



**STRUCTURED SURVEY REPORT**

**1. VERSION**

**End of data gathering: March 2009**

**STRUCTURED SURVEY OF THE MOST SIGNIFICANT  
ASEAN-EU S&T RELATIONS**

Laczó-Dávid, Á., Kardon, B.  
Zsár, V., Jeney, N.

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## Abstract

**The Structured Survey Report of the Most Significant ASEAN-EU S&T Relations interprets the scientific relations of the 12 participating countries of SEA-EU-NET. It consists of a review about the scientific landscape and the bilateral connections of every partner country and a final analysis about their multilateral and bilateral connections.**

*Keywords: bilateral S&T co-operation, multilateral S&T co-operation, FP7 countries, ASEAN countries, scientific landscape, fields of co-operation*

## Introduction

The SEA-EU-NET project has been set up to expand scientific collaboration between Europe and Southeast Asia. Its aim is to increase the quality, quantity, profile and impact of Science and Technology (S&T) cooperation between the member countries of the Association of Southeast Asian Nations (ASEAN) and the Member- and Associated States of the EU Seventh Framework Programme for Research and Technological Development (FP7).

The structured survey report interprets the scientific relations of the 12 participating countries (Austria, France, Germany, Hungary, Indonesia, Malaysia, the Netherlands, Poland, Singapore<sup>1</sup>, Thailand, Turkey, the UK and Vietnam) of SEA-EU-NET. It consists of a review about the scientific landscape and the bilateral connections of every partner country and a final analysis about their multilateral and bilateral connections.

Multilateral relations between South-East-Asian countries and FP7 countries were examined on the basis of the collaboration in the frame of the last two Framework Programs of the European Union for Research and Technological Development – FP6 and FP7. The number of projects involving SEA countries as well as the thematic areas of co-operation were investigated.

Bilateral co-operation schemes were analysed on the basis of a questionnaire containing general science & technology policy issues, bilateral S&T Agreements, financial information and thematic priorities of the co-operation. The second part of the survey was a project inventory, a list of bilateral projects with data about co-operating partners, institutions and thematic areas.

As far as the main findings of the questionnaire served as background information about the scientific landscape of the partners, the aim of the analysis of the inventory was to define co-operation areas of mutual interest. Generally speaking the main conclusion was that bilateral co-operation still significantly exceeds regional collaboration

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<sup>1</sup> Singapore currently does not participate in the project. The British High Commission in Singapore provided us with some data.

## Tools and Methods

### ***Bilateral S&T co-operation – questionnaire of mapping exercise***

Co-operation based on bilateral intergovernmental S&T agreements was analysed on the basis of a QUESTIONNAIRE.

The questionnaire was sent to all SEA-EU-NET project participants. It contained information about:

- General science & technology policy issues
- Bilateral S&T Agreements
- Details about the cooperation
  - financial information
  - thematic priorities

An inventory a list of bilateral projects with data about co-operating partners, institutions, thematic areas was attached to the questionnaire.

### **Web research**

In some cases the questionnaire of mapping exercise was not properly filled in or not filled in at all. In these cases we tried to fill the gaps by data, published on the web. As the quality and quantity of information on the web is quite different, the depth of the content of the country reports may also differ.

### **Timeline**

Designing and constructing the questionnaire started at the beginning of February 2008. The project coordinator along with the work package leaders made justification on the content of the questionnaire in Potsdam on 22 April 2008. The questionnaire was sent to SEA-EU-NET project participants in May.

The deadline for sending back the questionnaires was the middle of July, but unfortunately the success rate was very low. Finally the data gathering ended in March 2009.

### **Evolutionary perspective**

The survey itself has an evolutionary perspective. It means two different things: on the one hand we try to broaden the scope of the survey. The final aim is to cover the two whole regions as much as possible. On the other hand we want to refine the information we receive. For these purposes we send out a revised questionnaire every year.

### ***Multilateral S&T co-operation – statistics of the Framework Programs***

Multilateral relations between South-East-Asian countries and FP7 countries were examined on the basis of the collaboration in the frame of FP6 and FP7. The number of projects involving SEA countries as well as the thematic areas of co-operation were also investigated.

**Status of the questionnaires sent back by the participant countries of SEA-EU-NET till the 31<sup>st</sup> of March 2009**

	Austria	France	Germany	Hungary	Indonesia	Malaysia	Netherlands	Poland	Singapore***	Thailand	Turkey**	UK	Vietnam
More than one completed questionnaire with all the important data							X						
One completed questionnaire with all the important data	X	X	X	X	X			X					
More than one completed questionnaire – some important data is missing*										X			
One completed questionnaire – some important data is missing*									X				
No filled in questionnaire**						X					X	X	X

\*Usually the inventory or budgetary data is missing. In some cases the wrong (WP4) questionnaire was filled in and sent to us.

