
Budesonide nasal spray 64 mcg/spray	£2.49	120	£2.32	2 sprays in each nostril each morning
Beconase (beclometasone) aqueous nasal spray 50mcg/spray	£2.19	200	£2.45	2 sprays in each nostril twice daily
Nasobec (beclometasone) aqueous nasal spray 50mcg/spray 200dose	£2.43	200	£2.72	2 sprays in each nostril twice daily
Beclometasone aqueous nasal spray 50mcg/spray	£2.57	200	£2.88	2 sprays in each nostril twice daily
Rhinocort Aqua 64 (budesonide) aqueous nasal spray, 64mcg/spray	£3.49	120	£3.26	2 sprays in each nostril each morning
Nasobec Hay Fever (beclometasone) aqueous nasal spray 50mcg/spray 180dose	£3.45	180	£4.29	2 sprays in each nostril twice daily
Fluticasone furoate (Avamys) 27.5mcg / spray	£6.44	120	£6.01	2 sprays in each nostril each morning
Mometasone (Nasonex) 50mcg/spray	£7.68	140	£6.14 - £12.29	2-4 sprays in each nostril each morning
Nasofan (fluticasone propionate) Aqueous 50mcg /spray	£8.41	150	£6.28	2 sprays in each nostril each morning
Beclometasone aqueous nasal spray 50mcg/spray 180 dose (Beconase Hay Fever)	£5.54	180	£6.89	2 sprays in each nostril twice daily
Triamcinolone (Nasacort) 55 mcg/spray	£7.39	120	£6.90	2 sprays in each nostril each morning
Flunisolide (Syntaris) aqueous nasal spray 25mcg / spray	£5.05	240	£7.07	2 sprays in each nostril two to three times daily
Fluticasone propionate (Flixonase) 50mcg / spray	£11.01	150	£8.22	2 sprays in each nostril once or twice daily
Nasofan (fluticasone propionate) Allergy 50mcg /spray	£4.68	60	£8.74	2 sprays in each nostril each morning

(Preferred agents are highlighted in bold)

PACEF Recommendation:

Prescribers are encouraged to use beclometasone aqueous nasal spray 50mcg (Beconase) (200 dose) or budesonide aqueous nasal spray 64mcg (120 dose) as their first line intranasal steroid. Practices/prescribers uncomfortable with prescribing Beconase by brand should prescribe budesonide aqueous nasal spray 64mcg (120 dose) or beclometasone aqueous nasal spray 50mcg (200 dose) first line. Care needs to be taken to select / prescribe the correct preparation; descriptors such as 'Hay Fever' or 'Allergy' in the product name denote OTC preparations at a premium price compared to prescription-only products. Nasal sprays containing fewer doses than the standard prescription-only pack are also likely to be premium priced. Wherever possible, patients who have historically used more expensive intranasal steroid formulations (see cost comparison table above) should be reviewed and changed to beclometasone aqueous nasal spray 50mcg (Beconase) (200 dose) or budesonide aqueous nasal spray 64mcg (120 dose) for the Spring/Summer 2011 hay fever season.

Anti-allergy Eye Drops

Prescribers should limit prescribing to sodium cromoglicate eye drops 13.5ml or Otrivine-Antistin eye drops. Prescribers wishing to maximize cost savings should prescribe Hay-Crom eye drops 13.5ml by brand. Prescribers should also note that prescribing sodium cromoglicate in smaller unit quantities than 13.5ml (i.e. 5ml or 10ml) increases the unit cost. Sodium cromoglicate eye drops offer cost-effective, safe relief of ocular symptoms for the majority of hay fever sufferers requiring eye drops. Otrivine-Antistin (antazoline/xylometazoline) eye drops present a suitable low cost alternative for those who require occasional ocular symptom relief. Nedocromil sodium (Rapitol) eye drops have the potential to reduce dosing to twice-daily and may rarely be appropriate for hay fever sufferers wishing to use eye-drops for persistent daily ocular symptoms. Eye drops are generally unpopular, particularly if prescribed for regular daily use; most individuals would prefer alternative treatments.

Anti-allergy eye drops

Trade name	Generic name	size	Unit cost
Hay-Crom	Sodium cromoglicate 2%	13.5ml	£1.61
-	Sodium cromoglicate 2%	13.5ml	£1.86
Otrivine-Antistin	Xylometazoline HCl 0.05%/ antazoline sulphate 0.5%	10ml	£2.36
Opticrom Allergy	Sodium cromoglicate 2%	5ml	£2.74
Opticorm Allergy / Hayfever	Sodium cromoglicate 2%	10ml	£3.35
Opatanol	Olopatadine 0.1%	5ml	£3.91
Rapitol	Nedocromil 2%	5ml	£4.92
Alomide	Lodoxamide 0.1%	10ml	£5.21
Optilast	Azelastine 0.05%	8ml	£6.40
Emadine	Emedastine 0.5mg/ml	5ml	£7.31
Zaditen	Ketotifen 0.25mg/ml	5ml	£7.80
Opticrom	Sodium cromoglicate 2%	13.5ml	£8.03
Relestat	Epinastine 0.5mg/ml	5ml	£9.90
Vividrin	Sodium cromoglicate 2%	13.5ml	£10.95

(Preferred agents are highlighted in bold)

