

Wessex Adult Asthma Guidelines 2021

Where possible use DPI instead of pMDI due to environmental concerns

Reliever

Bricanyl Turbohaler (DPI) 500
1 puff prn. £8.30. 490gCO₂Eq



Salbutamol Easyhaler (DPI) 100
2 puffs prn. £3.31. 620gCO₂Eq



Ventolin Accuhaler (DPI) 200
1 puff prn. £3.60. 600gCO₂Eq



Salamol Easi-Breathe (pMDI) 100
2 puffs prn. £6.30. 12080gCO₂Eq



Salamol (pMDI) 100
2 puffs prn. £1.46. 11960gCO₂Eq



Low Dose ICS

Budesonide Easyhaler 100
2 puffs bd/od. £5.32. 390/195gCO₂Eq



Pulmicort Turbohaler 100
2 puffs bd. £8.55. 840gCO₂Eq



Beclometasone Easyhaler 200
1 puff bd. £4.48. 183gCO₂Eq



Flixotide Accuhaler 100
1 puff bd. £8.00. 840gCO₂Eq



Low dose ICS/LABA

Medium dose ICS/LABA

Use as MART where appropriate

Dry Powder Inhaler (DPI) – Inhale Quick and Deeply in 2-3 Seconds

Fobumix Easyhaler 160/4.5
1 puff bd. £10.75. 240gCO₂Eq



Symbicort Turbohaler 200/6
1 puff bd. £14.00. 336gCO₂Eq



DuoResp Spiromax 160/4.5
1 puff bd. £13.99. 408gCO₂Eq



Fostair Nexthaler 100/6
1 puff bd. £14.66. 458gCO₂Eq



Relvar Ellipta 92/22
1 puff od. £22.00. 754gCO₂Eq



Atecura Breezhaler 62.5/125
1 puff od. £17.49. 390gCO₂Eq



Fobumix Easyhaler 160/4.5
2 puffs bd. £21.50. 480gCO₂Eq



Symbicort Turbohaler 200/6
2 puffs bd. £28.00. 672gCO₂Eq



DuoResp Spiromax 160/4.5
2 puffs bd. £27.97. 816gCO₂Eq



Fostair Nexthaler 100/6
2 puffs bd. £29.32. 916gCO₂Eq



Relvar Ellipta 92/22
1 puff od. £22.00. 754gCO₂Eq



Atecura Breezhaler 127.5/125
1 puff od. £21.50. 390gCO₂Eq



High Dose ICS/LABA

Ensure a steroid alert card is issued

Fobumix Easyhaler 320/9
2 puffs bd. £43.00. 480gCO₂Eq



Symbicort Turbohaler 400/12
2 puffs bd. £56.00. 2100gCO₂Eq



DuoResp Spiromax 320/9
2 puffs bd. £55.94. 816gCO₂Eq



Fostair Nexthaler 200/6
2 puffs bd. £29.32. 917gCO₂Eq



Relvar Ellipta 184/22
1 puff od. £22.00. 754gCO₂Eq



Atecura Breezhaler 260/125
1 puff od. £27.97. 390gCO₂Eq



Pressurised Meter Dose Inhaler (pMDI) – Inhale Slow and Steady in 4-5 Seconds

* **Soprobec 100/Clenil 100**
2 puffs bd. £3.34. 7675gCO₂Eq



♦ **Kelhale 50/Qvar 50**
2 puffs bd. £3.12. 10440gCO₂Eq



♦ **Fostair 100/6**
1 puffs bd. £14.66. 5665gCO₂Eq



♦ **Flutiform 50/5**
2 puffs bd. £14.40. 35400gCO₂Eq



♦ **Fostair 100/6**
2 puffs bd. £29.32. 11330gCO₂Eq



♦ **Flutiform 125/5**
2 puffs bd. £28.00. 35400gCO₂Eq



♦ **Fostair 200/6**
2 puffs bd. £29.32. 14227gCO₂Eq



♦ **Flutiform 250/10**
2 puffs bd. £45.56. 35400gCO₂Eq



Low dose ICS/LABA combination inhalers as reliever therapy can be considered in appropriate patients³.

♦ **Maintenance and Reliever Therapy (MART)**
Consider for patients on low or medium dose ICS/LABA who have a good understanding of their personalised asthma action plan and are compliant with their treatment. This regime is only compatible with 'O' inhalers⁴.

Consider Alvesco 80 2 puffs od if patient unable to tolerate ICS. It is a pro-drug that is activated in the lungs reducing oro-pharyngeal side effects.

Where available carbon footprint data is expressed as grams of CO₂ equivalent (gCO₂Eq) for 30 days of treatment at the stated dose other than for reliever inhalers which reflects the carbon footprint per inhaler.

Key

- ♦ Extra Fine Particle
- MART Regime
- Use a Spacer with pMDI. Wash monthly, replace annually
- * Generic Alternatives

Additional controllers should be trialled for 3-months and continued only if effective

LTRA-Montelukast 10mg
1 tab od. Pk 28 £1.61

LAMA Soft Mist Inhaler – Spiriva Respimat 2.5mcg
2 puffs od. £23.00. 780gCO₂Eq (Should not be used in conjunction with Trimbow or Enerzair.)