\*\*Turkey let us know that they do not have active S&T agreements with ASEAN countries, so they are not able to interpret the questionnaire.

\*\*\*Singapore does not participate in the project. BHC provided us with some data.

**Austria**

Status: One completed questionnaire with all the important data  
Respondent institution: Federal Ministry of Science and Research

**France**

Status: One completed questionnaire with all the important data  
Respondent institution: Ministry of Higher Education and Research, Ministry of Education

**Germany**

Status: One completed questionnaire with all the important data  
Respondent institution: International Bureau of the Federal Ministry of Education and Research

**Hungary**

Status: One completed questionnaire with all the important data  
Respondent institution: National Office for Research and Technology

**Indonesia**

Status: One completed questionnaire with all the important data  
Respondent institution: State Ministry of Research and Technology

**Malaysia**

Status: No filled in questionnaire  
Only NML-SIRIM has contacted us, but they have no responsibility. From MOSTI no response at all.

**Netherlands**

Status: More than one completed questionnaire

1. Respondent institution: Netherlands Organisation for Scientific Research - One completed questionnaire with all the important data
2. Respondent institution: Royal Netherlands Academy of Arts and Sciences – the wrong (WP4) questionnaire was filled in and sent to us.
3. Respondent institution: SenterNovem. Completed questionnaire but the inventory is missing.

**Poland**

Status: One completed questionnaire with all the important data (some budgetary information is missing)  
Respondent institution: Ministry of Science and Higher Education

**Singapore**

Status One completed questionnaire – some important data is missing: the inventory is missing.  
Singapore does not participate in the project. BHC helped us to get some data from ASTAR.

**Thailand**

Status: More than one completed questionnaire – some important data is missing

1. Respondent institution: National Science and Technology Development Agency – the inventory is missing

2. Respondent institution: Ministry of Science and Technology: the wrong (WP4) questionnaire was filled in and sent to us.

**Turkey**

Status: No filled in questionnaire:

Turkey let us know that they do not have running projects with ASEAN countries, so they are not able to interpret the questionnaire.

**UK**

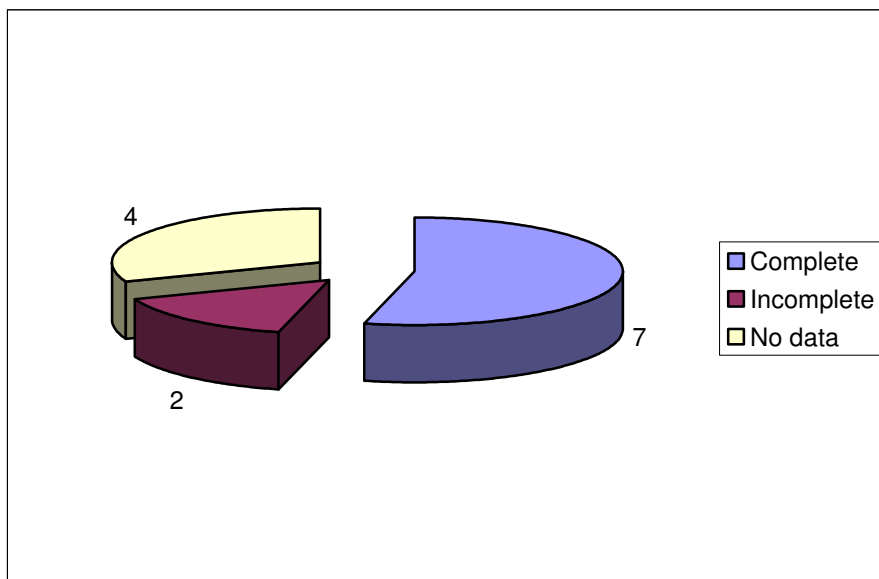
Status: No filled in questionnaire.

Our project partner has moved from Demos to the Royal Society at the end of 2008.

**Vietnam**

Status: No filled in questionnaire, but already 10 feedbacks from institutions in Vietnam (WP4 questionnaire).

**Questionnaire Statistics:**



## Country reports

### AUSTRIA

*The data is based on the WP2 questionnaire filled in by the Federal Ministry of Science and Research*

#### **Institution: Federal Ministry of Science and Research**

Rosengasse 4

A-1014 Wien, Austria

Tel: +43 (0)1 531 20

Fax: +43 (0)1 53120-9099

[www.bmwf.gv.at](http://www.bmwf.gv.at)

#### **Contact person: Mr. Stephan Neuhäuser**

Senior Advisor

Tel: +431 53120 6714

Fax: +431 53120 816714

e-mail: [stephan.neuhaeuser@bmwf.gv.at](mailto:stephan.neuhaeuser@bmwf.gv.at)

#### **Description of the institution**

The Federal Ministry of Science and Research (BMWF) is in charge of strategic planning of Science and Technology policy in Austria. In co-operation with some agencies it also coordinates and executes S&T related issues.

