Global Alliance against Chronic Respiratory Diseases (GARD)

Report of the General Meeting

Geneva, Switzerland, 10-11 May 2005
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1. **Preamble**

The enormous human suffering caused by chronic respiratory diseases was recognized by the Fifty-third World Health Assembly, which requested the WHO Director-General to continue giving priority to the prevention and control of noncommunicable diseases, including chronic respiratory disease, with special emphasis on developing countries and other deprived populations.\(^1\)

After several consultations (WHO Headquarters, Geneva, 11-13 January 2001 (1); Montpellier, 11-12 February 2002 (2); Montpellier, 27-28 July 2002 and Paris, 10 June 2003 (3); WHO Headquarters, Geneva, 17-19 June 2004 (4)), the Global Alliance against Chronic Respiratory Diseases (GARD) was approved by WHO and the first GARD meeting was held at WHO Headquarters, Geneva, on 18-19 January 2005 (5).

This report summarizes the consultation of experts from 33 governmental and nongovernmental organizations who participated in the General Meeting of GARD (WHO Headquarters, Geneva, 10-11 May 2005).

2. **Introduction**

Dr Robert Beaglehole, Director, Department of Chronic Diseases and Health Promotion, Noncommunicable Diseases and Mental Health, World Health Organization, opened the meeting and welcomed the participants. Chronic respiratory diseases are high on the global health agenda. WHO has a mandate from the World Health Assembly to address the issue, and Member States give high priority to chronic respiratory diseases. GARD needs to prepare a comprehensive action plan and provide rational and integrated advice. Its work plans should be clear and unambiguous. Dr Beaglehole proposed that recommendations should be phased out and replaced by a stepwise approach in order to make best use of the additional resources which will be made available. The Framework Convention on Tobacco Control started with a simple approach and was transformed into a global action plan after a number of years.

However, it is important to create an integrated action plan with other chronic diseases, such as cancer, cardiovascular disease and diabetes. This is essential in low-income and middle-income countries, where separate action plans are not feasible, partly because of limited resources. Thus, the integrated approach should be extended to all chronic diseases, particularly since many of them share similar risk factors. It is more important to assess all diseases and risk factors globally than to determine risk factors individually.

GARD should be represented in all countries, although it is of particular interest to low-income and middle-income countries. More participants should be recruited from those countries. The gender balance among representatives should also be considered.

Dr Nikolai Khaltaev, Responsible Officer, Chronic Diseases Prevention and Management, WHO, said that the meeting was intended to formalize the GARD structure, organization and launch. The Alliance should focus on an integrated approach to chronic diseases, with chronic respiratory diseases as one component.

For this meeting, the participants nominated Dr Jean Bousquet, France and Dr Ronald Dahl, Denmark to serve as Co-Chairs and Dr Bruce Pfeifer, United States of America and Dr Paolo Matricardi, Italy, to serve as Co-Rapporteurs.

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\(^1\) World Health Assembly resolution WHA53.17 of 20 May 2000, endorsed by all WHO Member States (191 at that time).
2.1 GARD stepwise approach

GARD is to adopt a stepwise approach with short-term (Step 1), medium-term (Step 2) and long-term (Step 3) objectives and action plans (Fig. 1). Specific, measurable deliverables will be proposed for each step.

In Step 1, (2005-mid-2006), GARD will draw up a list of priorities and an action plan to be used by national coordination groups in order to build up a country-based approach (Fig. 2)

In Step 2, (mid-2006-end 2008), the integrated GARD action plan will be developed and pilot demonstration studies will be started in countries.

In Step 3, (2007-2010), the GARD action plan will be integrated into the global chronic disease action plan, adapted as necessary in the light of the pilot studies and implemented in a number of countries.

Fig. 1
GARD stepwise approach
3. Building and promoting the Alliance

During the first GARD meeting (WHO Headquarters, 18-19 January 2005), several proposals were made for building and promoting the Alliance. These proposals were updated and presented at the current meeting.

3.1 Participant profiles

Dr Eva Mantzouranis presented a template to be used as a guide for illustrating the profile of the GARD participant organizations. The information submitted should include the name of the organization, the year it was established, the president or contact individual within the organization, the title of the organization's official journal(s) (if any), the URL of its web site, its mission, the category of organization, the interest sections of its assemblies, the number of members and their representation in the WHO regions. The participants' profiles will be posted on the GARD web site.

Each organization will revise the draft sent by Dr Mantzouranis and sign an agreement form authorizing the information to appear on the GARD web site. Forms should be received by the WHO GARD secretariat office before the end of July 2005. The participants' profiles form part of the GARD Step 1 action plan (Fig. 2).

3.2 Atlas of chronic respiratory diseases

Work on the atlas will begin soon, but it will not be completed in the period covered by the Step 1 action plan.
3.3 GARD logo

Organizations are asked to propose an eye-catching logo for GARD before the end of June 2005. The proposed designs will be circulated and a decision will be taken at the next GARD meeting.

3.4 GARD web site

Dr Bruce Pfleger presented the new web site for chronic respiratory diseases, which is being developed at WHO. The main sections on the site will cover GARD, chronic obstructive pulmonary disease, asthma, other chronic respiratory diseases and publications. The home page includes information on the structure and financing of the Alliance and will include the participant profiles.

Various ways of navigating the WHO site were discussed, as were links to the developing site. The web site will list the GARD participants and provide links to their own web sites. Any site may link to WHO, as long as the link is not used for advertising or endorsement. WHO will only link to external partners if it is working closely with them.

The web site will be developed initially in English; it may be translated into one or more of the other five United Nations official languages in future, if the necessary resources become available. Documents and reports in English or other languages will be posted in PDF and HTML formats. Each document must be approved by the national coordinator of the originating country.

The launch of the GARD web site is part of the Step 1 action plan and should take place before 1 September 2005. The home page is shown in Fig. 3.

Fig. 3
GARD home page: http://www.who.int/respiratory/gard/en
3.5 Article in a scientific journal

Dr Bousquet agreed to draft a short paper about GARD for submission to a scientific journal (The Lancet and the British Medical Journal were suggested: Dr Bousquet proposed the New England Journal of Medicine).

3.6 Government and private-sector relations in preparation for the launch

Mr Igor Rozov (Government, Civil Society and Private Sector Relations, External Relations and Governing Bodies, WHO) explained that he and his colleagues had helped to launch a number of initiatives similar to GARD. On the basis of his experience, he raised a number of issues which stimulated further discussion.

3.6.1 Issues involved in planning the launch

A partnership must have an identified purpose and clear objectives, which must be accepted by the WHO Member States. For example, the Vision 2020 campaign, involving about 30 nongovernmental organizations and coordinated by the WHO Prevention of Blindness and Deafness unit, had stated early on that its purpose was to eliminate preventable blindness which, it is estimated, constitutes 80% of the overall burden.

When considering the financing needed to initiate a launch, the partnership must pay particular attention to long-term financing. This can best be achieved by linking the activities surrounding the launch with resource mobilization.

A memorable name is needed for the Alliance. Slogans such as “the right to sight” were used for Vision 2020. “GARD, the right to breathe” was suggested.

The communication campaign should be carefully planned in advance and include the following: a press kit, consisting of a press release and fact sheets; a video news release, prepared in advance and preferably involving prominent public figures; carefully planned media events, with the participation of prominent figures to attract media attention. A panel, consisting of around four experts and the Minister of Health of the host country, should hold a press conference for the launch.

The site of the launch is critical. It should be a major developing country, such as India or China, where the burden of chronic respiratory disease is high and GARD prevention and treatment initiatives could have a strong impact. The launch must enjoy the full support of the Government. Regional and public relations launches should follow. These help to bring the messages of the partnership before the targeted audiences.

Public relations campaigns are expensive, but WHO can conduct a campaign more effectively and at lower cost than external agencies. WHO has a list of 5000 media outlets for the press kit. A campaign including production of a press kit, translation into 1-5 languages, distribution of the kit, production of a video and monitoring of its exposure in the media would cost around US$50 000. A similar campaign using an external public relations organization would cost between US$220 000 and US$250 000.

