European Federation of Allergy and Airways Diseases Patients Associations

Polska Federacja Stowarzyszeń Chorych na Astmę, Alergię i POChP

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&

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Education in Allergy, Asthma and Chronic Obstructive Pulmonary Disease

ABSTRACT BOOK

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. Introduction

There is growing evidence that patient education is not only beneficial, but crucial for effective management of chronic disease. Education is a process, not a one-time event. In particular, it is a partnership process, both in terms of planning for comprehensive but tailored and multidisciplinary education programmes and at the level of patients themselves and their treating healthcare professionals.

For good quality guided self-management in food allergy, in eczema, allergic rhinitis, in asthma, in COPD in all of these the foundation is first correct information on prevention and care, translated through continuous medical education into patient education that involves the patients and takes into account his or her individual situation and needs.

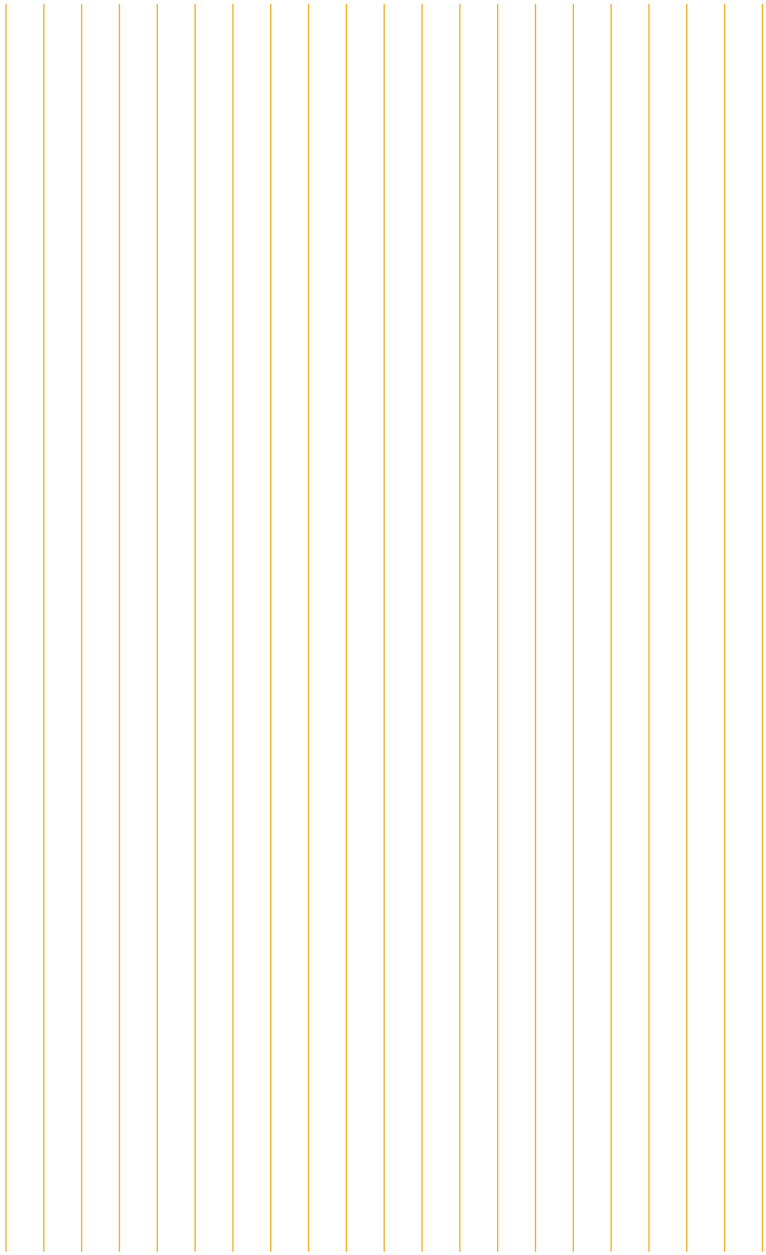
The abstracts at hand examine the evidence of all of these issues and patient education in theory and in practice. From does education help and who is actually educating whom, smoking cessation in young people and in primary care and its effectiveness, guidelines in indoor air quality, managing dyspnoea and pulmonary rehabilitation in COPD, future of the treatment, inflammation, benefits of education and self treatment and educating children and families in asthma and self-management and prevention of food allergy, genetically modified foods and controversies in managing and preventing food allergy to practical examples on patient education programmes and more.

We hope that these abstracts give an interesting and up-to-date review on the hot issues in education on allergy, asthma and COPD. Every patient no matter where they live has a right for patient education. This right should not be seen as an additional burden to healthcare, but as a cost effective resource to reduce unnecessary healthcare spending due to poor disease management such as emergency care.

EFA thanks all those who participated in the meeting, whether as a chairperson, speaker or in the audience.

Mariannella Salapatas
EFA Acting President

Anna Doboszyńska
Chair Scientific Committee of the Conference



. Lecture

Chronic obstructive pulmonary diseases: An optimistic point of view

Nikos Siafakas

Medical School University of Crete, Department of Thoracic Medicine, University General Hospital, Heraklio Crete, Greece.

Email: pneumon@med.uoc.gr

In this presentation, an optimistic point of view will be developed towards the management of chronic obstructive respiratory diseases, primarily asthma and COPD. The progress made during the last 40 years regarding the epidemiological indexes (mortality), our knowledge on the pathogenesis and risk factors and all aspects of the managements of both diseases will be reviewed. Significant historical developments such as aerosol inhalation therapy, combination therapy, patients' education, antileucotrienes, and anti-IgE drugs for asthma will be discussed in detail. In addition, similar important steps in the management of COPD such as long-term oxygen therapy, non-invasive ventilation, antismoking treatment, long-acting anticholinergics and surgery for emphysema will be presented.

Based on these historical perspectives, current research and future prospectives, the thesis of the optimistic view on the management of chronic obstructive respiratory disease will be explored. Pulmonologist should be the first to convey the message to the medical community, their patients and their families that both diseases are treatable and there are a great number of therapeutic modalities that could significantly improve the quality of life of our patients.

Does education help and who is educating whom?

Marianella Salapatas

EFA Acting President, ANIKSI, 75 El. Venizelou Str, Athens, Greece.

Email: sophia@hol.gr

For some years now, there has been increasing interest in patient education. The amount of information that is available either on websites or through brochures can create a platform of knowledge so that the patient is able to prevent situations that could provoke symptoms, or even effectively handle exacerbation a symptoms.

The access to information, however, does not ensure use of the information. Furthermore, patients often do not comply with the doctor's instructions either because of lack of understanding or due to their own beliefs that are in contradiction with the instructions given.

So the questions that arise are: Should doctors also be educated in order to educate patients effectively? So who in the end is educating whom? It is self understood that a patient doctor relationship must be bidirectional. Therefore, patients must keep in mind that a doctor can not guess the impact of a disease on a patient's life and, on the other hand, doctors must realize that each patient is an individual. A therapy is effective if, besides treating the underlying disease, it also meets the needs of individual patients, and any instructions given should not only be for treating immediate symptoms but also preventing and dealing with future health problems.

Guidelines emphasize that therapists, nurses, pharmacists, and physicians should teach and reinforce self-management education at every opportunity and in all settings.

Antismoking text and pictorial warnings and their effects

Florin Mihaltan, Ruxandra Ulmeanu, Ioana Munteanu

National Institute of Pneumology "M.Nasta", Bucharest, Romania.

Email: mihaltan@startsnet.ro

In 1981, the Federal Trade Commission (FTC) concluded that the health warning did not provide sufficient information to consumers about the health hazards of smoking and that the message was overexposed, outdated, abstract, and not personally relevant to consumers. Several other countries, including Canada, Australia, Thailand, South Africa, Singapore, and Poland, have mandated stronger health warnings on cigarette packages by requiring the addition of graphic images and detailed statistical information concerrning the health risks of tobacco use and information about how to quit smoking. Graphic warnings appeared first on cigarette packages in five countries: Canada, Brazil, Singapore, Thailand, and Australia. In 1989, Canada had text-only warning labels that covered 20% of cigarette packages. In 2000, Canada passed new regulations enlarging cigarette warning labels to 50% of the front and back of the cigarette package. These labels included text, graphic color photos, and information on toxic substances. Our presentation is an update of the impact of antismoking text and pictorial warnings. We are analysing their effects and their limits. At the same time, we are analysing modalities to improve their messages. Our conclusions are very important for the future of this type of activity:

- Pictorials and warning texts (inside and outside the pack) are good weapons against smoking. They need to be integrated with other policies for controlling smoking.
- More surveys to evaluate their effects are required.
- It depends on the experience of each country, but we can learn from first-line countries (Australia and Canada). Warning labels need to be part of a larger public health education effort and incorporated into antismoking campaigns, so they can reinforce antismoking messages and provide information about the health risks of tobacco use.