Hay fever medicines available without prescription

Most of the hay fever medicines recommended in this *Bulletin* are available without prescription:

- Cetirizine and loratadine are available in packs of 7 for self-selection in pharmacies or other retailers. The generic versions are typically £1.00 to £1.50, but may be subject to offers such as three packs for the price of two. Brands are more expensive.
- Cetirizine and loratadine are also available in packs of 30, but only through pharmacies at the medicines counter. Generic versions may be between £2 and £4; offers may also be available.
- Beclometasone Aqueous Nasal Spray (200 dose) is available through pharmacies at the medicines counter for £3 to £4. The branded Beconase versions are not good value at £6.06 for the 100 dose version and £9.09 for the 180 dose version.
- Sodium Cromoglicate 2% Eye Drops are available at the medicines counter at pharmacies and are typically available in 5ml, 10ml and 13.5ml sizes in prices from £3 to £5. Generic or 'own-label' versions are likely to be the least expensive.

PACEF Recommendation:

Hay fever sufferers who are not exempt from prescription charges may find that they can purchase their prescribed items more cheaply from a community pharmacy.

Grazax

Grazax (a once daily fast melting sublingual tablet containing standardized allergen extract of Timothy grass pollen) has been designated RED-RED by PACEF (see *PACE Bulletin*, Vol 3, No 7 (June 2009)). Standard advice is as follows:

PACEF Recommendation:

PACEF remain unconvinced of the clinical and cost-effectiveness of Grazax in comparison to lower cost alternatives such as subcutaneous therapy. As a result of this, Grazax is designated RED-RED. It is recognized that there may be a limited role for the agent in adults (aged 18 to 65) who have not responded to optimal doses of conventional treatment for seasonal rhinitis and conjunctivitis and who are deemed unsuitable for subcutaneous therapy. Such patients must have a positive skin prick test or IgE test for grass pollen, specifically Timothy grass. In these circumstances, a specialist wishing to initiate therapy will need to first gain approval from the Lincolnshire Individual Funding Request (IFR) Panel. If the IFR Panel approve Grazax for use in a specific patient, this will be subject to specialist initiation and appropriate shared care arrangements.

Cost Comparison and Advice Summary

Recommended antihistamines	Dose	Price (Feb 11)	Do NOT prescribe as:
Cetirizine tablets 10mg, 30 tablets	1 tablet daily	94p (30)	Zirtek Allergy or any brand
Cetirizine oral solution 5mg/5ml, 200ml	5ml daily for children 2-6 years (Children over six: 10ml daily)	£2.00 (200ml)	
Loratadine 10mg tablets, 30 tablets	1 tablet daily	£1.15 (30)	

Recommended intra-nasal steroids	Dose	Price (Feb 11)	Do NOT prescribe as:
Budesonide 64mcg metered pump nasal spray 120 dose	Adults & children over 6: Two sprays in each nostril once daily (2x2x1). Reduce to the minimum dose which controls symptoms	£2.49 (120 dose unit)	Rhinocort Aqua nasal spray 64mcg
Beconase Aqueous Nasal Spray 50mcg 200dose	Adults & children over 6: Two sprays in each nostril twice daily (2x2x2). Reduce to the minimum dose which controls symptoms (which may be once daily)	£2.19 (200 dose unit)	Beconase Hayfever Beconase Hayfever Relief Beconase 100 dose Beconase 180 dose Any other brand of beclometasone nasal spray
Beclometasone Aqueous Nasal Spray 200 dose	Adults & children over 6: Two sprays in each nostril twice daily (2x2x2). Reduce to the minimum dose which controls symptoms (which may be once daily)	£2.88 (200 dose unit)	Beclometasone Aqueous Nasal Spray 100 dose Beclometasone Aqueous Nasal Spray 180 dose

Recommended anti-allergy eye-drops	Dose	Price (Feb 11)	Do NOT prescribe as:
Hay-Crom 2% Eye Drops 13.5ml	Adult & child: 1 or 2 drops in each eye four times daily	£1.61	Sodium Cromoglicate 2% Eye Drops 5ml or 10ml Opticrom, Vividrin or any brand except Hay-Crom
Sodium Cromoglicate 2% Eye Drops 13.5ml		£1.86 (13.5ml)	

Second-line agents	Dose	Price (Feb 11)	Do NOT prescribe as:
Otrivine-Antistin (antazoline sulphate 0.5%, xylometazoline hcl 0.05%) 10ml	Adults and children over 12 apply 2-3 times daily (max 7 days)	£2.36(10ml)	

References

'Common questions about hay fever', *MeReC Bulletin* 2004; 14(5): 17 – 20
 'Oral antihistamines for allergic disorders', *DTB* 2002; 40(8): 59 – 62
 'Grass pollen allergy extract', *UKMI New Medicines Profile*, issue number 07/01, February 2007
PACE Bulletin, Volume 2, No 1, January 2008
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PACE Bulletin, Volume 3, No 7, June 2009.
PACE Bulletin, Volume 4, No 20, November 2010.
 UKMI Q&A Is there a place in therapy for Kenalog (triamcinolone acetonide) intramuscular injection for seasonal allergic rhinitis (hay fever)? (June 2008)
 Prices from *Drug Tariff*, February 2011 and www.cddata.co.uk February 2011.

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