Raising awareness is not enough by itself. A plan of action, targeted initially at 1-2 regions rather than globally, will coordinate better with the public relations campaign.

3.6.2 Discussion

A participant asked whether the launch would attract money for local action plans only, or also for regional or global use. One solution would be to ensure that a percentage of local funds goes to the region.
The location of the launch was discussed again. It was pointed out that a launch in Geneva would have some advantages: WHO’s presence would be obvious, some 250 press correspondents are located nearby, and some costs would be reduced. However, the advantages of launching in China or India were again stressed.

A final comment was made pointing out that the success or otherwise of a launch could not be predicted in advance: a high-impact global story, such as the Asian tsunami of December 2004, would inevitably dominate the media.

4. Country activities

4.1 Standardization of treatment: the WHO Stop TB approach

The Stop TB Partnership represents an alliance of various groups and individuals working in the field of tuberculosis, coordinated by the WHO Stop TB Department. Dr Salah-Eddine Ottmani of the Stop TB Department stressed the significance of tuberculosis around the world. Tuberculosis rates are still increasing, but globally the rate of increase is slowing down, albeit with considerable differences between countries.

Despite the great variations between health care systems, it is essential to follow universal standards of diagnosis and treatment. Diagnostic standards cover laboratory findings and the need to consider concomitant conditions (e.g. HIV/AIDS). Treatment should take a patient-centred approach, and patients’ response to therapy should be monitored. Standards should be consistent with tuberculosis guidelines: at present, however, there are around 80 different guidelines, which should be combined into an international standard.

All health care providers are responsible for providing adequate treatment and ensuring the best possible compliance. Treatment is now standardized, but a patient-centred approach should be developed for all patients. New and recurring tuberculosis cases and their treatment outcomes should be reported to local public health authorities in line with national legislation.

4.2 Practical Approach to Lung health (PAL) project in Tunisia

Dr Ali Ben Kheder reported the results of a PAL pilot study in Tunisia. PAL was officially approved by the Tunisian Government in December 2003, and a pilot study was carried out in four districts of Tunis: the baseline study was conducted in January-February 2004. The training period consisted of a two-day course for 73 general practitioners (of the 98 originally proposed). The impact study was carried out in March-April 2004 to assess the effect of training on the health of patients over five years of age with respiratory symptoms.

Selected results show that respiratory patients accounted for 36% of all patients in the baseline study and 31% of the patients in the impact study. At baseline, 58.3% of the patients had acute bronchitis; 34.3% acute upper respiratory infections; 4% asthma; 2.5% pneumonia; 1.4% chronic obstructive pulmonary disease; 0.2% tuberculosis.

When the patient population at the impact stage was compared with the baseline stage, significant increases were seen in diagnoses of asthma, chronic obstructive pulmonary disease and tuberculosis. Significant changes were also seen in the syndrome used for diagnosis (cough, dyspnoea, sputum). Referrals rose significantly, as well as requests for sputum smear examination. A significant decrease was observed in the number of drugs used per patient and the number of antibiotics prescribed, which resulted in an average cost saving of 19.3% on prescriptions. Total direct costs decreased as well.
4.3 Primary health centre survey in Cape Verde

Dr José Rosado Pinto described the health system in Cape Verde, which is well-developed in comparison with other sub-Saharan African countries. In particular, there are physicians in all primary health centres, and the hospitals are equipped for the management of patients with chronic respiratory diseases and allergies.

An epidemiological survey showed that the prevalence of asthma is around 8% in children. Five per cent of children admitted to paediatric emergency care units are asthmatic patients. A protocol for assessing the prevalence of major chronic respiratory diseases in Cape Verde has been drawn up by Isabella Annesi-Maesano, Nikolai Khaltaev and Paolo Matricardi. The Portuguese version of the protocol (adapted for local use in Cape Verde) was presented during the meeting.

A two-stage project is to be developed under the responsibility of WHO and the Ministry of Health, with Portuguese collaboration. The first stage will examine the prevalence of respiratory diseases, using a population-based survey of 4000 inhabitants. The survey will cover chronic obstructive pulmonary disease, asthma, allergic rhinitis, tuberculosis and pneumonia. Spirometry will be applied to a subsample. During the second stage, patients with respiratory symptoms will be evaluated by means of a questionnaire and spirometry measurement by both general practitioners and WHO-recommended respiratory experts. The problem of underdiagnosis and undermanagement of respiratory diseases at the primary health care level will be addressed. Future plans include expansion of the study to other Portuguese-speaking populations.

4.4 Primary health care survey in Ryazan (Russian Federation)

Dr Alexander Chuchalin reported on the results of the Primary Health Care survey carried out between October 2004 and March 2005 in Ryazan (Russian Federation) in close collaboration with Dr Nikolai Khaltaev. The Ryazan region is approximately 175 km south of Moscow. It is 39 600 km² in size. Its population is 1 306 600 (urban population: 68.4%). It is divided into 25 districts and includes 12 towns, 26 urban-type settlements and 456 rural administrations. The capital is Ryazan, with 536 900 inhabitants.

Two population centres, Scopin district with 40 000 people and Shilovo district with 60 000 people, were chosen to assess the prevalence of respiratory diseases. The region’s health care system consists of 104 hospitals, 65 outpatient clinics and 792 feldsher stations (a small clinic, usually with one medical assistant). A multistage study is underway to assess the burden of chronic respiratory disease. Lung function tests were carried out on around 45% of subjects. Risk factors were assessed.

A pilot study was conducted in October 2004 to finalize the questionnaire and protocol and recruit the necessary health professionals. A population-based survey was conducted in primary health care settings towards the end of 2004, involving residents over five years of age. The questionnaire covered symptoms, diseases, diagnoses, comorbidity, sociodemographics and risk factors. The survey was then conducted in households, likewise covering subjects over five years of age.

In February-March 2005, a clinical survey and lung function test were conducted in 16 randomly selected primary health care settings. All patients from the household stage were included. Selected results show that males are at far greater risk, owing to the high prevalence of smoking (60% of male adults and 8% of male children smoked) and exposure to dust at work (40% of males and 20% of females). The prevalence of dyspnoea, cardiovascular disease and chronic respiratory diseases is twice as high in women as in men. Sputum
production occurs in 14% of men and 4% of women. The prevalence of chronic obstructive pulmonary disease, at 1.6%, is similar to other parts of the Russian Federation. Low pulmonary function was found in 14% of the population. The underuse of asthma treatment is significant, since less than 1% of asthmatics were treated by inhaled corticosteroids. Theophylline was the most common drug administered.

5. GARD action plan

During the first GARD meeting (5) working groups were set up to develop an action plan, using existing materials from WHO or other action plans to meet the objectives of GARD. During the current meeting, Step 1 action plan deliverables were proposed for each working group so that they could be prepared by the end of 2005. The action plan will be used by national coordination groups in order to create a country-based approach (Fig. 4). Some proposals for Steps 2 and 3 were also put forward.

Fig. 4
From GARD action plan to national action plan

5.1 Working group 1: Burden, risk factors and surveillance of chronic respiratory diseases

*Chair: Dr Giovanni Viegi; Vice-Chair: Dr Sonia Buist*

This working group should work closely with working groups 2 and 6 on prevention and awareness. Dr Giovanni Viegi presented data based on the *European lung white book* (6). This book, produced by the European Respiratory Society, is a comprehensive survey of lung health. The text includes a preliminary inventory of studies indicating the prevalence of respiratory diseases and risk factors and a preliminary inventory of studies on the economic burden of disease. Dr Viegi also presented recent epidemiological data from the European Community Respiratory Health Survey, from the Obstructive Lung Disease in Northern
Sweden (OLIN) studies, and from the Po Delta and Pisa studies. He drew particular attention to the 2003 article in *Chest* by Halbert RJ et al. (7), which clearly showed that the WHO expert opinions on which the Global Burden of Disease report (8) is based may underestimate the true figure by up to a factor of 10. Finally, Dr Viegi presented a list of preliminary deliverables.