Smoking cessation among adolescents

Mervi Hara

Finland's ASH (Action on Smoking and Health), Helsinki, Finland.

Email: mervi.hara@suomenash.fi

Tobacco companies have long targeted adolescents as "replacements" to take the place of those who quit smoking or die. They are fully aware that if people do not start smoking before they reach adulthood, they are unlikely ever to start. Adolescent experimentation with a highly addictive product can easily lead to a lifetime of nicotine and social dependence. The younger the children first try smoking, the more likely they are to become regular smokers and the more difficult it is for them to quit.

The factors that increase the risk of trying and continuing with smoking include tobacco advertising and sales promotion, easy access to tobacco products, low prices, peer pressure, smoking among the peers, parents and siblings, a positive or equivocal attitude to smoking, and a social climate that is indifferent to smoking. Children and adolescents are exposed to positive impressions of tobacco use not only through tobacco advertising but through the cultural environment. The positive portrayal of tobacco use encourages children to experiment with smoking and to continue to use tobacco products.

Most smokers would like to quit their habit. According to a Finnish study, half the adolescents aged 14-16 years who smoke on a daily basis, said that they are addicted to

nicotine. The number of 18-year-olds was even higher. Nicotine dependence can develop very quickly after starting smoking. Furthermore, very "light" smoking includes features that indicate nicotine dependence.

To prevent the onset of smoking and support smoking cessation among adolescents there should be comprehensive, multi-level strategies and strong public policies. These policies should include fiscal, legislative, regulatory and educational measures.

Smoking cessation in primary care: International Primary Care Respiratory Group (IPCRG) Guidance

Anders Østrem

Past President IPCRG, Oslo, Norway.

Email: andersostrem@c2i.net

Smoking cessation is the single most important intervention we can do in primary care. The effect of smoking on health is well known as is the benefit of smoking cessation for the patients. We see a welcomed decline in smoking rates in Western Europe, but still over 20% of people smoke in most countries. As primary care physicians, we have an excellent opportunity to come in contact with and intervene with smokers. In fact, data from some countries show that 80% of smokers contact their GP on average three times a year.

There are however several barriers to smoking cessation, lack of time is the factor quoted most often. It is important to emphasise that even a minimal intervention can be effective. Also we see the patients over time which allows us ample opportunities to intervene.

In the talk the new IPCRG guidance on smoking cessation will be presented with a focus on how we can increase efforts to achieve cessation in our primary care patients.

. COPD

Dealing with the problem of dyspnoea in the patient's everyday life

Rick Hodder

Divisions of Pulmonary and Critical Care, University of Ottawa,
The Ottawa Hospital - Civic Campus, Ottawa, Canada.

Email: rhodder@ottawahospital.on.ca

COPD is a significant and increasing global health problem that by the year 2020 is predicted to be the fifth leading cause of disability and the third leading cause of death worldwide. COPD is however, under diagnosed, especially in its early stages, with the result that early therapy and preventative measures are often delayed. The result is often several years of insidious development of progressive impairment due to advancing disease that slowly leads to progressive disability, particularly dyspnoea, and eventually to significant handicap and poor quality of life. Currently, smoking prevention and cessation are the only two known therapies that can alter the natural history of COPD by preserving lung function over time. However, with modern management and a patient-centred approach, there is a lot that can be done to prevent and reduce the exertional dyspnoea that contributes to the disability of COPD even today. Pharmacotherapy, particularly with regular use of long-acting bronchodilators can produce significant benefits including improved symptomatic control and fewer COPD exacerbations. This will provide a basis for the even greater benefits that can occur with enthusiastic application of several non-pharmacologic therapies. These non-drug therapies include assistance with realistic efforts to improve exercise capacity, thus increasing activities of daily living and providing the opportunity for more independence, assistance with the psychosocial impacts of COPD and the promotion of collaborative self-management for this disease.

In the past, there has been a fairly nihilistic opinion that COPD, being a self-inflicted, largely incurable disease, could only be managed in a palliative fashion. However, on the basis of current evidence, this nihilistic attitude can no longer be justified. Once we recognize that COPD is not just a lung disease, but rather a disease of the whole person that affects the family and society as well, we will have a much more useful and hopeful perspective on this disabling disease. By adopting a more patient-centred and less disease-centred attitude and approach to COPD, we will quickly and enthusiastically realize that finally, the new paradigm for COPD is that this is a disease that can be successfully treated and that the resultant reduced disability and handicap will enable patients with COPD to live more comfortable and more human lives.

. COPD

Pulmonary rehabilitation

Nicolino Ambrosino

Respiratory Intensive Care and Pulmonary Diseases Unit,
Cardio-Thoracic Department University Hospital, Pisa and Pulmonary Rehabilitation and Weaning Unit, Auxilium Vitae, Volterra. Italy.

Email: n.ambrosino@ao-pisa.toscana.it

Patients with COPD have reduced levels of spontaneous physical activity compared with healthy controls. Furthermore, patients receiving long-term oxygen therapy (LTOT) have an even lower level of domestic activity compared with that of those not on LTOT but with COPD of similar severity. Regular physical activity may reduce lung function decline and risk of developing COPD in active smokers and the risk of hospital admission in patients with established COPD. Training the peripheral muscles counteracts the increased exercise-induced oxidative stress and improves exercise capacity and dyspnoea. Several strategies have been suggested to maintain these benefits in the long-term. Also COPD patients in the intensive care unit benefit from pulmonary rehabilitation which is an evidence-based, multidisciplinary intervention consisting of exercise training, education and psychological support, and aimed at reducing disability and improving quality of life. Pulmonary rehabilitation addresses exercise deconditioning, social isolation, altered mood states, such as anxiety and depression, muscle wasting, and weight loss.

Within the framework of pulmonary rehabilitation, neuromuscular transcutaneous electrical stimulation (NMES) of the lower limb muscles increased muscular oxidative capacities. Small controlled studies with this technique in severe and even bed-bound

COPD patients have been reported. NEMS has been used among patients with severe exercise limitation due to congestive heart failure, with skeletal muscle dysfunction similar to those of COPD. Studies have evaluated NEMS in severe COPD patients with significant baseline exercise impairment. In stable outpatients with severe COPD, poor baseline exercise tolerance and low ventilatory reserve, NEMS led to a significant improvement in maximum quadriceps and hamstring strength, an increase in incremental shuttle walk distance and reductions in dyspnoea.

The major advantage of NMES is considered to be the lack of ventilatory stress during passive muscular activity, due to the reduced muscle mass involved. Nevertheless, the studies on NMES must be considered as preliminary, and this innovation should be still considered an experimental tool in pulmonary rehabilitation.

. COPD

Progress in COPD management

Anna Doboszyńska

Medical University of Warsaw, Poland.

Email: anna.doboszynska@wp.pl

In recent years, the approach to lung diseases has changed considerably. In the nomenclature, pulmonary emphysema and chronic bronchitis have been combined to create a "new" disease: COPD. Of course, the old names should be used, according to the International Classification of Diseases (ICD-10).

Much has changed in the approach to COPD. Increasingly more often, the effect of underlying disorders on the clinical course of COPD and the effect of COPD on the whole organism, and not only the decrease in respiratory tract functioning, are assessed. In addition, the updated GOLD results are being criticized due to, for example, over-diagnosis of COPD in the elderly. Continuous progress in pharmacotherapy has resulted in new medications and new treatment regimens. Prolongation of the action of drugs (e.g. thiotropium, new beta2-mimetics) or combinations of two medicines in one inhalator improves the patient's compliance. Moreover, these changes are associated with a wider recognition of non-pharmacological therapies, namely, patients' education and associated pulmonary rehabilitation, dietetic interventions, etc. An increase in the patient's knowledge about the disease, therapy, and regular and appropriate use of prescribed medicines, i.e. their engagement in the entire therapeutical process should be emphasized. Patients are still convinced that it is physician who should do

his/her best to cure them. This is why about 30% of patients still smoke even during disease exacerbations and hospitalization, and only 15% of them know how to carry out the inhalation technique properly.

An underestimated problem is a correct diet and body weight. It has been shown that a decrease in body weight and cachexia, typical of patients in the terminal COPD phase, are prognostically unfavorable. In the care of COPD patients, there is a model of palliative care, thus far reserved for terminal cancer patients. Acceptance of palliative care of COPD patients and other incurable respiratory diseases means a return to holistic medicine, to considering the body as a whole, to humanistic medicine that covers all the basic needs of the patient and not just prescribing pharmacotherapy. It also means a wider implementation of the therapeutical team model in which physician, nurse, physiotherapist, dietician, social worker and other specialists care for the patient.

Have we covered everything? Why is there nothing new in the treatment of asthma?

Neil Barnes

The London Chest Hospital, Barts & the London NHS Trust, and Barts and the London School of Medicine & Dentistry, London, UK.