BMWF consists of three directorates, one for Universities, one for Research and International Affairs and one for Administrative tasks with 12, 10 and 5 respective divisions.

#### **General Science and Technology policy issues**

The main actors in the development of the Science and Technology policy in Austria are the Federal Ministry of Science and Research, the Austrian Council for Research and Technology Development and the Federal Ministry of Transport, Innovation and Technology.

The main actors in carrying out research and development activity are the Universities, extra-University institutions (i. e. Austrian Academy of Sciences, Joanneum Research) and SMEs.

The main actors in financing research and development activity are the Federal Ministry of Science and Research, and the Federal Ministry of Transport, Innovation and Technology.

The main financial resources for research and development activity are the federal budget and corporate investment.

The Federal Government, usually represented by the Minister of European and International Affairs has the right to sign intergovernmental co-operation agreements.

#### **Science and Technology co-operation between Austria and the ASEAN countries**

Austria has a bilateral Science and Technology co-operation agreement with the following countries:

ASEAN countries	Starting date	Comments
Cambodia		<i>ASEA-UNINET</i>
Indonesia	1976 (MoU)	MoU between research ministries + <i>ASEA-UNINET</i>
Lao PDR		<i>ASEA-UNINET</i>
Malaysia		<i>ASEA-UNINET</i>



Myanmar		<i>ASEA-UNINET</i>
Philippines		<i>ASEA-UNINET</i>
Thailand	2004 (MoU)	MoU between research ministries + <i>ASEA-UNINET</i>
Vietnam	2005 (MoU)	MoU between research ministries + <i>ASEA-UNINET</i>

In Austria the main reasons for starting intergovernmental bilateral S&T co-operation with ASEAN partner countries are the possibility to learn new working methodologies, the possibility to establish contact for new project or co-operation opportunities and the support of national research. The main reasons that can hinder the co-operation are the language barrier, the lack of budget for travelling, staff and communication, the weak ties between research communities of the two regions as well as the wide cultural gap.

The main results of the co-operation were the enlargement of the collaboration network, the development of new technical and project management competences, the increase of knowledge on multilateral and bilateral co-operation instruments as well as the increasing volume of joint publications and technology transfer.

The following co-operation activities are supported by Austria:

		Cambodia	Indonesia	Lao PDR	Malaysia	Myanmar	Philippines	Thailand	Vietnam
Mobility*		X	X	X	X	X	X	X	X
Research*									
	Basic research		X					X	
	Applied research	X	X	X	X	X	X	X	X
	Experimental development								
Infrastructure*			X					X	X

\* In thousand Euro per project if indicated

The yearly budget – cared for by the BMWF – for all concerned countries within ASEA-UNINET is 80 000 Euro/year for mobility through extrabudgetary funding and approximately 232 000 Euro/year for projects-funding.

The projects of Austrian universities running in the frame of Memorandum of Understandings were funded with a total of 223 635 Euro (including projects in Pakistan, excluding mobility funding).

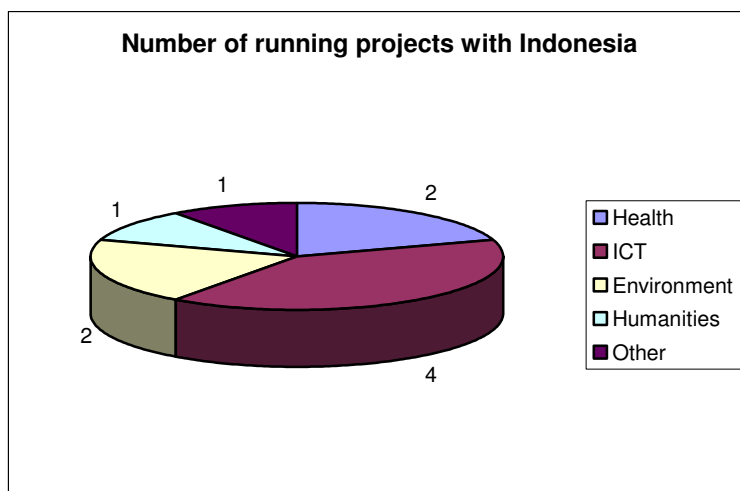
## Thematic areas of the running projects between Austria and the ASEAN countries

Austria has some comprehensive projects directed to the whole region: two in the field of Nanosciences, nanotechnologies, materials & new production technologies, one in the field of Health and one in the field of Socio-economic sciences and the humanities.