Important activities in the GARD epidemiology project include linking its results with similar efforts at WHO, such as the Surveillance of Risk Factors (SuRF) project which, in collaboration with the chronic respiratory diseases unit, is adding the chronic respiratory disease modules to its database, and the STEPwise approach to Surveillance of risk factors (STEPS) project. Methodologies must be standardized: epidemiology studies need to employ standard disease definitions and methods for diagnosis (at present, estimates of chronic obstructive pulmonary disease prevalence may be incorrect owing to a lack of uniformity). A comprehensive approach should be adopted, employing tools which also capture other diseases associated with the same risk factors, such as cardiovascular disease. The number of patients should be counted as well as the number of diseases, as the latter approach may mean that the same patient is counted more than once. Finally, Dr Viegi emphasized the usefulness of the Burden of Obstructive Lung Disease (BOLD) study (9) for capturing economic cost data.

### 5.1.1 Products available at WHO

- A standardized, validated questionnaire to assess national capacity for surveillance, prevention and control of chronic respiratory diseases.
- A methodology for collecting existing information on the prevalence of chronic diseases and their risk factors (Global InfoBase).
- A methodology for acquiring new information on the prevalence of chronic diseases and their risk factors (STEPwise approach).
- A methodology for assessing patients with respiratory symptoms at the primary health care level.

### 5.1.2 Deliverables proposed for Step 1

The first deliverables for Step 1 should include preliminary inventories of existing studies of prevalence rates of diseases and risk factors, and existing studies providing data on the economic burden of disease.

Dr Sonia Buist noted that better awareness of chronic respiratory diseases will actually increase the number of patients identified as having chronic respiratory disease, as well as the burden on health services, although one of the goals of GARD is to reduce the burden of chronic respiratory diseases. This point should be clearly stated when the long-term goals of GARD are proposed.

Dr Ali Kocabas gave details of the prevalence of chronic obstructive pulmonary disease in Adana, Turkey, taken from the BOLD study (9). Physicians diagnosed chronic obstructive pulmonary disease in 5.7% of adults over 40 years of age. However, if the criteria of the Global Initiative for Chronic Obstructive Lung Disease are used, there are indications of a very substantial underdiagnosis of this disease.

Dr Eva Mantzouranis gave an update on the chronic respiratory diseases module of the WHO Global Infobase. Asthma will be the first module to be added to the infobase, using data from the International Study of Asthma and Allergy in Children (ISAAC) and the European Community Respiratory Health Survey (ECRHS). There are considerable
differences in prevalence and incidence of asthma within a single country, and mean values may not be sufficient. The Global Burden of Asthma report (10) may be difficult to add to the module, because it gives the overall prevalence or incidence within a country. However, the figures from this document could be used for other purposes, such as the web site. For rhinitis, data from the ISAAC and ECRHS studies will also be used.

5.2 Working group 2: Health promotion and prevention of chronic respiratory diseases

Chair: Dr Michael Boland; Vice-Chair: Dr Adnan Custovic

Dr Michael Boland commented on health promotion and disease prevention. National governments have various priorities. GARD needs to create a situation where environmental control and a ban on tobacco smoking are at the top of the agenda. There is also a need to generate enthusiasm about the impact of GARD and convince the world that GARD is really going to make a difference to health. Chronic obstructive pulmonary disease is underdiagnosed and undertreated, and affects many poor people.

Dr Boland made some proposals for an optimal action plan at the country level. The national coordinator will be the champion of the campaign and should have some access to the Government or parliament. The national coordinator should have an appropriate support structure.

Everyone in the country – patients, physicians and legislators – should be educated about the importance of chronic respiratory diseases. Trade unions and workers’ representatives are the campaign’s natural allies, defending people’s right to work in a smoke-free environment. Public education campaigns must be conducted for several years in order to form public opinion before new legislation is adopted, and successes must be widely publicized.

Indoor air pollution is of great concern, since over 2 billion people in the developing world burn traditional biomass fuels indoors for cooking and heating and are thus exposed to health risks. WHO estimates that increased exposure in this group leads to an estimated 1.6 million premature deaths each year, largely among women and children. Chronic respiratory diseases are an environmental health issue. The Partnership for Clean Indoor Air (11) has the mission of improving health, livelihood and quality of life by reducing exposure to air pollution, primarily among women and children, from household energy use.

5.2.1 Products available at WHO

- A series of tools produced by the Tobacco Free Initiative for the implementation of the Framework Convention on Tobacco Control.
- A document on prevention of allergy and allergic asthma (12).
- The Indoor Air Pollution and Exposure Database: Household Pollution Levels in Developing Countries.

5.2.2 Deliverables proposed for Step 1

Tobacco ban action plan: the action plan for the Framework Convention on Tobacco Control and plans which have been successful at the country level (e.g. in Ireland) should be reviewed in order to identify simple measures which can be used at Step 1. The number of countries where GARD helps to implement tobacco-free initiatives and encourage ratification of the Framework Convention on Tobacco Control may provide an outcome measure for Step 3.
Improvement of indoor air quality in dwellings, in particular in developing countries, to reduce chronic obstructive pulmonary disease: tobacco smoke is a major cause of indoor air pollution in high-income countries. However, in many middle-income and low-income countries (e.g. China), chronic obstructive pulmonary disease is a major disease in nonsmoking women because of indoor heating and cooking in dwellings with insufficient ventilation. Simple proposals should be made to improve ventilation in new buildings and, where possible, in older ones (Step 1). Any barrier that may apply to this action plan should be discussed at both national and regional levels. For Step 2, GARD should produce a document on indoor air pollution.

Allergy prevention: the WHO publication on prevention of allergy and allergic asthma (12) was based on a WHO workshop in January 2002. For Step 2, an update will be proposed by members of working group 2.

5.3 Working group 3: Diagnosis of chronic respiratory diseases

Chair: Dr Klaus Rabe; Vice-Chair: Dr Sally Wenzel

The goal of this working group is to develop an integrated action plan for the diagnosis of chronic and related allergic respiratory diseases. However, this cannot be achieved in Step 1.

Dr Klaus Rabe presented a strengths/weaknesses/opportunities/threats (SWOT) analysis for the diagnosis of chronic respiratory diseases. The strengths are a broad approach, global backing, the prevalence of these diseases and the simple messages which can be disseminated about lung function and allergies. The weaknesses are the heterogeneity of chronic respiratory diseases, countries and providers. There are opportunities to combine our efforts, put chronic respiratory diseases on the global map, introduce pulmonary function tests for all and increase awareness of allergies. The threats are the timeless nature of the chronic disease problem, the issue of deliverables and implementation.

The Practical Approach to Lung health (PAL) is used in primary health centres. It is a syndromic approach to respiratory symptoms; however, where possible, objective methods should be added to supplement the symptomatic approach.

5.3.1 Products available at WHO

- Diagnostic algorithms in the PAL guidelines.

5.3.2 Deliverables proposed for Step 1

Availability and accessibility of pulmonary function tests for all patients is an essential part of GARD. Working group 3 should work closely with the Forum of International Respiratory Societies for this purpose and prepare a report by 31 December 2005.

Availability and accessibility of simple and affordable allergy tests is an important part of GARD. Working group 3 should prepare a report by 31 December 2005.

5.4 Working group 4: Control of chronic respiratory diseases and access to drugs

Chair: Dr Jean Bousquet; Vice-Chairs: Dr Eric Bateman, Dr Leonardo Fabbri, Dr Chris Van Weel

GARD’s principal role is not to devise new guidelines, but to catalogue existing guidelines and lend the authority of organizations and WHO to certain of them. The goal of this working group is to create an integrated action plan for the control of chronic respiratory and related allergic diseases, which should be implemented in Step 2.
5.4.1 *Products available at WHO*

- Practical Approach to Lung health (PAL) guidelines.
- Global Initiative for Treatment of Major Chronic Diseases (GIFT).