Email: neil.barnes@bartsandthelondon.nhs.uk

Selective beta 2 agonists became available in the late 1960s and inhaled steroids in the early 1970s. Since then, despite an enormous research effort from the pharmaceutical industry and academia, the number of new treatments has been limited. New inhaled steroids have become available but these have been an incremental advance compared with the original inhaled steroids. Long-acting beta 2 agonists introduced into clinical practice in the early 1990s have proved to be very useful add-on therapies. Leukotriene receptor antagonists have mainly found a role as add-on therapies in asthma and more recently the anti-IgE monoclonal antibody, omalizumab, has been available for a small number of patients with severe allergic asthma. The failure to develop a new class of drugs which would have wide applicability and supplant the use of inhaled steroids and long-acting beta 2 agonists is due to a combination of two problems. The first is that inhaled steroids plus long-acting beta 2 agonists have proven so efficacious that it has been impossible to develop drugs which do as well as they do let alone surpass them. Secondly, many of the approaches taken have been aimed at removing a single mediator or cytokine and these approaches have either proven totally ineffective or had a very slight effect.

Current evidence suggests that, if properly applied, inhaled steroids or the combination of inhaled steroids and long-acting beta 2 agonists, can control about 80% of asthma. The developments in this area will be safer inhaled steroids, which can be taken once daily, and once daily beta 2 agonists. A need remains for the approximately 20% of patients who, even on combination therapy, cannot be controlled and particularly for the about 5% of individuals with severe and difficult asthma. This group of patients are heterogeneous and it is likely that different mechanisms will be acting in different patient groups so targeted therapy at a limited percentage of individuals may be the way forward.

Monitoring inflammation in asthma. Where are we now?

Joanna Chorostowska-Wynimko

Laboratory of Molecular Diagnostics,
National Institute of Tuberculosis and Lung Diseases, Warsaw, Poland.

Email: j.chorostowska@wp.pl

Asthma is primarily an inflammatory disorder, thus it would be desirable to include a measure of this process to the standard diagnostic procedures, as well as assessment of disease severity and control. At present, measures such as lung function, symptoms, and reliever use are recommended as objective means but none of them adequately reflect airway inflammation. Several non-invasive methods have been proposed and evaluated as tools for airway inflammation assessment. Eosinophils in induced sputum and exhaled nitric oxide are currently considered the most reliable markers. Both are raised in asthmatic subjects, predict disease exacerbations and decrease following adequate controller therapy. Also, both were proven superior to the use of clinical assessment or pulmonary function to guide therapy. However, their standardization and cost-effectiveness together with some practical implications of routine practice undermine their clinical utility. Other candidate markers as well as biological materials, like exhaled breath condensate might offer some new possibilities in the future, however still need further evaluation.

Is asthma education and self-treatment beneficial?

Martyn R Partridge

National Heart and Lung Institute, Charing Cross Hospital, London, UK.

Email: m.partridge@imperial.ac.uk

There has been a global shift of disease burden, to a different extent in different countries, towards long-term medical conditions such as depression, hypertension, heart disease, COPD and asthma, away from short-lived episodes of infectious illness. Long-term disorders need a totally different approach with more emphasis upon:

- Enhancing compliance
- Group support
- Self-care (the giving of control to the person with the condition)
- Regular follow-up
- Consideration of alternative methods of follow up

In asthma, guidelines have emphasised the importance of self-management education for over fifteen years and despite systematic reviews outlining clearly that which should be contained within self-management education, the evidence is that this is poorly implemented. Nevertheless, there is grade A evidence that self-management education and particularly the offering to patients of a written personal action plan can significantly reduce symptoms and unscheduled need for health care.

Asthma education for children and families (PRACTALL)

Erkka Valovirta

Turku Allergy Center, Turku, Finland.

Email: erkka.valovirta@terveystalo.com

The benefits of education in childhood asthma have been examined in a number of studies which support the thesis that education improves outcomes in this patient group. Children with asthma who are younger than 5 years have been shown to benefit, and a structured educational program has been shown to be successful in increasing both the self-management skills of asthmatic children and compliance with medical regimes in 7–14 year-olds. Despite the evidence of the benefits of education, only general pointers are given on the subject in the Global Initiative for Asthma Guidelines.

The PRACTALL (Practical Allergy) document on the diagnosis and treatment of asthma in childhood by EAACI and AAAAI, seeks to address the level of education needed for a particular child with asthma and his/her parents, taking into account their changing educational needs as they grow and develop, as well as making recommendations for healthcare professionals, and for health authorities and politicians in general. It is proposed that education is an essential aspect of disease management, and should commence at an early phase of disease, and that time of diagnosis of asthma should be the point at which to decide what level of education is needed for the particular individual and his/her family. It is also proposed that asthma should feature as a prominent element in both continuous medical, and professional, education programs.

Educational programs in asthma should increase parental and patient knowledge of the disease, allay fears concerning medication and increase communication between all interested parties. Lack of adherence to treatment plans has been associated with poor outcomes, and parents are frequently concerned about the need for 'life-long' treatment. Hence, strong evidence is needed to demonstrate that daily medication is much more effective than intermittent treatment. Long-term benefits may not be appreciated by young people, so short-term benefits should be emphasized. Patient self-confidence should also be built up, and the need for psychological support for some parents may be considered.

The minimum requirement in asthma education should be face to face interaction and review of individual treatment plans at every consultation.
However, it is proposed that a three tier system of education should be implemented in order to satisfy the different needs of the child with asthma, taking into account severity of disease, stage of development, and the need for information among parents and all care givers involved with the individual child.

The system is briefly summarized as:

- 'Education following diagnosis' – for the asthmatic child and [at least] one parent
- 'Structured education' – for the asthmatic child and both parents
- 'Education of other care givers' – for all those involved in care of the asthmatic child, including day-care workers, school staff, relatives, etc.

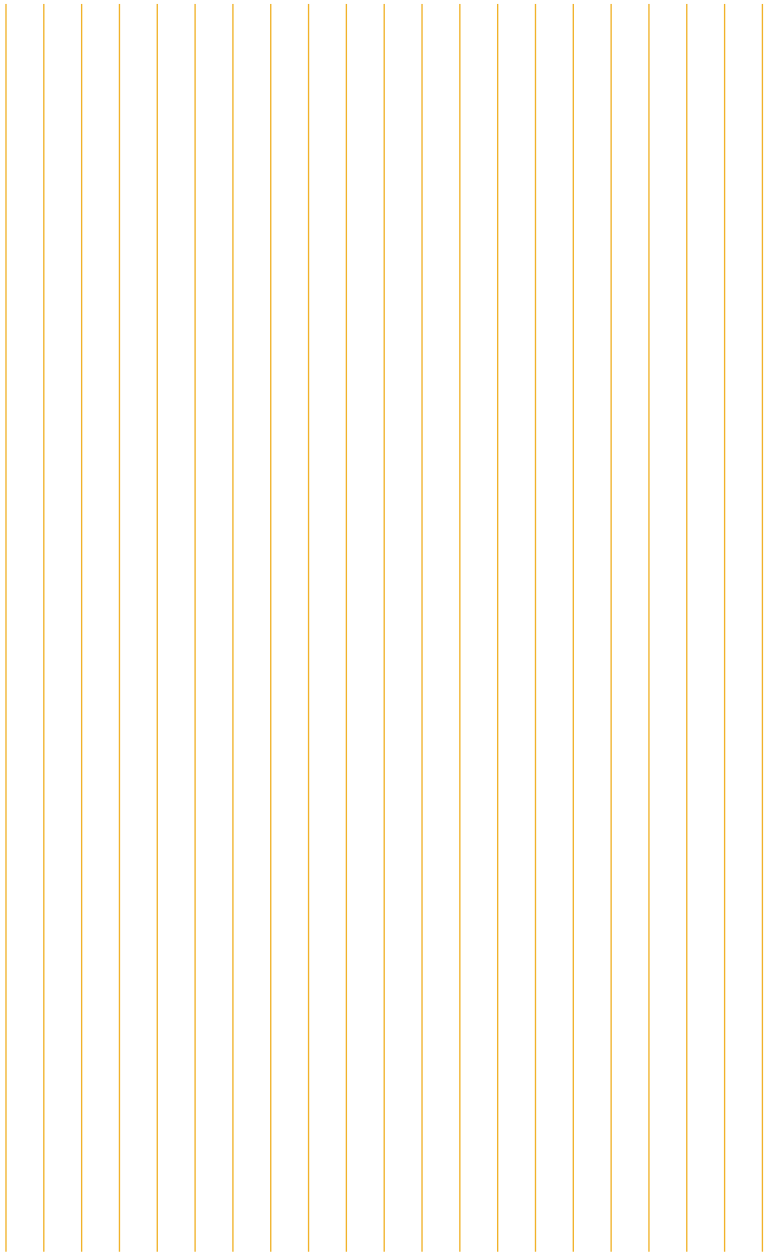
Summary

Patient empowerment, via knowledge of disease and treatment, is largely acknowledged as being a strong aid to compliance and to improve outcomes in a number of chronic conditions. The value of education for children with asthma, from ages as young as 2–5 years has been examined and shown to result in better compliance and

health. Patients taking control of their disease and self-managing their treatment may relieve economic and manpower burdens on healthcare systems. Consequently, a continuous process of education across all patient groups, parents and care givers, as well as healthcare professionals should be considered as an indispensable element of asthma management. The cost effectiveness of educating both patients and all those involved in the treatment and care giving of children with asthma should now be an essential aspect of future studies in this area.