### Austria and **Indonesia**

On the one side Austria covers the mobility costs of Austrian scientists visiting Indonesia and Indonesian scientists visiting Austria (8 Austrian students in Indonesia, 8 Indonesian PhDs in Austria, 5 Indonesian students in Austria with North-South scholarship, 24 On-Place-scholarships).

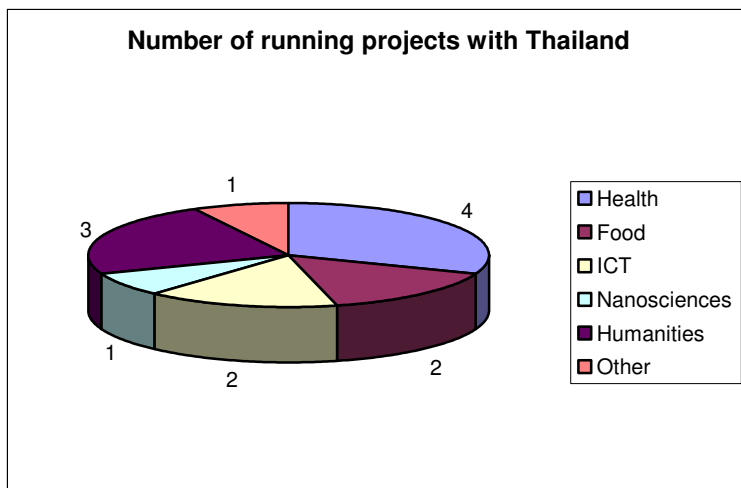
On the other side Austria finances the research activity itself. The thematic areas of the running projects with Indonesia can be seen in the diagram below.



### Austria and **Thailand**

On the one side Austria covers the mobility costs of Austrian scientists visiting Thailand and Thai scientists visiting Austria (11 Austrian students in Thailand, 13 Thai PhDs and one Post-Doc in Austria, 5 Thai students in Austria with North-South scholarship, 14 Thai students received 1-month-scholarships, 8 junior-scientist scholarships, 1 senior-scientist and 1 undergraduate scholarship for Austrians).

On the other side Austria finances the research activity itself. The thematic areas of the running projects with Thailand can be seen in the diagram below.



### Austria and **Vietnam**

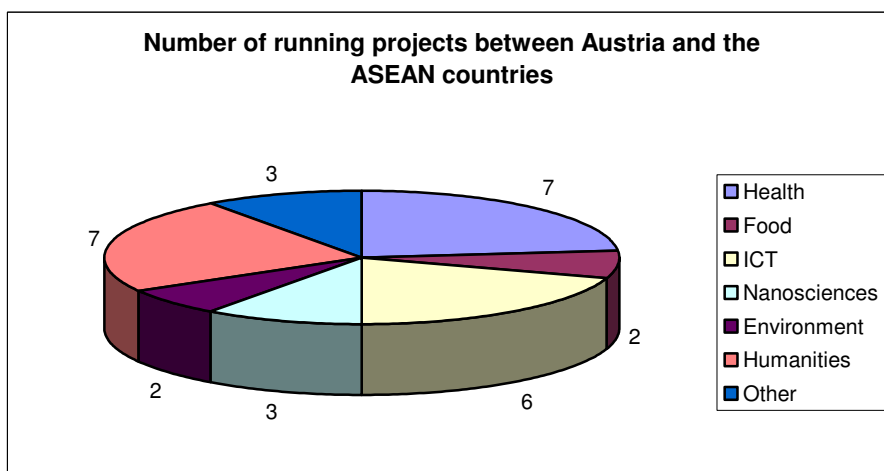
On the one side Austria covers the mobility costs of Austrian scientists visiting Vietnam and Vietnamese scientists visiting Austria (21 Austrian students in Vietnam, 8 Vietnamese PhDs and 3 Post-Docs in Austria, 10 Vietnamese students in Austria with North-South scholarship, 3 Vietnamese students received 1-month-scholarships including travel money).

On the other side Austria finances the research activity itself. The partners carry out one project in the field of Socio-economic sciences and the humanities and one in the field of music.

### Austria and the **Philippines**

On the one side Austria covers the mobility costs of Austrian scientists visiting the Philippines and Philippine scientists visiting Austria (20 Austrian students in the Philippines, 2 Philippine PhDs in Austria, 1 Philippine students in Austria with North-South scholarship, 2 Philippine students received 1-month-scholarships including travel money).

On the other side Austria finances the research activity itself. The partners carry out one project in the field of Socio-economic sciences and the humanities.