5.4.2 *Action plans.*

Action plans need to be tailored to low-income, middle-income and high-income countries or regions within countries.

In areas where communicable diseases are prevalent and primary health centres exist, the PAL approach will be used. The number of countries where this approach is implemented may be one of the deliverables for years 3 and 5.

In areas where there is also an HIV epidemic, the Practical Approach to Lung health in South Africa (PALSA) will be used. The number of countries where PALSA is implemented may be one of the deliverables for years 3 and 5.

In developed countries, PAL is only applicable to some low/middle-income areas. A comprehensive group of diseases should be considered, including asthma/rhinitis, chronic obstructive pulmonary disease and its related infections, occupational lung diseases, chronic respiratory diseases associated with sleep disorders and pulmonary vascular disease. Additional diseases can be added depending on the country.

The proposed group of experts should review the available management plans which have already been successfully introduced in various countries, and establish a list of priorities by 31 December 2005. For each disease, the group of experts will propose a list of up to six priorities.

The following process is proposed. For each disease, two or three experts will review the available management plans after the European Respiratory Society congress (Copenhagen, 21-22 September 2005). The final list of priorities will be drawn up by 30 October 2005 and will then be submitted to the group of experts (including health economists) by 15 December 2005.

Fig. 5

Distribution of diseases depending on the economic status of the country
5.4.3 Availability and accessibility of drugs for all patients with chronic respiratory diseases

This is essential. Members of this working group should meet the members of the Global Initiative for Treatment of Major Chronic Diseases (GIFT) and prepare a report by 31 December 2005. The working group should collaborate closely with the International Union Against Tuberculosis and Lung Disease, which is launching an important action plan on drug donations for asthma (beclomethasone and salbutamol).

5.4.4 National action plan coordination and coordinator

In order to initiate changes in action plans at the country level, coordination should take place between GARD and the national coordination group, leading to a national GARD action plan to be approved by the Minister of Health. Resulting action plans should be tested in selected countries, with success indicators. Implementation of the final action plan should begin by 2007.

The GARD action plan should be applied at the country level. There is therefore a need to establish working groups in the different countries, with a national action plan coordinator. The group will include members of societies of respiratory, allergic, paediatric, ear/nose/throat and occupational diseases; members of societies of internal medicine, general practitioners, public health (including pharmacoconomics) and lung health associations; other health care workers; patients and representatives from the Ministry of Health (Fig. 4).

The national coordination group will assess the needs of the country in question, review the GARD action plan and identify specific needs and proposals required to adapt it to the country’s needs and develop a country-specific action plan.

5.4.5 Deliverables proposed for Steps 1, 2 and 3

The following deliverables should be proposed: a written action plan for Step 1; an integrated action plan for Step 2; number of countries with a national coordination group (after one year (Step 1), three years (Step 2) and five years (Step 3)); number of countries where the GARD action plan has been approved by the Ministry of Health (after three years (Step 2) and five years (Step 3)); number of countries where the GARD action plan has been implemented (after five years (Step 3)).

5.5 Working group 5: Paediatric chronic respiratory diseases

Chair: Dr Carlos Baena-Cagnani; Vice-Chairs: Dr Erkka Valovirta, Dr Estelle F. Simons

The GARD action plan, as applied to children, should consider low-income, middle-income and high-income settings, and establish short-term, medium-term and long-term goals. The focus initially should be on asthma and rhinitis, the major chronic respiratory diseases in children.

An asthma management plan for children based on the inner-city asthma management plan will be used in low-income areas of developed countries and in suburban areas of developing countries. The deliverable will consist of a short action plan document (10 printed pages or shorter) (Step 1). In developed countries, the short-term action plan should list up to six priorities for asthma. The group of experts should review the available management plans which have already been successfully introduced in various countries, and establish a list of priorities for Step 1. Rhinitis is a significant comorbid condition of asthma in children, and should be taken into consideration as well. An integrated recommendation for diagnosing and treating asthma in schoolchildren should be prepared for Step 2. GARD should use data from the ISAAC phase III study for the prevalence of asthma and wheeze in children.
Epidemiological studies should begin in low-income areas where no data currently exist, in order to assess the prevalence and severity of childhood asthma. These studies should be discussed and proposed between the Working groups 1 and 5, at step 2. Management of recurrent wheezing in infants and in preschool children should be considered separately.

5.5.1 Products available at WHO

- None

5.5.2 Discussion

The GARD recommendations should cover the best available options, but alternatives should be included for low-income and middle-income countries. Research is needed to determine the prevalence and severity of asthma in areas where no data are available. More information and action plans are required about passive and active smoking in children, particularly in developing countries. Lung function tests cannot be performed in children under 5-6 years of age. Furthermore, many asthmatic children have normal pulmonary function tests. The importance of differential diagnosis was emphasized.

5.6 Working group 6: Awareness and advocacy for chronic respiratory diseases

Chair: Dr Claude Lenfant; Vice-Chairs: Mr Archie Turnbull, Dr Paul Van Cauwenberge

The two guiding questions for GARD in relation to awareness are “who should be aware?” and “what should they be aware of?”. There are three target populations to which GARD must effectively convey its message.

Governments have a critical role to play, and WHO is in a good position to address them. The World Health Assembly will not consider GARD in 2005, but could do so in future years. The Bulletin of the World Health Organization could also prove an effective medium.

Physicians, although not able to cure chronic diseases, are still the key to implementation of GARD. The pharmaceutical industry can play a big role in education. However, there should be rules governing the interaction between GARD and the private sector (5).

Patients and the general public remain the ultimate focus of GARD. The media and the Internet will be of great importance. Asthma has benefited from the fact that many famous athletes have competed on the world stage despite having the disease. Chronic obstructive pulmonary disease has not benefited the same way, partly because of the stigma associated with it, since patients have brought the disease upon themselves. Nevertheless, the use of celebrities to raise public awareness should be explored. Education of children can be very effective, as they can strongly influence their parents and raise issues which will lead to the message of GARD. We also need to involve “important people” to raise awareness of GARD.

There are 192 Member States of WHO, with enormous differences in economic status and health systems. It is impossible to reach them all with a single message. For example, spirometry is generally recommended for diagnosis, but most people in the world do not have access to it.

5.6.1 Products available at WHO

See references 1, 2, 3, 12, 13, 14, 15.
5.7 Research needs and genomics

There are many gaps in the understanding of chronic respiratory disease. Research is needed in order to assess the disease burden and risk factors more effectively, improve surveillance and identify better methods of diagnosis, control and prevention.

5.7.1 World Health Assembly resolution

At its fifty-seventh session in May 2004, the World Health Assembly adopted Resolution WHA57.13, in which it, inter alia: expresses the wish to promote the potential benefits of the genomics revolution for the health of populations in developed and developing countries alike; calls upon Member States to facilitate greater collaboration among all relevant partners; requests the Director-General to promote WHO’s role in collaboration with relevant partners, including the private sector, in convening regional and international forums, coordinating genomics research and facilitating exchanges between developed and developing countries; takes note of the recommendations in the report of the Advisory Committee on Health Research on genomics and world health (16).

5.7.2 Promotion of WHO’s role in genomics research and facilitation of exchanges between developed and developing countries

Envirogenomics of Chronic Obstructive Lung Diseases (GENOCOLD):

GARD, thanks to its network of scientific societies in the fields of respiratory medicine, allergy and immunology, is in a unique position to coordinate global research on the role of environmental factors in genomics (envirogenomics) of chronic obstructive pulmonary disease. WHO has recognized the importance of collaborative efforts in genomics to improve health in all countries, including developing countries. Since lung cancer is often related to the environmental factors involved in chronic obstructive pulmonary disease, it seems best to include both diseases in GENOCOLD.