REFERENCE

Bacharier LB, Boner A, Carlsen KH, et al. Diagnosis and treatment of asthma in childhood: a PRACTALL consensus report. Allergy 2008;63:5-34.



Self-management from hypersensitivity to anaphylaxis

Erna Botjes

Dutch Food Allergy Organization, The Netherlands.

Email: ernabotjes@gmail.com

Around 5–8% of children and 2% of adults suffer from food allergy. A correct diagnosis is essential for the food-allergic patient. The identification of specific IgE against food allergens in infants indicates the child will become allergic. Parents also need to know whether their baby and any siblings are more likely than others to be atopic. Information is required relating to how the different types of allergic symptoms (for example, eczema, asthma, food allergy, rhinitis) are linked and how to alleviate symptoms.

It is still difficult to diagnose food allergy correctly in older children and adults. Self-diagnosis of food allergy is notoriously unreliable and highly over-reported, whereas the missed diagnosis of a serious food allergy could be potentially life-threatening. Today, double-blind placebo-controlled food challenges remain the "gold standard" for diagnosis. This is because both skin prick tests and blood tests, although indicative, are not sufficiently reliable, on their own, to diagnose food allergy in all cases. The food challenge test is time-consuming and more stressful for the patient than other tests.

From the perspective of the food-allergic patients, food allergy can be difficult and time-consuming to manage because sufferers may react to extremely small amounts of problematic foods. Food allergies can result in uncomfortable, severe, or potentially fatal responses. Asthma has been shown to be a risk factor for more severe anaphylaxis. Infections, alcohol, medication, stress and exercise may exacerbate food allergy. The anxiety of food-allergic patients (or parents) leads to unnecessary extensive diets and restrictions in social life. Mothers experience greater anxiety and stress than fathers. In addition, mothers rate their child's quality of life worse than the father or the allergic child.

The only available treatment for food allergy is avoidance of problematic foods, and consequently, the implementation of effective allergen labelling strategies is essential. Preparing meals, shopping and social activities need new strategies. Parents or patients need coaching about how to deal with food allergy in daily life. They need training, often from a specialist allergy dietician in allergen avoidance (whilst maintaining a balanced diet) and also from a specialist nurse or support staff member in managing emergencies and administering emergency medication. In addition to prescribing self-injectable epinephrine, it is important to educate patients on its proper use and reinforce the importance of having it available at all times. This must be understood by other people in a range of situations.

What do we know about allergy prevention in children?

Marek Kulus

Department of Pediatric Respiratory Diseases and Allergology,
Medical University of Warsaw, Poland.

Email: kulus@amwaw.edu.pl

In the second half of the 20th and beginning of the 21st century, the prevalence of allergy has increased especially in children. The causes of this trend are not fully understood and are still discussed. The answer to this question is extremely important, because effective allergy prevention measures can only be implemented based on evidence-based data. This topic is an exciting area of study that can lead to improvements in public health.

At least four problems concerning prevention in children need to be discussed:

1. The process that is essential for prevention: What we would like to prevent? Is it important to stop sensitization detected on the base of immunological investigations or skin tests, or should we rather stop development of clinical symptoms?
2. Precise description of population under risk of development of allergy: How to define an under-risk population? What methods can be applied to select a risk group from the general population?
3. The timing of intervention: What is the earliest and the best possible time to introduce preventive measures?

4. The possibility and effectiveness of intervention: What are the types of intervention? Is it possible to implement extensive preventive measures in the specific population? What is the evidence for effectiveness of different methods of intervention?

It is well known that immunological origins of allergy start in early life including the intrauterine period. Childhood is usually the age of the first manifestation of such allergic diseases as atopic dermatitis, asthma and allergic rhinitis. Therefore, the prenatal period and early childhood seem to be particularly important for the introduction of a preventive approach.

The results of many well designed trials concerning allergy prevention have been reported in recent years. Based on this evidence, several internationally agreed statements have been published. This presentation focuses on the role of maternal factors in possibly influencing the development of their child's allergy as well as the children's conditions. In particular, I shall discuss the importance of the mother's diet and allergen avoidance during pregnancy, and pre- or postnatal probiotic supplementation. The approach to the children, apart from dietary strategies, include environmental interventions, namely the presence of a pet in the home, house dust avoidance and tobacco smoke exposure.

The difference between primary, secondary and tertiary prevention will also be discussed.

Genetically modified foods: allergy friend or foe

Harry Wichers

Wageningen University and Research Centre,
Allergy Consortium Wageningen, The Netherlands.

Email: harry.wichers@wur.nl

Genetic modification (GM) has attracted much attention as a tool to improve the agronomic properties of food crops. In recent years, GM has also been used to confer properties to food crops that provide more direct benefit to consumers. Amongst these, GM is (until now in an experimental setting) being investigated as a tool to produce hypoallergenic varieties of crops. Thirdly, GM is increasingly used to produce allergenic proteins, for instance with the aim of applying such proteins in diagnostic settings.

GM-technology encounters strong consumer reluctance, in particular on European markets. Despite this, the world-wide production of GM-crops is steadily increasing, in particular in the USA and Asia. The total area for production of transgenic crops was about 120 million hectares in 2007, and has an approximate annual growth rate of 5-10%. Recent research in Wageningen has shown that allergic consumers in particular perceive the potential benefits of hypoallergenic GM-crops, and perceived benefits increasing with the impact of allergic complaints on quality of life.

Allergy-related issues that need to be dealt with in GM-crops with improved agronomical traits are to ascertain that the newly introduced genes do not encode al-

lergenic proteins, and that the genetic transformation process itself does not result in increased allergenicity of endogenously present (allergenic) proteins. Despite the huge and increasing area of GM-crops, to the products of which by now billions of consumers have been exposed, no such adverse effects have been reported. The well-known example of GM-soy in which brazil nut 2S-albumin had been expressed has not resulted in problems, because this product was successfully banned from the market after its allergenic potential had been recognised. In addition, the development of this product could have been prevented in the first place if the WHO-decision tree for risk evaluation of GM-crops had been applied. Potential additional allergenicity of GM-crops does not appear to be a realistic objection against GM-technology, provided responsible scrutiny is applied in developing such crops.

GM can also be applied directly to eliminate allergenic proteins in food crops. Examples of this, until now in laboratory settings, are GM-apple, -soy, -peanut and -rice. Factors that will determine the potential success of such crops are, in addition to consumer perception, the severity of the associated allergy, whether there are multiple major allergenic proteins in such crops, the robustness of the supply chain, and impact of the GM-process for agronomic traits of the crops involved.

Transgenic allergens are increasingly being used in diagnostic tests. Among the advantages of this approach are ease of production and homogeneity of products. However, care needs to be taken to ensure that recombinant diagnostic allergens sufficiently reflect their natural counterparts, both at individual protein level (epitope structure) and in composition of isoform mixtures.

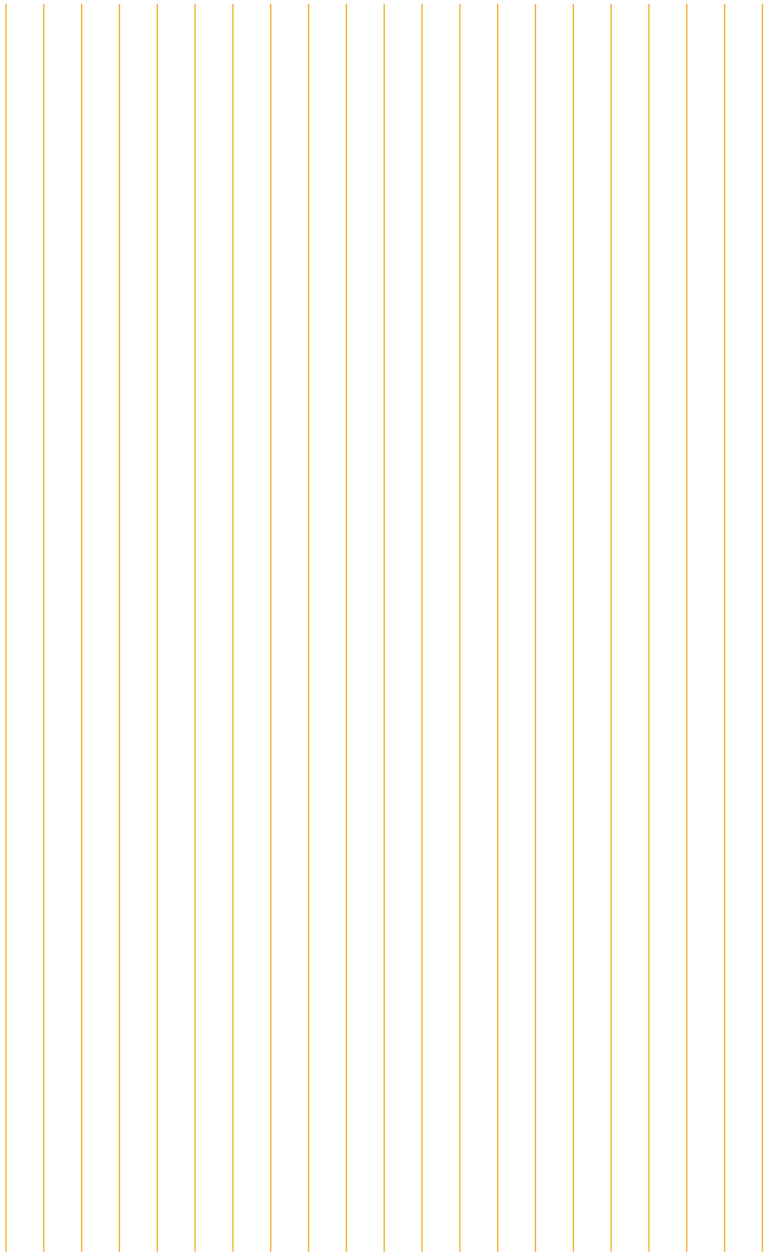
Controversies and new research on prevention and management of food allergy