## FRANCE

*The data is based on the WP2 questionnaire filled in by the Ministry of Higher Education and Research, Ministry of Education*

### **Institution: Ministry of Higher Education and Research Ministry of Education**

110 rue de Grenelle

75357 Paris SP 07

Tel.: 01-55-55-10-10

<http://www.education.gouv.fr/>

#### **Contact person: Marc Goujon**

General inspector for administration

107 rue de Grenelle 75007 Paris

Tel.: 01 55 55 34 72

Fax.: 01 55 55 10 01

E-mail: [marc.goujon@education.gouv.fr](mailto:marc.goujon@education.gouv.fr)

#### **Description of the institution**

The ministry has two components, the Ministry of Education (Ministère de l'éducation nationale) and the Ministry of Higher Education and Research (Ministère de l'enseignement supérieur et de la recherche). In France the ministry is the main actor in Science & Technology policy making and Research & Development policy founding. Its task contains several things: planning and co-ordination S&T programs, execution and evaluation of R&D projects.

#### **General Science and Technology policy issues**

The main actor is the Ministry of Higher Education and Research in the development of S&T policy in France.

There are numerous actors who have a role in carrying out R&D activity. There are 49 research organisations, such as CNRS, INSERM, INRA, etc. Universities have to be also mentioned, regarding the fact that 82 universities and 32 other institutions are devoted to handle basic and applied researches on public funds.

The most important contributors in financing R&D activity are the state and several private companies. In this way the most important financial resources for R&D activity are the state budget and the input from private companies.

Intergovernmental co-operation agreements can be signed by ministers or directors who are chosen by the Secretary of State.

In France the cooperation programs which are based on bilateral S&T agreements are generally open to research institutes, universities, SMEs, entreprises and foundations as well.

#### **Science and Technology co-operation between France and the ASEAN countries**

France has a bilateral Science and Technology co-operation agreement with the following countries:

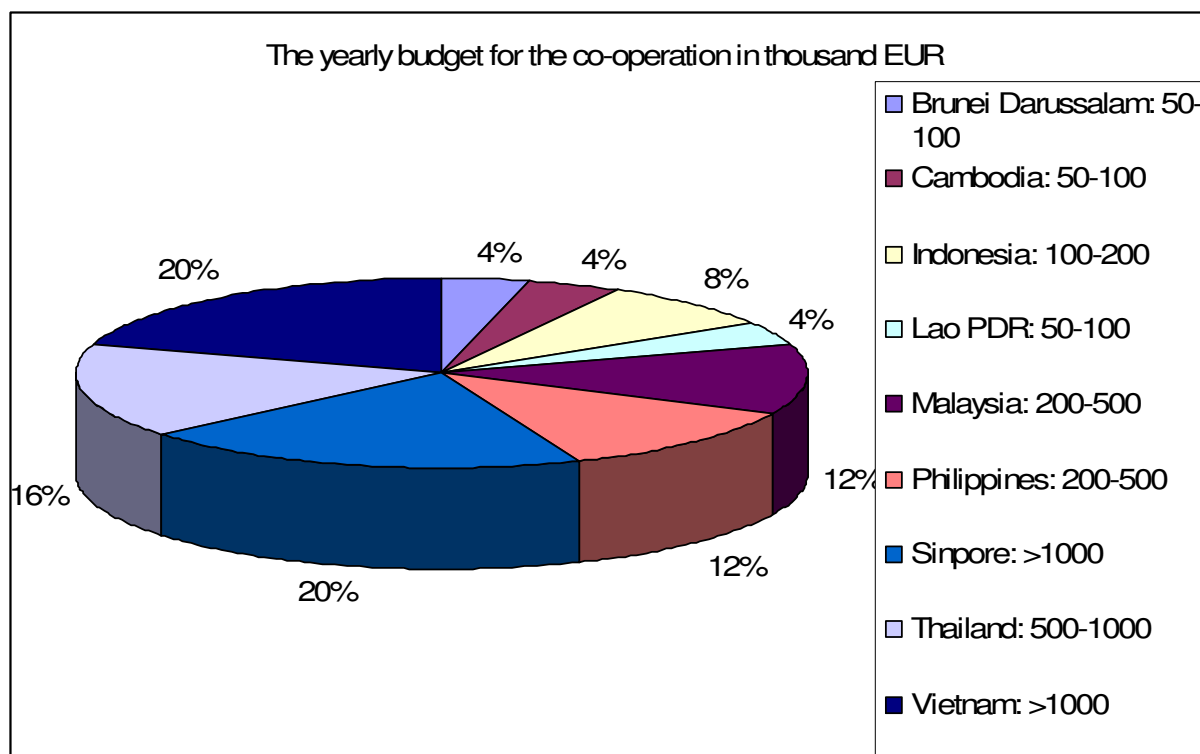
ASEAN countries	Starting date	Comments
Brunei Darussalam	2008	In preparation

Cambodia		
Indonesia		
Lao PDR		
Malaysia		
Philippines	1978	
Singapore		
Thailand		
Vietnam	1977	