GENOCOLD will also facilitate exchanges between developed and developing countries and, since standardized protocols will be used around the world, there will be a transfer of knowledge to developing countries.

Research conferences on respiratory disease: the Fifty-seventh World Health Assembly requested the Director-General to facilitate the exchange of knowledge about genomics between developed and developing countries. GARD is able to comply with this request by establishing research conferences on respiratory diseases. All the conferences should follow the same format.

Attendance:

- scientists with significant grants on the topic from around the world
- scientists from the private sector who are conducting major research activities on the topic
- at least 30% of the attendees will be from developing countries, with a focus on young scientists who do not necessarily hold a research grant
- members of funding organizations
- government representatives
- representatives of the private and public sectors, including major foundations.

The genomic aspect of the various topics will be discussed, but ethical and public health issues, as well as practical guidance, should form part of each conference. It is
proposed that the conferences should last for three days. On day 1, participants will discuss their own research. On day 2, small working groups will seek possible collaborations with scientists and laboratories from developing countries. On day 3, each working group will present its conclusions, with proposals for collaborative studies; ethical and public health issues; knowledge transfer to developing countries. Proceedings or a summary report will be published in a peer-reviewed journal. Some topics of interest have already been selected: genomics in asthma, prevention of allergy and asthma.

6. General discussion

The discussion of the reports of the working groups dealt with a number of important topics. Flexibility is of paramount importance for all GARD activities. Research is needed, particularly in relation to phenotypes and genetics.

Drug regulatory agencies should be represented, e.g. European Medicines Agency, United States Food and Drug Administration. Regional representatives and national coordinators are needed to provide stability for GARD. These should work with ministries of health, which have the power to change health care policy. Other ministries may be involved as well (e.g. environment, education, labour, research). Ministries should be asked to recommend national representatives to attend events.

A suggestion by Parliament to the Government that a national strategy group should be created was found to be important in some countries (e.g. Norway).

Working groups should involve nongovernmental organizations rather than individuals. Every working group should include patient representatives. Outreach action plans are needed for schoolteachers and school nurses.

7. Issues related to Terms of Reference

Dr Paolo Matricardi said that the number of GARD participants had increased from 16 in January 2005 to 38 in May 2005. More organizations are expected to join. All participants have voting rights during the General Meeting.

A Committee was elected for the period up to the launch, including Dr Nikolai Khaltaev (WHO GARD Secretariat), Dr Jean Bousquet (Chair), Dr Ronald Dahl (Co-Chair), Dr Eric Bateman, Dr Michael Boland, Dr Claude Lenfant, Dr Ruby Pawankar, Mr Archie Turnbull and Dr Erkka Valovirta.

Possible amendments to the terms of reference were discussed pending formal approval by the Office of the WHO Legal Counsel.

The Chair of the General Meeting, the Co-Chair, the WHO Secretariat and other members selected by the General Meeting will form the Planning Group. The participants of the meeting discussed the possibility of having an Executive Board, as part of the Planning Group, which will meet at least three times a year. The responsibilities of this Executive Board would consist of preparing the reports and proposals to be discussed by the Planning Group and preparing the agenda of the GARD General Meetings. The Planning Group will be elected at the next meeting. All the WHO regions should be represented.

Participants of GARD are encouraged to make an annual voluntary financial contribution. This contribution is essential for the efficient functioning of the secretariat and the Alliance as a whole. Some nongovernmental organizations with limited resources may not be able to contribute financially. However, others could contribute by providing human resources, e.g. seconding staff to GARD.
7.1 Discussion

GARD needs to be global and multidisciplinary. A wide representation on the Planning Group is very important. GARD is targeted at developing countries, so there should be representation from all WHO regions, but also from middle-income and low-income countries.

All major organizations should be represented on the Planning Group. It was proposed that the number of members should not exceed 12. There is no limit on the number of participants in the General Meeting.

Permanent and rotating members may be appointed (as is done in the European Commission’s Global Allergy and Asthma European Network). A balance must be maintained between specialists, regions, types of members and representation of developing countries.

The next General Meeting of GARD will take place in Beijing, People's Republic of China, in March 2006, immediately after the launch of GARD on 28 March.
8. References


9. List of participants

GARD participants

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Professor Ali BEN KHEDER, Ministère de la Santé publique, Hôpital A. Mami Ariana, 2080 Ariana, Tunisia, email: ali.benkhaleder@rns.tn

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Professor Jean BOUSQUET (Chair), Service des Maladies Respiratoires, INSERM U454, Hôpital Arnaud de Villeneuve, F-34295 Montpellier Cédex 5, FRANCE, email: bousquet@montp.inserm.fr

Dr A. Sonia BUIST, Pulmonary & Critical Care Medicine, Oregon Health & Science University, Mail Code UHN 67, 3181 SW Sam Jackson Park Road, Portland, OR 97239-3098, United States of America, email: buists@ohsu.edu

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Professor Ronald DAHL (Co-Chair), University Hospital of Aarhus, Dept of Respiratory Diseases, DK-8000 Aarhus, Denmark, email: rlahil@akh.aaa.dk

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Professor Ali KOCABAS, Turkish Thoracic Society (TTS), Chief, Department of Respiratory Medicine, Cukurova University School of Medicine, 01330 Balcali, Adana, Turkey, email: kocabasa@superonline.com

Dr ssa Giovanna LAURENDI, Direzione Generale della Prevenzione Sanitaria, Ufficio IX, Via della Civiltà Romana 7, 00144 Rome, Italy, email: g.laurendi@sanita.it

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World Health Organization

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Dr Leopold Joseph BLANC, Coordinator, Stop TB Department, email: blanc1@who.int

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Dr Serge RESNIKOFF, Coordinator, Chronic Diseases Prevention and Management (CHP/CPM), email: resnikoffs@who.int

Mr Igor ROZOV, External Relations Officer, External Relations and Governing Bodies, Government, Civil Society and Private Sector Relations (EGB/GPR), email: rozovi@who.int
Unable to attend:

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Professor Takeshi Fukuda, Asia Pacific Association of Allergology and Clinical Immunology (APAAACI), Dept of Pulmonary Medicine, Dokkyo University School of Medicine, 880 Kita-kobayashi, Mibu-machi, Tochigi 321-0293, Japan, email: t-fukuda@dokkyomed.ac.jp

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Professor Bruno Housset, Société de Pneumologie de Langue Française (SPLF), 66, boulevard Saint-Michel, F-75006 Paris, France, email: SPLF@splf.org

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Professor Pelka Puska, Director-General, National Public Health Institute (KTL), Mannerheimitie 166, FIN-00300 Helsinki, Finland, email: pelka.puska@ktl.fi

Professor Estelle R. Simons, American Academy of Allergy, Asthma and Immunology (AAAAI), University of Manitoba - Room AE101, 671 William Avenue, Winnipeg, MB R3E 0Z2, Canada, email: imcven@hsc.mb.ca

Professor Umberto Solimene, World Federation of Hydrotherapy and Climatotherapy, Via Ciegnara, 7, I-20129 Milan, Italy, email: umberto.solimene@unimi.it
# Annex: GARD Participants as of May 2005