Jonathan O'B Hourihane

Clinical Investigations Unit, Cork University Hospital, Cork, Ireland.

Email: J.Hourihane@ucc.ie

Food allergy is a prevalent condition in both children and adults. Its management can be divided into three distinct activities: prevention, support and treatment. Prevention of allergic conditions has been a prime aspiration for all clinicians and researchers, but it has not been a fruitful exercise. Delayed introduction of allergenic foods has not affected the prevalence of food allergy and the American Academy of Pediatrics has recently altered its advice about maternal dietary exclusions and infant weaning practices. The UK government's advice about avoiding peanut has had no discernible effect on the prevalence of peanut allergy and the UK's own House of Lords has urged withdrawal of the advice. Studies now underway are actually exploring early introduction of peanut. Supportive care remains more stable with nutritional advice and supplements, and provision of rescue medications such as adrenaline, as needed. We are entering a phase of trials of therapies to alter the outcome of food allergy, specifically oral tolerance induction and immunotherapy. There is some work to be done to identify which are the most suitable patients for these therapies and it appears these interventions will need to be tailored carefully for patients, as not all patients may be able to tolerate them.



Update/results of the GA²LEN Campaign Does Rhinitis Lead to Asthma?

Noélie Auvergne

GA²LEN, Global Allergy and Asthma European Network,
GA²LEN Dissemination

Email: noelie.auvergne@interal.eu

The GA²LEN campaign "Does Rhinitis lead to Asthma?" was launched at European level on the occasion of the GA²LEN Annual Conference in London, UK, on 20 April 2007. The objective is to alert healthcare professionals and patients of the importance of the link between rhinitis and asthma for the management of one or both these allergic diseases. Evidence shows that rhinitis and asthma are intimately linked, suggesting the concept of "one airway, one disease". The management of one disease is shown to be improved by taking the other into account.

The campaign is based on a peer-reviewed scientific publication of the GA²LEN review committee (1) and follows the recommendations of the International guidelines on the management of Allergic Rhinitis and Its Impact on Asthma (ARIA) updated in 2008 (2).

A second scientific paper has been developed on the diagnosis and treatment of allergic rhinitis, in collaboration with GA²LEN, EFA, and two organisations of primary care physicians: the International Primary Care Respiratory Group (IPRCG) and the World Organization of Family Doctors (WONCA) (3).

Two leaflets are available: one is dedicated to the primary care physicians and the other to the patients. They are now available in 12 languages: Danish, Dutch, English, French, German, Greek, Italian, Lithuanian, Macedonian, Polish, Spanish and Catalan. The campaign has been launched at national level in Belgium, France, Austria. Events are planned in several other countries including Italy and Poland.

Number of EFA members involved in developing the Patient brochure	**17**
Number of EFA members involved in translating the brochure	**14**
Number of EFA members involved in the preparation of national launches	**9**

GA²LEN thanks Phadia and UCB Pharma for their support to the campaign through educational grants.

REFERENCES

1. Paul Van Cauwenberge, Jean-Baptiste Watelet, Thibaut Van Zele, De-Yun Wang, Elina Toskala, Stephen Durham, et al. and members of GA²LEN workpackages 3.2. and 3.3. Does rhinitis lead to asthma? Rhinology 2007, 45, 112-121

2. Bousquet J, Khaltaev N, Cruz A, Fokkens WJ, Denburg J, Zuberbier T, et al. Allergic Rhinitis and its Impact on Asthma (ARIA) 2008 Update (in collaboration with the World Health Organization, GA²LEN, and AllerGen). Allergy 2008: 63 (Suppl. 86): 8–160.

3. D. Ryan, C. van Weel, J. Bousquet, E. Toskala, S. Ahlstedt, S. Palkonen, et al. Primary care: the cornerstone of diagnosis of allergic rhinitis. Allergy 2008 in press.

Latest evidence on indoor air quality and guidelines

Paolo Carrer

Department of Occupational and Environmental Health, University of Milan, Italy.

Email: paolo.carrer@unimi.it

Research conducted by various agencies has shown that the quality of indoor air can be many times worse than that of the outdoor air and can affect people's health. Pollutants can cause or contribute to short- and long-term health problems, including cancer, asthma, respiratory tract infections, allergic reactions, eye and skin irritations. Indoor air pollutants can cause discomfort, and reduce attendance and productivity. Given the fact that many people spend as much as 90 percent of their time indoors, the health risk due to indoor air pollutants is a significant public health concern. The political relevance of the theme is illustrated by two recent initiatives: WHO convened a working group for the development of indoor air quality guidelines gathering different scientific expertises and DG SANCO (Public Health Directorate of EU) created an indoor air quality expert group to contribute for the implementation of the EC Environment and Health action plan 2004-2010 in what regards indoor air quality. A broad survey of what currently exists in the indoor air field shows very few projects dealing specifically with indoor and health as it is the case for THADE (Franchi et al., 2006), NORA (Mendell et al., 2002), and for some special reports, such as INDEX (Kotzias et al., 2005) and SCHER (SCHER, 2007).

To be effective, any policies directed at improving indoor air quality need to be part of a comprehensive management strategy involving governments, institutions, professional bodies and individuals.

The EnVIE project is a co-ordination action on Indoor Air Quality and Health Effects supported by EU, involving as partners eighteen European institutions from eleven countries covering a wide spectrum of scientific specialties related to health and the built environment. The project aims to identify the most widespread and significant indoor causes and sources for these health impacts, and evaluate the existing and optional building and housing related policies for controlling them. It will address in particular how indoor air quality might contribute to the observed rise in asthma and respiratory allergy, together with other acute and chronic health impacts. The following diseases have been prioritised as being caused or aggravated by poor indoor air quality: Allergic and asthma symptoms, Lung cancer, Chronic obstructive pulmonary disease (COPD), Airborne respiratory infections, Cardiovascular morbidity and mortality, Odour and irritation. The most widespread and significant indoor causes and sources for these health impacts have been identified. The project will propose the policy alternatives for minimising the unwanted health consequences in terms of achievable public health benefits, as well as political, technological, economical and

REFERENCES

Franchi M, Carrer P, Kotzias D, et al. Working towards healthy air in dwellings in Europe. Allergy, 2006;61:864-8.

Kotzias D, Geiss O, Tirendi S. Evaluation of total exposure to benzene and formaldehyde in the European countries. Epidemiol Prev. 2005;29(5-6 Suppl):17-21. Italian.

Mendell MJ, Fisk WJ, Kreiss K, Levin H, et al. Improving the health of workers in indoor environments: priority research needs for a national occupational research agenda.
Am J Public Health. 2002;92:1430-40.

Scientific Committee on Health and Environmental Risks (SHER) (2007) "Opinion on risk assessment on indoor air quality", European Commission: Health & Consumer Protection Directorate-General. Brussels.

Managing allergy and asthma at school (EAACI Position Paper)

Antonella Muraro

Centre for Food Allergy Diagnosis and Treatment Veneto Region, Department of Pediatrics, University of Padua, Padua, Italy. On behalf of the European Academy of Allergy and Clinical Immunology (EAACI) Task Force for the Allergic Child at School.

Email: muraro@pediatria.unipd.it

One-quarter of children in EU is affected by allergic disease; food allergy represents the leading cause of anaphylaxis in children and asthma is the single most prevalent cause of disability among the children.

