

# Inhaler Technique Improvement Programme



## Overview

Inefficient inhaler technique is a common problem resulting in poor drug delivery, decreased disease control and increased inhaler use. A small scale prospective study found that 92% of users have a poor inhaler technique; moreover, 94% of healthcare staff teach a poor technique. These statistics have wide ranging implications including poor patient experience, increased prescribing costs and increased emergency admissions.

The main cause of poor inhaler technique is too high an inspiration rate leading to most of the inhaled medication being swallowed instead of inhaled. The medicine is largely wasted, thus reducing the efficacy of the medication. Low efficacy leads to poorer disease control and higher rates of exacerbation.

# 94%

of healthcare staff teach a poor technique

## Project Aims and Methods

The project had five main objectives:

- Roll out of access to inhaler training for inhaler users in all Primary Care Trusts across South Central region;
- Training of healthcare professionals;
- Development of quality standards and an exemplar service specification;
- Ensure measurement of success / deliverables; and
- Build in sustainability strategies beyond the project phase.

Within each PCT area, lead managers were responsible for training pharmacists in the effective use of inhaler devices. Community Pharmacists then incorporated this training into Medicine Use Reviews. These MURs enabled data to be collected regarding the control of asthma and COPD symptoms. The data was collected and recorded by Community Pharmacists on the "Enhanced Services Monitoring and Quality" (ESMAQ) system, thus enabling comparisons to be made between initial and subsequent MURs. The project was supported by a number of innovative features such as low-technology training devices and an innovative approach to pharmacists' education.

The number of engaged pharmacies was a key success. This varied between PCTs. As of August 2012, there were 206 active pharmacies collaborating in the project, which had delivered 5,162 first intervention MURs and 886 second intervention MURs.

## Findings

The evaluation report provides analyses of the following data:

- 4,600 Asthma Control Test pre- and post-MURs; and
- 448 COPD Assessment Test pre- and post-MURs.

40% of asthma patients showed better asthma control over the time period; 55% of COPD patients showed an improvement in symptom management.

Data on emergency admissions suggests a positive association between the introduction of the inhaler technique improvement project and changes in hospital emergency admissions.

The use of 'second intervention' MURs was a key success factor. These enabled participants, both patients and professionals, to see the impact of the intervention very quickly. In this way, motivation was maintained and the credibility of the project was enhanced.

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## Recommendation

The findings from the project have been drawn together to inform an outline strategic model for organisations wishing to implement the Inhaler Technique Improvement approach. This model has been devised by a systematic critical appraisal of key features and characteristics emerging from the NHS South Central experience; the strategy is referenced to the NHS Change Model. Such a strategy and information, in the right hands, will help to secure the cultural transition in the practice of Community Pharmacy and its on-going contribution to an integrated care pathway for all patients.

## Working with Thames Valley HIEC

The project was delivered in the following PCT areas: Berkshire East, Berkshire West, Buckinghamshire, Hampshire, The Isle of Wight, Milton Keynes, Oxfordshire, Portsmouth City and Southampton City. The project was jointly supported by Thames Valley HIEC and Wessex HIEC, and funded by NHS South of England.

We can help you by:

- **Co-designing with you a way to use Medicines Use Reviews to support local health priorities.**
- **Project support and governance for your local service improvement work.**
- **Sharing with you the full evaluation report on the Inhaler Technique Improvement Project.**

**Thames Valley Health Innovation and Education Cluster (HIEC)**

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