Diagnosis

- Typical asthma symptoms include wheeze, shortness of breath, chest tightness and cough which vary over time and in intensity, often being worse at night and early in the morning
- Asthma triggers may include infections, exercise, exposure to allergens or irritants, changes in weather and some medications including Aspirin/NSAIDs/ β -Blockers
- Wheeze should be confirmed by a healthcare professional
- Remember to record and code:
 - Triggers
 - Atopic history and family history
 - Occupational exposure and smoking history
 - Quality assured spirometry using lower limits of normal to ascertain obstruction
 - FeNO level where this is available
- Check for variable and/or reversible air flow obstruction:
 - Average diurnal Peak Expiratory Flow (PEF) variation of >20%. (calculator available @ <http://wessex-asthma.com/>)
 - FEV₁ \geq 12% and 200 ml increase after Short Acting β -Agonist (e.g. Salbutamol 400 mcg by pMDI with spacer), or after a 14 day Prednisolone trial (30mg/day)
- Normal spirometry does not rule out asthma
- Check for evidence of T2 inflammation (steroid sensitive):
 - FeNO level \geq 40ppb is supportive of a diagnosis of asthma
 - Review full blood count for evidence of raised eosinophils ($\geq 0.3 \times 10^9/L$)
- Assess asthma control using ACQ, ACT or RCP 3 questions
- Start all patients on ICS appropriate to level of severity and step up incrementally if symptoms are not controlled after 6 weeks
- Where diagnosis is not clear exclude alternative cause of symptoms (e.g. rhinitis, Asthma COPD overlap, GORD)

Think Carbon

- 1 mile driven by an average car is equivalent to 290gCO₂Eq¹
- DPIs have a lower carbon footprint than pMDIs
- Minimise the number of inhalers required e.g. 1-puff twice a day regime of a higher dose ICS may be more cost-effective and environmentally friendly
- SABA overuse is a major contributor to the NHS carbon footprint
- Encourage patients to return their used inhalers to their Pharmacy for recycling or appropriate disposal. Inhalers put in household waste will end up in landfill

Asthma Reviews

- Provide a written **personalised asthma action plan** to empower self-management (using PEFr monitoring and symptoms):
 - PEFr < 80% best – consider increasing ICS
 - PEFr < 60% best – start oral steroids and seek advice
 - PEFr < 40% best – seek urgent medical attention
- Assess symptom control (RCP 3 questions, ACT, ACQ) and frequency of reliever medication usage (including additional doses in a MART regime)
- Features of poor control include:
 - Daytime symptoms \geq 3 times per week
 - Night-time awakening \geq 1 per week
 - The use of rescue medication \geq 3 times per week or using \geq 3 SABA inhalers/year
 - Asthma attacks \geq 1 per year
- Document frequency and severity of asthma attacks and time off work
- Assess lung function (PEFR or FEV₁) and FeNO (where possible) to guide treatment. Lung function should be recorded at diagnosis, 3-6 months after starting treatment and then at least every 1-2 years after that
- Advise on trigger avoidance and the difference between good and poor asthma control
- Check patients' understanding of their treatment
- Check and demonstrate inhaler technique and adherence at every opportunity. If appropriate ensure using spacer with pMDI and cleaning/storing correctly
- Minimise numbers/type of inhaler devices where clinically available
- Use devices with dose counters where appropriate
- Encourage to stop smoking where relevant and offer help at every opportunity
- Assess and treat associated comorbidities (e.g. GORD, rhinitis)
- Offer dietary advice for overweight patients
- Offer annual flu vaccine
- If patient is well controlled for 3-6 months, consider stepping down treatment
- Listen and answer any questions or concerns from patients and carers
- All patients on high-dose ICS should be issued with a steroid alert card

Remember to check adherence to treatment, inhaler technique and provide a written asthma action plan prior to any treatment change.

Refer to Secondary Care**

- Persistent poor asthma control despite medium dose ICS/LABA
- \geq 6 SABA inhalers in last 12 months despite primary care review
- \geq 2 asthma attacks requiring oral steroids in last 12 months
- Hospital admission or life threatening asthma attack
- Suspected occupational asthma
- Poorly controlled asthma in pregnancy
- The diagnosis is unclear or unexpected clinical findings e.g. finger clubbing, stridor, crackles in the chest, monophonic wheeze
- Persistent productive cough (especially if recurrent bacterial infections are confirmed on sputum cultures)
- Unexplained restrictive spirometry or abnormalities on chest CXR
- Complex comorbidity preventing accurate assessment of asthma control
- Poor response to treatment or unable to tolerate treatment
- Non-acceptance of diagnosis or persistent non-adherence
- When referring to secondary care on medium dose ICS/LABA:

Is there evidence of T2 high disease?

- Blood eosinophils $\geq 0.3 \times 10^9/L$
- FeNO ≥ 25 ppb
- Nasal polyps
- Allergic, associated atopic conditions (e.g. allergic rhinitis, eczema) or childhood onset of asthma

Yes No

Trial high dose ICS/LABA combination

Trial LAMA alongside medium dose ICS/LABA

- If there is diagnostic doubt do not increase treatment where possible as may affect subsequent diagnostic tests
- When making a referral please include details of the prescription pick-up for ICS or ICS/LABA, OCS courses and SABA use in the last 12 months for adherence assessment

Useful Links

1. NICE patient decision aid: www.nice.org.uk/guidance/ng80/resources/inhalers-for-asthma-patient-decision-aid-pdf-6727144573
2. BTS/SIGN asthma guidelines: www.brit-thoracic.org.uk/standards-of-care/guidelines/bts-sign-british-guideline-on-the-management-of-asthma/
3. Gina (Global Initiative for asthma): ginasthma.org/pocket-guide-for-asthma-management-and-prevention/
4. Right Breathe: www.rightbreathe.com
5. Smoke free Hampshire: www.smokefreehampshire.co.uk
6. Asthma UK: www.asthma.org.uk