Allergy at school manifests in various ways: eczema, asthma, rhinitis, urticaria, conjunctivitis, facial angioedema, laryngeal oedema, gastrointestinal features such as vomiting, abdominal pain, and diarrhoea. The most severe symptoms present as anaphylaxis but allergic disease also causes a reduction in quality of life through symptoms of chronic inflammation. Allergy often presents for the first time in schools and all staff should therefore be prepared to facilitate a healthy and safe lifestyle for these children.

Allergic disease is highly prevalent across Europe. The majority of the burden of occurs in school-age children, and it therefore commonly manifests at school. There is a broad spectrum of severity with some children at risk of anaphylaxis and death whilst others present with chronic allergic diseases and are at risk of reduced quality of life and impaired school performance. Commonly, children suffer from a combination of acute and chronic disease.

An important principle of the EAACI Position Paper is that all schools should be suitably prepared for all children with allergic disease. The best way to achieve this is through an education network involving families, healthcare and education providers ensuring that children are identified, the school alerted and trained, and specific management plans initiated. This should be supported by repeated education of all school staff in recognition of allergic symptoms, allergen avoidance and treatment of acute episodes.

Our aim is for these guidelines to be adopted across diverse models of healthcare and education provision to protect and nurture all children with allergy whilst at school.

How to start from scratch and build a patients education programme

Martyn R Partridge

National Heart and Lung Institute Division, Imperial College London, UK.

Email: m.partridge@imperial.ac.uk

Numerous guidelines on the optimal management of respiratory diseases now exist. Of course, for the busy practitioner which guideline to use depends upon making the correct diagnosis. In respiratory medicine, there is significant evidence to suggest some lack of clarity with regards the diagnosis of airway diseases and the same patient may be admitted to hospital on two subsequent occasions with a exacerbation of asthma and exacerbation of COPD. The difficulty of making an accurate diagnosis in respiratory medicine sometimes reflects the absence of a specific marker (for example a blood sugar above x mmol) and sometimes the under use and lack of availability of spirometry. Some new algorithms and tools to aid diagnosis will be presented.

Once the diagnosis is made we need to recognise that for many patients with asthma this is a life long condition and guidelines are clear about the aim, which is to give patients control of their own condition. The global initiative for asthma (1) defines patient education as involving a partnership between the patient and healthcare professional with frequent revision and reinforcement, and states clearly that the aim is guided self-management – that is, giving patients the ability to control their own condition with guidance from the healthcare professional.

The new British Guideline on the Management of Asthma (2) also clearly states "all patients (particularly those admitted to hospital) should be offered self-management education including written individualised asthma action plans". Grade A evidence is given in support of this recommendation.

Despite the strength of the science behind self-management education, the evidence is clear that few patients receive written personal asthma action plans and survey after survey shows morbidity despite the availability of good medication.

The key emphasis which may have been overlooked is that of the development of genuine partnerships and upon enhancing communication between the patient and healthcare professional. For the health professional, this involves being attentive, eliciting underlying concerns, addressing any concerns, using interactive dialogue and eliciting and negotiating goals for therapy and lifestyle. However, there is now also good evidence that we can aid patients to be more equal partners within a consultation, and help them with better information provision and to develop skills in clarification and verification. Use of the whole team to reinforce messages, group support and appropriate comprehensible information materials all aid success.

REFERENCES

1. International Consensus Report on the diagnosis and treatment of asthma. National, Heart, Lung and Blood Institute, National Institutes of Health. Bethesda, Maryland 20892. Publication No 92-3091. European Respiratory Journal 1992; 5: 601-41.
2. British Thoracic Society/Scottish Intercollegiate Guidelines Network. British Guideline on the Management of Asthma. May Thorax 2008

This is how we built up our patient education programme (large organization). From filling the gap to moving mountains

Erica Euving

Astma Fonds Longpatientenvereniging, The Netherlands.

Email: erica.euving@astmafonds.nl

Having built a patient education program at a time when we were trying to bridge the gap between healthcare professionals and patients by educating patients and healthcare professionals, we are now shifting our focus. We are not the ones to fill the gap between the mountains, we are the ones that need to move mountains, which is quite a task. Internet and healthcare professionals are the main source of (medical) patient education and information. Competition is high. We as a patient's organization need to have our specific focus in information and education to patients in our core business: experience and stories. We must ask healthcare authorities to incorporate patient education in their programmes; we shouldn't have to solve the problems ourselves. In the 30 minutes assigned to me, I would like to share our shift and the challenges that it raises.

This is how the VMCE built up their education programme

Lena Kolff

Dutch Association of People with Atopic Eczema (VMCE), The Netherlands.

Email: Lenakolff@casema.nl

The Dutch Association of People with Atopic Eczema, the VMCE, has about 1,750 members. The members are people with atopic eczema and parents of children with eczema. Education is one of the most important aims of the association and is given in different ways. This education is based on a comprehensive communication plan that was drawn up in 2006. The VMCE provides education and information in the following ways:

Printed material

The VMCE publishes seven leaflets on various themes: atopic eczema in general, how to manage itching, and medication. In addition, we have published two books about 'life with atopic eczema' and 'self care'. We are now preparing the reissue of a little book specially written for children. Four times a year members of the VMCE receive the magazine GAAF!, which contains articles about eczema, experiences of members, information about meetings and other activities.

By mail and phone

It is also possible to obtain information by mail and phone. Volunteers and staff members of our administrative office can answer questions ranging from very practical issues like addresses of dermatologists to emotional problems connected with atopic eczema.

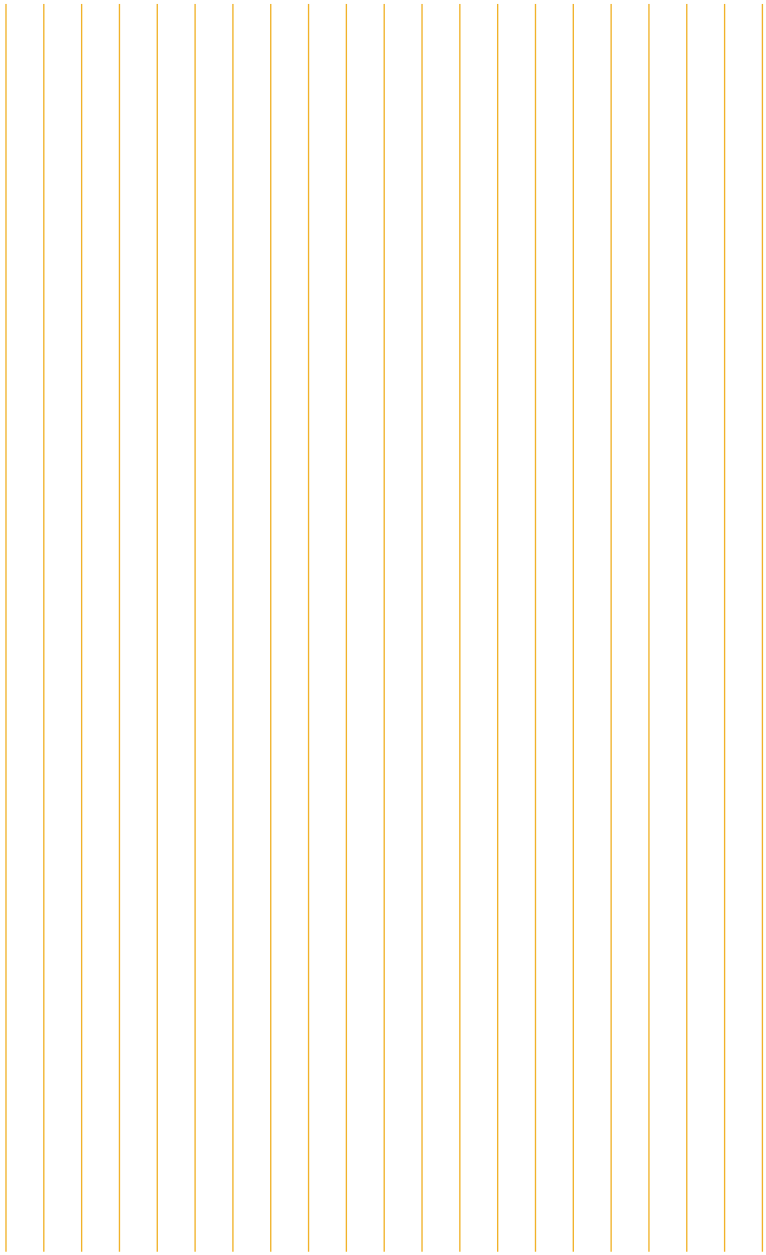
On the website

In recent years the VMCE website (www.vmce.nl) has become a greater source of information (in 2007 the site had 177,752 visitors versus 38,794 in 2002). The site gives information about the VMCE, about medication, the results of research and so on. There is also a discussion forum with a chatbox. Here people can give each other practical information, compare notes and give each other support.

Meetings, workshops etc.