In France the main reason for deciding to start intergovernmental bilateral S&T collaboration is the possibility to accede to financing instruments promoting STI co-operation. In addition, the optimisation the quality of work, the excellence of the partner country in a particular field or the possibility to establish contact for new project opportunities are substantial as well. The most common hindrances, which can embarrass international co-operation, are the fear of further workload, the impossibility to find a valid contact with the partner, and it is also true in several cases that international co-operation was not a priority for the partner organisation. There are some partly achieved results that the organisations obtained from the co-operation with ASEAN partners: increase of knowledge on multilateral and bilateral co-operation instruments, as well as joint publications. The facts that partners were not able to perform the requested activities or delay in partners feedbacks, not mentioning communication problems or budget problems were also partially problematic during the collaboration.

**The following co-operation activities are supported by France:**

	Mobility	Research			Infrastructure
		Basic research	Applied research	Experimental research	
Brunei Darussalam	X		X		
Cambodia	X			X	X
Indonesia	X		X		X
Lao PDR	X			X	X
Malaysia	X	X	X		X
Philippines	X		X		X
Singapore	X	X	X		X
Thailand	X	X	X		X
Vietnam	X	X	X	X	X



### Thematic areas of the running projects between France and the ASEAN countries

Title of the project	Field of co-operation	Cambodia	Lao	Malaysia	Philippines	Singapore	Thailand	Vietnam
<b>Aquilaria</b>	Environment	X	X					X
<b>Plantasafe</b>	Health						X	
<b>ACGRID</b>	ICT							X
<b>IDEA</b>	ICT			X				X
<b>SCOUT</b>	ICT	X						X
<b>Wooa!</b>	ICT				X	X	X	

**Aquilaria** - conservation of tree species belonging to the Aquilaria type

**Plantasafe**: ASian PLANT-derived drugs and hepatic SAFETY: studies to improve research transfer to applications in patients

**ACGRID** - Advanced Computing and GRID technologies for Research

**IDEA** - Images of natural Disasters from robot Exploration in urban Area

**SCOUT** - Survey of Catastrophes and Observation in Urban Territories

**Wooa!** - Wireless broadband Overlay network Architectures and Applications

In addition to these projects France has 4 other projects with Vietnam: 2 in the field of Environment, 1 in the field of Food and 1 in the field of Nanosciences.

## **GERMANY**

*The data is based on the WP2 questionnaire filled in by the International Bureau of the Federal Ministry of Education and Research*

### **Institution: International Bureau of the Federal Ministry of Education and Research**

c/o German Aerospace Center (DLR)  
Heinrich-Konen-Str. 1  
53227 Bonn, Germany  
Tel: +49(0)228-3821-437  
Fax: +49(0)228-3821-444  
[www.internationales-buero.de](http://www.internationales-buero.de)

**Contact person:** Mr. Christoph Elineau  
Scientific Officer  
Tel: +49(0)228-3821-437  
Fax: +49(0)228-3821-444  
e-mail: [christoph.elineau@dlr.de](mailto:christoph.elineau@dlr.de)

### **Description of the institution**

The International Bureau (IB) has been commissioned by the German Federal Ministry of Education and Research (BMBF) to strengthen the international ties of German universities, research institutes and enterprises with the ultimate goal of building competencies and fostering competitive advantages for industry and the research community in Germany in the areas of research and innovation. In doing so, the International Bureau is making an important contribution to cultivating an international dimension within the research programmes of the BMBF.

IB is responsible for project management issues on behalf of the Federal Ministry of Education and Research. It is financing mobility of researchers for international collaboration on behalf of BMBF.

### **General Science and Technology policy issues**

The main actors in the development of the Science and Technology policy in Germany are the Federal Ministry of Education and Research (BMBF), to some extent the German Research Council (Wissenschaftsrat) and the German Research Foundation (the central, self-governing research funding organisation).

The main actors in carrying out research and development activity are the universities (which are under responsibilities of the Länder) and four research organisations, each comprising several research institutions. These four organisations are: the Max Planck Society for the Advancement of Science (MPG), the Helmholtz Gesellschaft Deutscher Forschungszentren (HGF), the Fraunhofer Gesellschaft (FhG), and the Leibniz-Gemeinschaft (WGL).

The main actors in financing research and development activity are the Federal Ministry of Education and Research (BMBF), other Ministries (like the Ministry for Economy, the Ministry for Environment, the Ministry for Economic Cooperation), and the German Research Foundation (the central, self-governing research funding organisation).

67 % of R&D is funded by the industry. The 33% public share is divided between the Federal Government (BMBF) by funding research organisations and research programmes, the Länder by funding the Universities and the EU.