<table>
<thead>
<tr>
<th>Name of Organization</th>
<th>Year established</th>
<th>Journal and Website address</th>
<th>Mission</th>
<th>Category (Int.Org./NGO/etc.)</th>
<th>Interest sections or assemblies</th>
<th>No. of members/partners and representation by WHO Region</th>
</tr>
</thead>
<tbody>
<tr>
<td>Allergic Rhinitis and its Impact on Asthma (ARIA). Chairman: Professor Jean Bousquet (<a href="mailto:aria@montp.inserm.fr">aria@montp.inserm.fr</a>)</td>
<td>1999</td>
<td><a href="http://www.whar.com">www.whar.com</a></td>
<td>To educate and implement evidence-based management of allergic rhinitis in conjunction with asthma worldwide, through planning, managing, and financing pilot projects to improve the health of broad sectors of the population throughout the world, setting up rural healthcare activities, providing support for preventive diagnostic and therapeutic measures as part of basic healthcare.</td>
<td>Nongovernmental organization in collaboration with WHO</td>
<td>200: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
<td></td>
</tr>
<tr>
<td>American Academy of Allergy, Asthma and Immunology (AAAAI). President-Elect: Professor Estelle Simons (<a href="mailto:simons@ms.umanitoba.ca">simons@ms.umanitoba.ca</a>)</td>
<td>1943</td>
<td>Journal of Allergy &amp; Clinical Immunology <a href="http://www.aaaaai.org">www.aaaaai.org</a></td>
<td>The advancement of the knowledge and practice of allergy, asthma and immunology for optimal patient care.</td>
<td>Nongovernmental organization</td>
<td>7 interest sections: Asthma Diagnosis and Treatment; Basic and Clinical Immunology; Environmental and Occupational Respiratory Diseases; Food Allergy, Dermatologic Diseases and Anaphylaxis; Health Care Education, Delivery and Quality; Mechanisms of Asthma and Allergic Inflammation; Rhinitis, Sinusitis and Ocular Diseases</td>
<td>6000 in Canada, United States of America and 60 other countries: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
</tr>
<tr>
<td>American College of Allergy, Asthma and Immunology (ACAII). President-Elect: William Dolen (<a href="mailto:bdolen@mail.mcg.edu">bdolen@mail.mcg.edu</a>)</td>
<td>1942</td>
<td>Annals of Allergy, Asthma &amp; Immunology <a href="http://www.acaai.org">www.acaai.org</a></td>
<td>To improve the quality of patient care in allergy and immunology through research, advocacy and professional and public education; maintain and advance diagnostic and therapeutic skills of members; sponsor and conduct educational and scientific programmes and publications; develop and disseminate educational information for members, patients, health-plan purchasers and administrators, and other physicians and health care professionals.</td>
<td>Nongovernmental professional association for allergists and immunologists</td>
<td>4900 allergists and immunologists: AMRO and possibly other regions through international affiliate membership</td>
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<tr>
<td>Organization</td>
<td>Year Founded</td>
<td>Website</td>
<td>Description</td>
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<tr>
<td>American Thoracic Society (ATS)</td>
<td>1905</td>
<td><a href="http://www.thoracic.org">American Journal of Respiratory and Critical Care Medicine</a>; <a href="http://www.thoracic.org">American Journal of Respiratory Cell and Molecular Biology</a>; <a href="http://www.thoracic.org">Proceedings of the American Thoracic Society</a></td>
<td>To prevent and treat respiratory disease through research, education, patient care and advocacy; to decrease morbidity and mortality from respiratory disorders and life-threatening acute illnesses in people of all ages, interacting with national and international organizations that have similar goals.</td>
<td></td>
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<tr>
<td>Asian Allergy and Asthma Foundation (AAAF)</td>
<td>2004</td>
<td><a href="http://www.thoracic.org">website in preparation</a></td>
<td>To advance excellent clinical practice of allergic diseases and to reduce their burden through education, training, research, cost effective treatment and public awareness through continuous dialogue with the health ministry and world organizations with the same goals.</td>
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<tr>
<td>Asian Pacific Association of Allergology and Clinical Immunology (APAACI)</td>
<td>1989</td>
<td><a href="http://www.apaaci.org">www.apaaci.org</a></td>
<td>To support the development of the discipline of allergy, asthma and clinical immunology in the region; to encourage and assist in forming national societies where none exist; to promote the exchange and progress of knowledge in the region; to study the prevention and treatment of allergy, asthma and immune-mediated diseases specific to the region; to promote exchanges in training programmes between member countries; to help cooperation between clinical and basic research; to develop programmes for public education; to cooperate with other international organizations with similar goals; to disseminate knowledge through international congresses and by other means.</td>
<td></td>
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<tr>
<td>Asian Pacific Society of Respirology (APSR)</td>
<td>1985</td>
<td><a href="http://www.apsresp.org">Respirology</a></td>
<td>To advance and promote knowledge of the respiratory system in health and disease; to strive to encourage research and improve clinical practice through teaching; to increase awareness of health problems in the area and to promote exchange of knowledge among respirologists in the Asia-Pacific region.</td>
<td></td>
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<tr>
<td>Organization</td>
<td>Year</td>
<td>Website</td>
<td>Mission</td>
<td>National/Regional Organization</td>
<td>Members/Partners</td>
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</tr>
<tr>
<td>Danish Lung Health Association (DLA), President: Charlotte Fuglsang</td>
<td>1901</td>
<td><a href="http://www.lungeforening.dk">www.lungeforening.dk</a></td>
<td>To improve prevention and treatment of lung diseases in Denmark and to help patients with these diseases (especially chronic obstructive pulmonary disease) in this country.</td>
<td>National nongovernmental organization</td>
<td>3493 members from the Faroe Islands and Greenland: EURO</td>
<td></td>
</tr>
<tr>
<td>Dokkyo University School of Medicine, WHO Collaborating Centre for Prevention and Control of Chronic Respiratory Diseases, Japan. Head: Professor S. Makino</td>
<td></td>
<td><a href="http://www.lungeforening.dk">www.lungeforening.dk</a></td>
<td>Terms of reference as WHO Collaborating Centre; Asia-Pacific Initiative for Chronic Respiratory Diseases.</td>
<td>WHO Collaborating Centre</td>
<td>SEARO, WPRO</td>
<td></td>
</tr>
<tr>
<td>European Academy of Allergy and Clinical Immunology (EAACI), President: Professor Anthony J. Frew</td>
<td>1956</td>
<td><a href="http://www.eaaci.net">www.eaaci.net</a></td>
<td>To promote basic and clinical research; assess and disseminate scientific information; function as a reference body for other scientific, health and political organizations; encourage and provide training and continuing education; promote good patient care for allergic and immunological diseases.</td>
<td>Nongovernmental, nonprofit organization for academicians, research investigators and clinicians</td>
<td>Sections for asthma, dermatology, otorhinolaryngology, immunology and paediatrics to improve information exchange and collaboration between scientists within and outside EAACI. Sections can propose task forces and joint sessions with other specialist societies.</td>
<td></td>
</tr>
<tr>
<td>European Centre for Allergy Research Foundation (ECARF), Head: Professor Dr. med. Torsten Zuberbier</td>
<td>2003</td>
<td><a href="http://www.ecarf.org">www.ecarf.org</a></td>
<td>To improve knowledge, research and awareness of allergies; decrease the burden of disease in patients and in society through structural research in allergy, spreading of excellence and knowledge among physicians and the public, initiatives for improving patient care, activities for a better quality of life for allergic patients.</td>
<td>Nongovernmental foundation</td>
<td>Collaboration with Allergy Centre Charité, specialized in clinical work, research and dissemination of knowledge in allergy: EURO</td>
<td></td>
</tr>
<tr>
<td>European Federation of Allergy and Airways Diseases Patients' Associations (EFA), President: Svein-Erik Myrseth</td>
<td>1992</td>
<td><a href="http://www.efanet.org">www.efanet.org</a></td>
<td>To improve the quality of life of people with asthma, chronic obstructive pulmonary disease and allergy and of their carers throughout Europe, contributing to a European community that shares the responsibility for substantially reducing the frequency and severity of these conditions and recognizes the social, environmental, economic and health implications.</td>
<td>Foundation</td>
<td>Alliance of 41 organizations in 23 countries in Europe representing 250 000 persons: EURO</td>
<td></td>
</tr>
</tbody>
</table>