Despite the new possibilities of internet, personal meetings are still very important and highly valued. Therefore, the VMCE frequently organises meetings for its members. Sometimes there are meetings for just 1 day or an evening, sometimes there are series of meetings. In general an expert is invited to speak during these sessions. The VMCE also organises workshops, conferences and courses for volunteers. Volunteers of the VMCE are available to give information or courses for interested parties such as pharmacy employees.

This is just a very short list of the activities of the Dutch Association for People with Atopic Eczema. My presentation will provide much more information about the way we make up our education programme.



E-learning in education in pneumonology

Waldemar Tomalak

Dept Physiopathology of the Respiratory System, Institute for TBC and Lung Diseases, Rabka Branch, Poland.

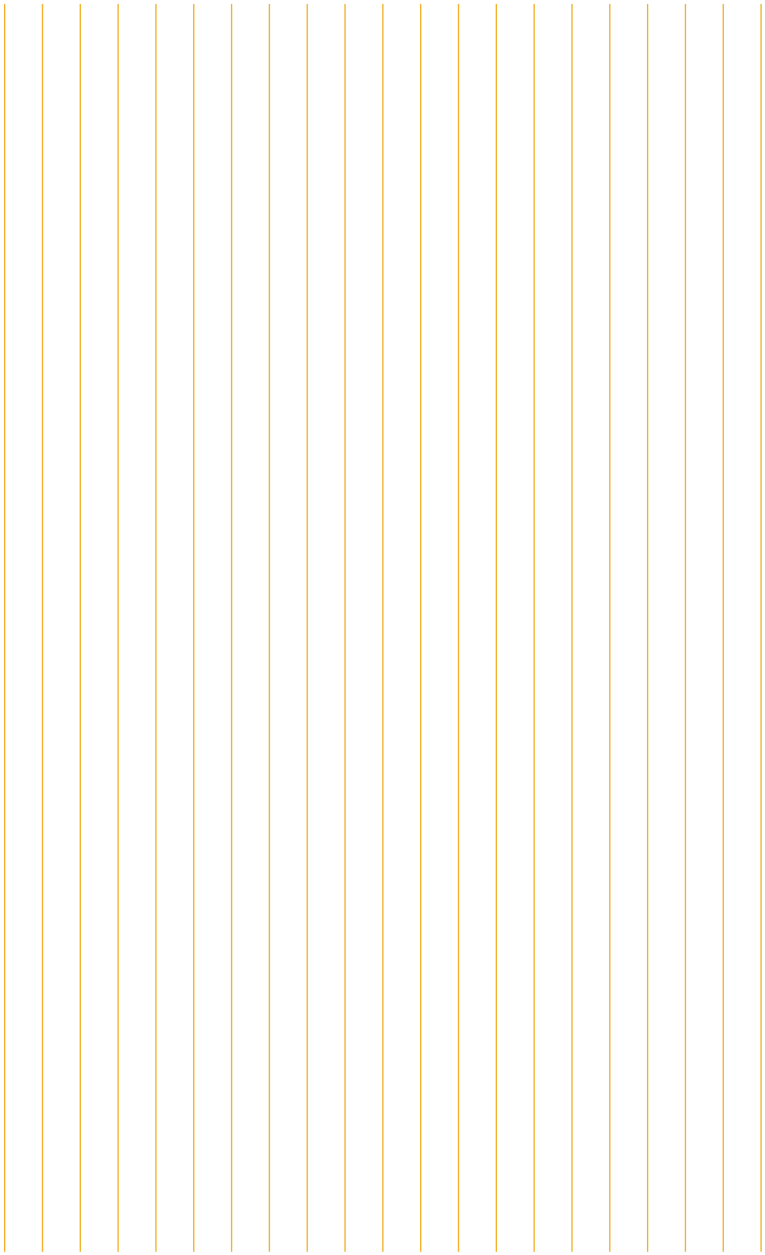
Email: wtomalak@zpigichp.edu.pl

E-learning is a distant learning using computer techniques and the Internet and means supporting the didactics with the help of computers and internet, recently also with the help of mobile communication techniques.

The advantages of e-learning are attractivity, flexibility, orientation to individualization of teaching, cancelling of geographical restrictions, but also cost reduction on both sides – providers and recipients of education. E-learning has also its limitations and disadvantages: technological (it requires access to broadband internet and advanced computer skills), cultural (lack of personal contact with the teacher) and social (unfamiliarity with a foreign language can be a barrier).

Pulmonary medicine is widely using the possibilities of e-learning. E-learning may be patient-oriented (information services for patients) or be used in educational processes addressed to doctors and health care professionals during university courses as well as in postgraduate education. Educational tools might be constituted by www services, interactive courses and presentations, networked teleconferences with the transmission of voice, text, pictures and movies(lectures through internet) or other sophisticated forms.

My presentation reviews examples of e-learning in education of the patients with chronic respiratory diseases and professionals oriented materials used in e-learning.



Symptoms of lung diseases

Anna Prokop-Staszecka

John Paul II Hospital Kraków, Poland.

Email: a.prokop@szpitaljp2.krakow.pl

There is a certain stereotype of thinking about organ diseases depending on the type of accompanying symptoms. The patient who has diarrhoea and complains about an aching abdomen makes us think about a disorder of the digestive tract. When the patient mentions acute pain in the chest, the physician's first thought is a cardiac infarct. We are used to linking lung diseases with cough, blood spitting and breathlessness. Obviously, these symptoms usually accompany lung diseases but we have to interpret them individually, taking the patient's complete clinical picture into consideration. We have to perform diagnostic investigations that will help us to establish the cause of the symptoms.

Medicine is both an art and a science and therefore we cannot separate symptoms either physically or mathematically. It is the doctor who has to establish whether the symptom is linked to one or more organs, and if it is trivial or whether it requires diagnostic procedures and is crucial for the patient's prognosis.

To recapitulate, cough, breathlessness and blood spitting are basic symptoms of pulmonary diseases but obesity, cachexy, depression, somnolence during the day or confusion may be the result of lung diseases.

The physician, nurse or rescuer seeing the patient with cyanosis, deformation of the chest, cough, finger clubbing or expectoration automatically thinks about lung disease. A doctor told that his/her patient coughs, has breathlessness, fever and shivers suspects pneumonia.

Nothing is certain in medicine, therefore the doctor needs knowledge, patience, kindness and additional diagnostic investigations to establish the reasons for the patient's blood spitting or breathlessness. As before, no up to date additional diagnostic investigation like CT, PET, bronchoscopy or magnetic resonance can replace a properly gathered medical history of the patient or establish the origins of the disease and intensification of its symptoms. A correctly planned investigation will enable us to determine the cause of the disease if it scheduled after a correctly collected medical history and complete investigation.

Global initiative for asthma – Integrated care model. Evidence-based practice for nursing

Emilia Świetlik

Międzyleski Szpital Specjalistyczny, Warszawa

Email: em_swietlik@wp.pl

"Research without practice is like building castles in the air. Practice without research is building castles on slippery grounds."

Kader Parahoo

While rapid development of evidence-based medicine is a matter of the last two decades, it has a long history dating back to the XIII century. Probably the first well designed clinical trial involving large numbers, randomization and statistical analysis was done in the XVII century by Jan Babtista van Helmont, a physician and philosopher who became skeptical about the practice of bloodletting. Ultimately, evidence-based medicine spread among different disciplines and professional groups. As nursing has become an academic course (in Poland in 2001) and has been recognized as an area of research, the vast field of traditional knowledge, intuition, experience and reflective practice is to be strengthened or replaced by research.

Aristotle differentiated two types of knowledge: know-how and know-why. In nursing practice, know-how is crucial but not sufficient for progress in the rapidly changing world of medicine; know-why knowledge is mainly generated by research both basic and applied and gives a rationale for practice. Changes in patterns of disease, especially chronic diseases such as asthma and COPD, as well as the public's expectations and their demand for quality and personalized care have all had an effect on

the multidisciplinary therapeutic team with nurses being a core of the party. Regarding pulmonary care, there is a specific need for pulmonary nurses, and the variety of nursing work requires high-quality training to effectively play the roles assigned. The essential of nursing care is to coordinate patient management by working with the doctor to cure the patient, protecting and advocating for the patient, and educating the patient and the family. The particular role of a nurse as an educator is highlighted in many international guidelines, including GINA. The first and the most important step in the management of chronic conditions such as asthma is patient education, this concerns teaching about the disease, medication "relievers" and "controllers", inhalation technique, smoking cessation, recognition of triggering factors, use of peak flow meters and many others. There is a growing body of evidence that knowledge is associated with the degree of asthma control. Educated patients have less GP and specialist visits and days off work due to asthma, better lung function, and a better quality of life. These represent the rationale behind asthma patient education based on evidence from randomized controlled trials that evaluate both quality of intervention (skills of educator) and impact on the patient.