The Federal Ministry of Education and Research (BMBF) has the right to sign intergovernmental co-operation agreements, but it must act in accordance with the Ministry of Foreign Affairs.

### Science and Technology co-operation between Germany and the ASEAN countries

Germany has a bilateral Science and Technology co-operation agreement with the following countries:

ASEAN countries	Starting date	Comments
Indonesia	1979	Actively pursued by BMBF
Singapore	1994	Not published, not actively pursued by BMBF
Thailand*		Cooperation with NSTDA
Vietnam	1997	Actively pursued by BMBF, but not a real S&T agreement, rather a Memorandum of Understanding

\*On the basis of the data given by NSTDA

In Germany the main reasons for starting intergovernmental bilateral S&T co-operation with ASEAN partner countries are the possibility to establish contact for new project or co-operation opportunities, the possible solutions of global challenges and the access to specific research locations and subjects. The main reasons that can hinder the co-operation are the lack of information regarding the national context and competences of the main actors, the lack of information on financial tools for co-operation, the lack of scientific, technological excellence in specific fields as well as the physical and mental distance of EU researchers to South East Asia.

The main results of the co-operation were the enlargement of the collaboration network, the increasing number of joint publications, technology transfer, as well as the development of human capital for mutual benefit. Budgetary problems were the main problems during the co-operation process.

The following co-operation activities are supported by Germany:

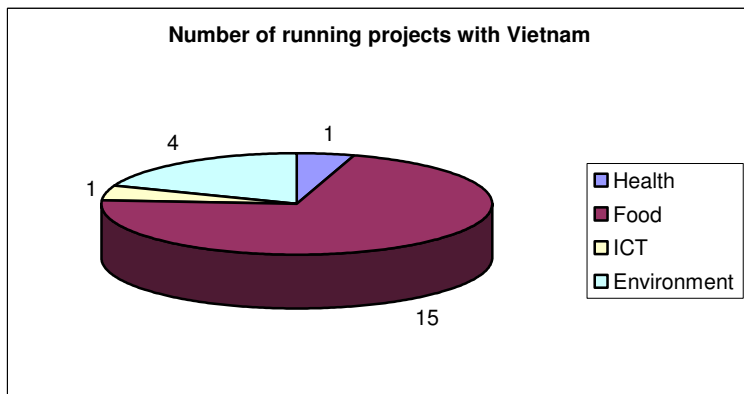
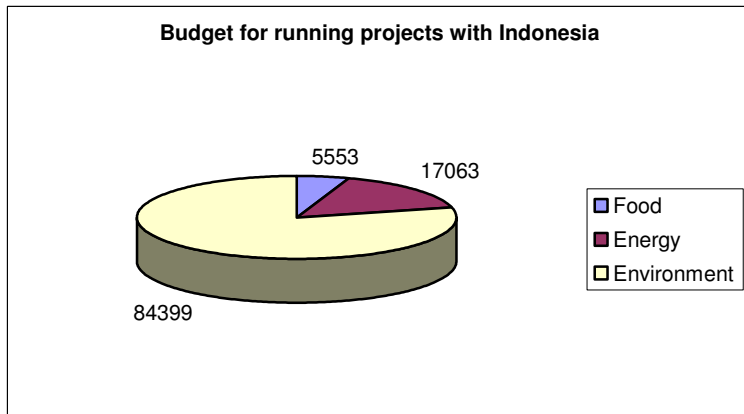
		Indonesia	Vietnam
Mobility*		15-20	15-20
Research*		500	1000
	Basic research	X	X
	Applied research	X	X
	Experimental development		