Notes:
- **DLA**: Danish Lung Health Association
- **EAACI**: European Academy of Allergy and Clinical Immunology
- **ECARF**: European Centre for Allergy Research Foundation
- **EFA**: European Federation of Allergy and Airways Diseases Patients’ Associations
- **WHO Collaborating Centre**: World Health Organization Collaborating Centre
- **SEARO**: South-East Asia Regional Office of the World Health Organization
- **WPRO**: Western Pacific Regional Office of the World Health Organization
- **EURO**: European Region of the World Health Organization
<table>
<thead>
<tr>
<th>Organization</th>
<th>Year Established</th>
<th>Description</th>
<th>Collaboration</th>
<th>Activities</th>
</tr>
</thead>
<tbody>
<tr>
<td>European Respiratory Society (ERS)</td>
<td>1990</td>
<td>Promoting research; fostering education; exchanging knowledge; improving patient care.</td>
<td>Nongovernmental, nonprofit international medical organization</td>
<td>10 scientific assemblies serve as forum to present and discuss scientific work at yearly congress</td>
</tr>
<tr>
<td>Finnish Lung Health Association (FILHA)</td>
<td>1907</td>
<td>Training and education of management of chronic respiratory diseases; design, implementation of national programmes for diseases (asthma, chronic obstructive pulmonary disease, sleep apnoea), for smoking cessation (since 1994) and implementation of international project (tuberculosis); research, expert networking and human resource development.</td>
<td>National nongovernmental organization</td>
<td>WHO collaborating centre</td>
</tr>
<tr>
<td>Forum of International Respiratory Societies (FIRS)</td>
<td>2002</td>
<td>Advocacy for global respiratory health and identification of new areas for global initiatives. Aims to be attained by the consideration of needs and the proposal of related projects, implemented jointly or individually by the member organizations.</td>
<td>Cooperative union of international professional and scientific societies</td>
<td>Participating organizations include ACCP, ALAT, APSR, ATS, ERS, UNION and ULASTER.</td>
</tr>
<tr>
<td>Global Allergy and Asthma European Network (GA2LEN)</td>
<td>2004</td>
<td>To establish an internationally competitive network; to enhance quality and relevance of research and address all aspects of the disease; to decrease the burden of allergy and asthma throughout Europe. Activities consist of integration, coordination of scientific activities and spreading excellence.</td>
<td>Research network in allergy and asthma</td>
<td>Work packages include: nutrition, infection, environment and pollution, occupation, gender sensitization and allergic disease, airway remodelling, clinical care, genetics and genomics</td>
</tr>
<tr>
<td>Global Initiative for Asthma (GINA)</td>
<td>1991</td>
<td>Works with health care professionals and public health officials around the world to reduce asthma prevalence, morbidity and mortality. Through evidence-based guidelines for asthma management, and events such as the annual celebration of World Asthma Day, the Global Initiative for Asthma works to improve the lives of people with asthma in every corner of the globe.</td>
<td>Programme launched in collaboration with WHO and National Institutes of Health/National Heart, Lung and Blood Institute</td>
<td>Executive, Science and Dissemination Committees; national launch leaders</td>
</tr>
<tr>
<td>Organisation</td>
<td>Year</td>
<td>Website</td>
<td>Mission</td>
<td>Country</td>
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</tr>
<tr>
<td>Global Initiative for Chronic Obstructive Lung Disease (GOLD). Chair of Executive Committee: Dr A. Sonia Buist (<a href="mailto:buist@ohsu.edu">buist@ohsu.edu</a>), Chair of Scientific Committee: Suzanne Hurd (<a href="mailto:shurd@prodigy.net">shurd@prodigy.net</a>)</td>
<td>1998</td>
<td><a href="http://www.goldcopd.com">www.goldcopd.com</a></td>
<td>Increase awareness of medical community, public health officials and general public that chronic obstructive pulmonary disease is a public health problem; decrease its morbidity and mortality through implementing effective programmes for its diagnosis, management and prevention strategies for use in all countries and promoting studies into the etiology of its increasing prevalence.</td>
<td>Programme launched in collaboration with WHO and National Institutes of Health/National Heart, Lung and Blood Institute</td>
</tr>
<tr>
<td>Ghent University, WHO Collaborating Centre (GU-WCC) Dept. Respiratory Diseases. Director: Professor Guy Joos (<a href="mailto:Guy.Joos@UGent.be">Guy.Joos@UGent.be</a>)</td>
<td>1817</td>
<td><a href="http://www.ugent.be">www.ugent.be</a></td>
<td>To offer high-quality, research-based education; to play an important role in fundamental and applied research; to be an open, pluralistic, international institute with a social responsibility (full mission statement: <a href="http://www.ugent.be/en/ghentuniv/management/mission">www.ugent.be/en/ghentuniv/management/mission</a>).</td>
<td>WHO Collaborating Centre</td>
</tr>
<tr>
<td>Istituto di Ricovero e Cura e Carattere Scientifico (IRCCS) Scientific Director: Professor Sergio Bonini (<a href="mailto:sergio.bonini@sanraffaiele.it">sergio.bonini@sanraffaiele.it</a>)</td>
<td></td>
<td>No information available.</td>
<td></td>
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<tr>
<td>Institute of Neurobiology and Molecular Medicine National Research Council (CNR) Head: Dr Guido Rasi (<a href="mailto:guido.rasi@artov.inmm.cnr.it">guido.rasi@artov.inmm.cnr.it</a>)</td>
<td></td>
<td>No information available.</td>
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<tr>
<td>Interdisciplinary Association for Research in Lung Disease (AIMAR). President: Dr Claudio F. Donner (<a href="mailto:secreteria@aimarnetwork.org">secreteria@aimarnetwork.org</a>)</td>
<td>2001</td>
<td><a href="http://www.aimarnetwork.org">Multidisciplinary Respiratory Medicine</a></td>
<td>To prevent lung disease and promote lung health; to improve the quality of patient care by educating physicians and allied professionals and providing them with programmes and strategies for fighting lung disease such as asthma, chronic obstructive pulmonary disease, infections, tobacco and environmental pollution; to promote research on lung disease; to increase the awareness of public about lung diseases and their risks; to involve all decision-makers in campaigns to reduce environmental and tobacco pollution. To promote and maintain links with all societies and agencies interested in lung health, including patients’</td>
<td>Nonprofit interdisciplinary association for research in lung disease</td>
</tr>
<tr>
<td>Organization</td>
<td>Year Established</td>
<td>Description</td>
<td>Websites</td>
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<tr>
<td>International Association of Asthmology (INTERASMA)</td>
<td>1954</td>
<td>A forum for interdisciplinary discussions among pneumologists, allergists, paediatricians and general practitioners to exchange information on asthma research, practice and management; to focus on all aspects of asthma, bridging the gap between research and clinical practice; to encourage asthma education programmes for all health care professionals, educators and administrators; to improve the quality of life of asthmatics; to decrease the prevalence, morbidity and mortality of asthma.</td>
<td>INTERASMA News newsletter <a href="http://www.interasma.org">www.interasma.org</a></td>
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<tr>
<td>International Chronic Obstructive Pulmonary Disease Coalition (ICC)</td>
<td>1999</td>
<td>To improve care of chronic obstructive pulmonary disease patients through increasing awareness of the disease and an understanding of its diagnosis and management for both carers and patients. To create alliances with professional groups to accomplish these ends. To encourage and support national and regional groups in advocacy efforts toward policy-makers to prioritize chronic obstructive pulmonary disease in research and care.</td>
<td><a href="http://www.internationalcopd.org">www.internationalcopd.org</a></td>
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</table>

**Executive Committee, regional chapters:** AMRO, AFRO, EMRO, EURO, WPRO

**Nonprofit corporation; outreach of Global Initiative for Chronic Obstructive Lung Disease and the United States Chronic Obstructive Pulmonary Disease Coalition**