GOLD – Global Initiative for COPD

Halina Batura-Gabryel

Department of Pulmonology, K. Marcinkowski University of Medical Sciences in Poznań, Poland.

Email: halinagabryel@wp.pl

Chronic Obstructive Pulmonary Disease (COPD) remains a major public health problem and is the fourth leading cause of death in the world. There is evidence that diagnosis and management of COPD is generally not in accordance with current guidelines. Better dissemination of guidelines and their effective implementation in a variety of health care settings is urgently required. The goals of the Global Initiative for Chronic Obstructive Lung Disease (GOLD) are to increase awareness of COPD and decrease morbidity and mortality from this disease, to improve prevention and management through an effort of people involved in health care and health care policy, and to encourage of research interest in this disease. A worldwide decline in tobacco smoking would result in a decrease in the prevalence of this disease. Smoking cessation is the most effective intervention to reduce the risk of developing COPD, and simple smoking cessation advice from health care professionals has been shown to make patients more likely to stop smoking. Primary care practitioners and nurses also play an important role in implementing smoke-free home and work environments. One strategy to help achieve the objectives of GOLD is to provide health care workers, health care authorities, and the general public with state-of-the-art information about COPD and specific recommendations on the most appropriate management and prevention strategies. The document serves as a source for the preparation of

information for other audiences, including an Executive Summary, a Pocket Guide for Health Care Professionals, and a Patient Guide. The GOLD document includes chapters on: the Definition, the Burden of COPD, Risk Factors, Pathology, Pathogenesis, and Pathophysiology. A major part of the GOLD report is devoted to the clinical Management of COPD and presents a management plan with four components: Assess and Monitor Disease; Reduce Risk Factors; Manage Stable COPD; Manage Exacerbations which are presented according to the severity of the disease, using a simple classification of severity to facilitate the practical implementation of the available management options. Lastly, a new chapter (added in 2007) will assist readers in Translating Guideline Recommendations to the Context of (Primary) Care. Where appropriate, information about health education for patients is included. Evidence is increasing that a chronic disease management program for COPD patients that incorporates a variety of interventions, includes pulmonary rehabilitation, and is implemented by primary care, reduces hospital admissions and bed days. Key elements are patient participation and information sharing among health care providers.

Pulmonary rehabilitation and the role of the allied health professional

Agnieszka Lewko[1] and Julia Bott[2]

[1]*St George's University of London and Kingston University, UK.*
[2]*Surrey Primary Care Trust, UK; Chair, ERS Physiotherapy Group*

Email: agnieszka_lewko@yahoo.co.uk

Pulmonary Rehabilitation (PR) was developed for people with COPD. However it works equally well for those with other conditions and their needs must be considered at all stages. PR provides the integration of both physical and emotional therapy and support. In essence, the role of Allied Health Professionals (AHPs) in PR is to provide the service. This includes: assessment and monitoring of the patient pre, during and post PR; exercise prescription and training; provision of education and emotional support; and co-ordinating the running and organising the service. Each AHP brings to PR their knowledge and expertise to help improve the patient's exercise tolerance and functional ability, and to help empower them to better manage his or her own condition. A programme could involve any of the following AHPs, according to local staffing, expertise and service requirements: Physiotherapist, Nurse, Dietitian, Occupational Therapist, Pharmacist, Technician, Social Worker, Psychologist. AHPs will be responsible for providing a comprehensive variety of education sessions, eg, Controlling breathlessness; Anatomy/Physiology/ Pathophysiology; Benefits of exercise; Stress management/relaxation techniques; Energy conservation/self-care/ADL/Aids to daily living; Avoidance of exacerbation / when to seek help; Psychosocial /emotional issues; Self-help and support groups. The core component of PR is exercise, so individuals with the relevant expertise, usually physiotherapists, must provide this

element. Knowledge is required of: muscle anatomy and physiology; exercise, testing, prescription and training, including the different types of exercise eg, strength & endurance training, as well as the ability to adapt exercises for individuals with other problems.

Organization of PR is considerable, involving planning to ensure availability of staff, cover in the event of absence, strategies for the handling of emergencies, preparation of documentation and paperwork, eg handouts, assessment forms, letters to patients. Consideration must be given to practicalities, such as accessibility of the venue, timing of the sessions and strategies to maintain effect. PR programmes need to allow time for exercise to have benefit, twice weekly for 6 weeks being common in the UK, although some other European countries provide longer. The method and sources of referral need to be clear, with relevant communication systems in place and defined entry criteria. A formal method of screening of referrals for PR needs establishing, since drop-outs are wasteful of resources. Recognized outcome measures should be used to ensure clinical effectiveness, with data collected to ensure this, as well as for financial efficiency and acceptability to the patient. Regular audit is strongly advised.

Food allergy – what should we know about it?

Monika Konieczna

Specialist Hospital in Miedzyeski, Warsaw, Poland.

Email: monika.k.konieczna@gmail.com

An adverse reaction to ingested food can be provoked basically by three mechanisms: food allergy, which is an immunologically mediated reaction, food intolerance, which is a reproducible adverse reaction not mediated by immune hypersensitivity, and food poisoning caused by bacteria, parasites or toxins ingested with food.

The first one, food allergy, more commonly affects children between 1 and 3 years old. Usually children outgrow their hypersensitivity, but in some cases, especially in high-risk infants (family history of allergic disease), food allergy becomes a lifelong condition. The group of most common allergenic foods includes cow's milk, eggs, peanuts, soybeans, wheat, tree nuts, fish and crustacean shellfish, and the first three are the most common cause of immune hypersensitivity among young children. The above-mentioned foods are the most frequent causes, but what is important is that all food proteins are capable of provoking immune reactions under selected circumstances. Some of the risk factors for food allergy are heredity, early exposure to the allergen and premature birth. Nowadays there is no agreement on the strategy for the prevention of IgE-mediated allergies, but some actions can be taken to minimize the risk of its development. These include careful history taking in order to identify high risk infants, breast-feeding for an extended period, late introduction of highly allergenic food in the infant's diet and its exclusion from the diet of the nursing mother. In case

the diagnosis is confirmed, an elimination diet is the first treatment choice, and this can be difficult to follow in case of a small degree of tolerance for the offending food. Despite that and because of its possible life-threatening consequence, it is crucial to encourage the patient to comply with this diet.

- Irrespective of the patient's age, food allergy has a great impact on his daily life, and because of that, patient education concerning his diet, and possible reactions to the allergen is one of the most important parts of the management of his condition. It is especially significant among children. During their classes, school trips and extracurricular activities, they can be exposed to food allergens. While teaching about a food allergy management plan it is also important to emphasize that some foods can contain hidden allergens.

EAACI Position Paper about anaphylaxis

Antonella Muraro

Centre for Food Allergy Diagnosis and Treatment Veneto Region, Department of Pediatrics, University of Padua, Padua, Italy.

Email: muraro@pediatria.unipd.it

Anaphylaxis is a paediatric clinical emergency and all physicians caring for children should be familiar with its management. The position paper, prepared by the EAACI Taskforce on Anaphylaxis in Children, aims to provide evidence-based guidelines to manage anaphylaxis in childhood. Particular emphasis has been placed on how to tackle the practical issues associated with managing children at risk of anaphylaxis. An extensive literature search was undertaken using appropriate search terms in Medline and EMBASE (e.g. anaphylaxis; hypersensitivity, immediate; food hypersensitivity; drug hypersensitivity; latex hypersensitivity; respiratory hypersensitivity; insect hypersensitivity; epidemiological; aetiology; pathophysiology; prevention; drug therapy; diet therapy; therapy). These articles were reviewed and those pertaining to the management of anaphylaxis in childhood were selected to generate this position paper. Although a systematic review of the evidence was undertaken, only the highest available evidence for each issue is presented here. The EAACI Task Force recommendations are the following:

- Adrenaline is the cornerstone of therapy both in the hospital and in the community.
- Each child with a history of a previous allergic reaction to a food or other allergen should have a risk assessment to identify whether they are at high risk of anaphylaxis.

Previous anaphylactic reactions and co-existent persistent asthma are indicators of higher risk of severe reaction.

Other risk factors to consider are a reaction to small amounts of allergen including airborne allergen and cutaneous contact, previous mild reaction to peanut or tree-nut, a long distance from emergency medical care and being a teenager.

Prescription of self-injectable adrenaline is mandatory for high-risk subjects.

An individualised management plan and education of all the child's care-givers are essential in the prevention of recurrences.

European Federation of Allergy and Airways Diseases Patients' Associations

The European Federation of Allergy and Airways Diseases Patients' Associations (EFA) has 32 allergy, asthma and COPD patient associations in 22 European countries as members. They have over 400,000 patients and carers as members. EFA is the forum for members to network, share best practices, collaborate in European projects and surveys and join forces to influence European policies on quality of and access to services for patients, their participation, healthy environment and research into allergy, asthma and COPD. Every year EFA organises a conference on a topic of high priority for patients, this year Patient Education. www.efanet.org

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