**International nongovernmental organization**
<table>
<thead>
<tr>
<th>Organization</th>
<th>Year</th>
<th>Website</th>
<th>Mission</th>
<th>Partners</th>
<th>Membership organization with partners in all regions of the world</th>
<th>Scientific groups in asthma, tuberculosis, tobacco prevention, nursing, child lung health</th>
<th>Partners include WHO tuberculosis programme; Stop TB Initiative; Global Fund to Fight AIDS, Tuberculosis and Malaria; Centers for Disease Control and Prevention: AFRO</th>
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</thead>
<tbody>
<tr>
<td>International Union Against Tuberculosis and Lung Disease (UNION)</td>
<td>1956</td>
<td><a href="http://www.iuatld.org">www.iuatld.org</a></td>
<td>To prevent and control tuberculosis and lung disease, particularly in low-income countries. To promote national autonomy, within the framework of priorities of each country; by developing, implementing and assessing antituberculosis and respiratory health programmes. To disseminate knowledge on tuberculosis, lung disease, HIV and resulting community health problems in order to alert doctors, decision-makers, opinion-leaders and the general public to the diseases' related dangers. To coordinate, assist and promote the work of its constituent members throughout the world. To establish and maintain close links with WHO, other United Nations organizations, governmental and nongovernmental institutions in health and development sectors.</td>
<td>Membership organization with partners in all regions of the world</td>
<td>Scientific groups in asthma, tuberculosis, tobacco prevention, nursing, child lung health</td>
<td>Partners include WHO tuberculosis programme; Stop TB Initiative; Global Fund to Fight AIDS, Tuberculosis and Malaria; Centers for Disease Control and Prevention: AFRO</td>
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<tr>
<td>Korea Asthma Allergy Foundation (KAAF)</td>
<td>2003</td>
<td>No information available.</td>
<td>National nongovernmental organization</td>
<td>Asthma, chronic obstructive pulmonary disease, critical pulmonology, endoscopy, interstitial lung diseases, lung infections, thoracic surgery, paediatric pulmonology, pulmonary circulation, respiratory pathophysiology, tuberculosis</td>
<td>286 members focusing on respiratory medicine and allergy, Republic of Korea</td>
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<tr>
<td>National Public Health Institute, Finland (KTL)</td>
<td>1911</td>
<td><a href="http://www.ktl.fi/portal/english">www.ktl.fi/portal/english</a></td>
<td>Governmental institute (under the Ministry of Social Affairs and Health), WHO Collaborating Centre</td>
<td>Finland: EURO</td>
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<tr>
<td>National Heart, Lung and Blood Institute (NHBLI), Division of Lung Diseases. Director: Dr James Kiley (<a href="mailto:kileyj@nih.gov">kileyj@nih.gov</a>)</td>
<td><a href="http://www.nhlbi.nih.gov">www.nhlbi.nih.gov</a></td>
<td>Programme on asthma and chronic obstructive pulmonary diseases includes goals on epidemiology, research, genetics and pharmacogenetics, clinical trials, demonstration and education initiatives.</td>
<td>Governmental organization</td>
<td>Active partner with Global Initiative for Chronic Obstructive Lung Disease and with WHO: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
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<tr>
<td>Portuguese Society of Allergology and Clinical Immunology (SPAIC). President: Mario Morais de Almeida (<a href="mailto:spaic@sapo.pt">spaic@sapo.pt</a>)</td>
<td>Revista Portuguesa de Imunoalergologia <a href="http://www.spaic.pt">www.spaic.pt</a></td>
<td>To prevent and treat allergic diseases through research, education, patient care and advocacy. To decrease morbidity and mortality from allergic and respiratory disorders, including asthma, in people of all ages, interacting with national and international organizations that have similar goals.</td>
<td>Nonprofit, nongovernmental, national, professional and scientific society for allergic and respiratory care medicine</td>
<td>12 specialized interest sections: aerobiology, allergy and asthma in sports, asthma, drug allergy, epidemiology, food allergy, immunotherapy, insect venom allergy, latex allergy, primary immunodeficiency, skin allergy, rhinitis</td>
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<td>1950</td>
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<td>355 active members: EURO</td>
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<td>Russian Society of Pulmonologists (RSP). President: Professor Alexander G Chuchalin (<a href="mailto:Chuchalin@inbox.ru">Chuchalin@inbox.ru</a>)</td>
<td>No information available.</td>
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<td>Respiratory Society of French Speaking countries (SPLF). President-Elect: Professor Philippe Godard (<a href="mailto:president-SPLF@splf.org">president-SPLF@splf.org</a>)</td>
<td>Revue des maladies respiratoires, Info-Respiration <a href="http://www.splf.org">www.splf.org</a></td>
<td>To promote all aspects of research in the field of lung diseases; to educate health professionals and patients in order to increase quality of care and awareness; to elaborate programmes for screening, prevention and treatment of lung diseases such as asthma, chronic obstructive pulmonary disease and occupational diseases; to interact with respiratory health officials in order to produce evidence-based guidelines.</td>
<td>Society</td>
<td>22 working groups involved in the preparation and conduct of a yearly congress</td>
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<td>1916</td>
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<td>Over 1500 members from various French-speaking countries (central and eastern Europe, African and Asian countries): AFRO, EURO, WPRO</td>
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<tr>
<td>Société Francaise d’Allergologie et d’Immunologie Clinique (SFAIC). President: Professor Gabrielle Pauli (<a href="mailto:Gabrielle.Pauli@chru-strasbourg.fr">Gabrielle.Pauli@chru-strasbourg.fr</a>)</td>
<td>No information available.</td>
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<tr>
<td>Organization</td>
<td>Year</td>
<td>Website/URL</td>
<td>Mission and Goals</td>
<td>Type</td>
<td>Scientific Working Groups</td>
<td>Memberships and Activities</td>
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<td>Turkish Thoracic Society (TTS)</td>
<td>1992</td>
<td>Turkish Respiratory Journal</td>
<td>To provide the most effective scientific methods for prevention, control and treatment of respiratory diseases, and to increase national respiratory health through patient care, research, education and promotion of national policies.</td>
<td>National, nonprofit educational and scientific society</td>
<td>14 scientific working groups</td>
<td>1500 members, 15 branches throughout Turkey: EURO</td>
<td></td>
</tr>
<tr>
<td>World Allergy Organization (WAO)</td>
<td>1950</td>
<td>Journal of World Allergy Organization, International Archives of Allergy &amp; Immunology</td>
<td>To build a global alliance of allergy societies to advance excellence in clinical care, research, education and training.</td>
<td>Worldwide nongovernmental organization; member of Council for International Organizations of Medical Sciences; working relationship with WHO</td>
<td>Federation of 70 national, regional and affiliate organizations</td>
<td>Total individual membership of member societies over 38,000, representing 92 countries: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
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<tr>
<td>World Federation of Hydrotherapy and Climatotherapy (FEMTEC)</td>
<td>1937</td>
<td><a href="http://www.femteconline.com">www.femteconline.com</a></td>
<td>To explain the medical spa world; to promote it in an international context among States and governing bodies; to encourage international cooperation between spas; to exchange studies, research and practices in the field of hydrotherapy; to promote development of medical spas and climatic resorts among members and worldwide.</td>
<td>Nongovernmental organization in official relations with WHO since 1985</td>
<td>2,500 medical centres involved in activities; once a year, general meeting of Executive Board; meeting of the four permanent committees - medical, economic, technical and social</td>
<td>35 members: thermal and medical spa associations, federations and organizations dealing with spa problems from various countries: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
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<tr>
<td>World Organization of Family Doctors (WONCA)</td>
<td>1972</td>
<td><a href="http://www.globalfamilydoctor.com">www.globalfamilydoctor.com</a></td>
<td>To improve the quality of life of peoples of the world through defining and promoting its values; by maintaining high standards of care in general practice/family medicine; by promoting personal, comprehensive and continuing care for the individual in the context of the family; by supporting development of academic organizations of general practitioners/family physicians; by providing education to members; by presenting educational, research and service activities of members in other world medical and health organizations.</td>
<td>Nongovernmental organization in official relations with WHO</td>
<td>Governing council meets every three years; regional councils in each region; executive committee meets annually</td>
<td>97 member organizations in 79 countries, total membership over 200,000 general practitioners and family physicians: AFRO, AMRO, EMRO, EURO, SEARO, WPRO</td>
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