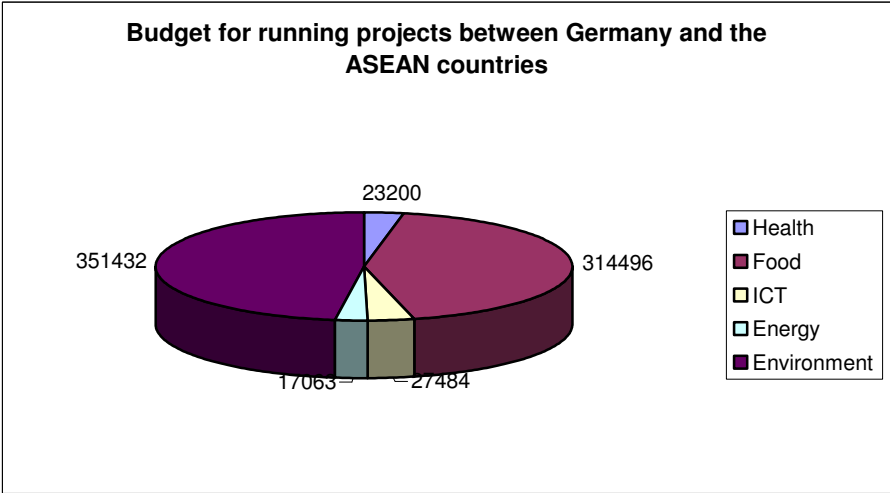
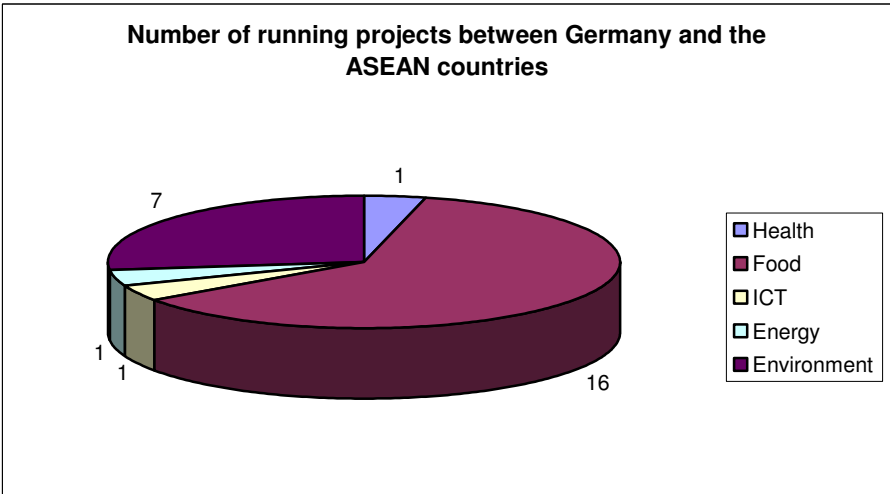
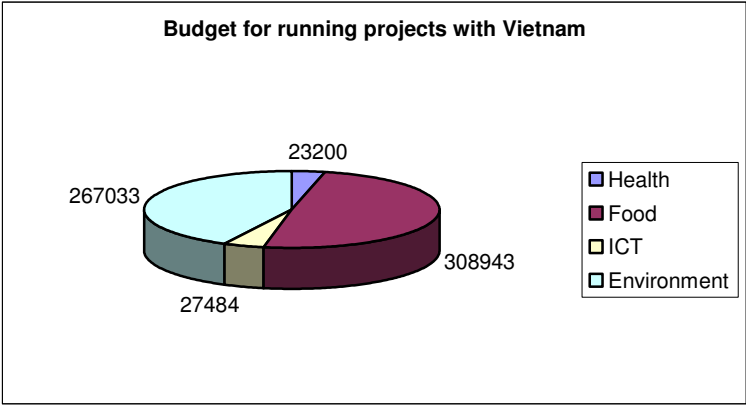


Infrastructure*		Tsunami Early Warning System as one major infrastructure project (40M €)	
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\* In thousand Euro per project if indicated

### Thematic areas of the running projects between Germany and the ASEAN countries





## HUNGARY

The data is based on the WP2 questionnaire filled in by the National Office for Research and Technology

### **Institution: National Office for Research and Technology**

1117, Budapest  
Neumann János u. 1/c  
Tel: (+361) 484 2500  
Fax: (+361) 318 7998  
[www.nkth.gov.hu](http://www.nkth.gov.hu)

### **Contact person: Mr. Sándor Szigeti**

Senior Counselor  
Tel: (+361) 484 2576  
Fax: (+361) 266 0801  
e-mail: [sandor.szigeti@nkth.gov.hu](mailto:sandor.szigeti@nkth.gov.hu)

### **Description of the institution**

NKTH is the main policy making and funding governmental agency for applied research and technological development in Hungary. Its task is the coordination of international co-operations and EU integration in the field of Science and Technology and innovation as well as the organisation and evaluation of research and development programs.

NKTH is an autonomous governmental agency, lead by a president, who reports to the minister without portfolio responsible for Science and Technology policy.

### **General Science and Technology policy issues**

The main actors in the development of the Science and Technology policy in Hungary are the Minister without portfolio for Science and Technology policy, the National Office for Research and Technology (NKTH), the Hungarian Academy of Sciences and the Ministry of Education.

The main actors in carrying out research and development activity are the institutes of the Hungarian Academy of Sciences, the universities, the Bay Zoltán Foundation for Applied Research, company research units and other research institutes.

The main actors in financing research and development activity are the National Office for Research and Technology, the Hungarian Academy of Sciences, the Ministry of Education, the Ministry of Health and the Ministry of Agriculture and Rural Development.

The main financial resources for research and development activity are the state budget (46%), the private sector (43%) and international resources (11%).

The Minister without portfolio for Science and Technology policy has the right to sign intergovernmental co-operation agreements.

### **Science and Technology co-operation between Hungary and the ASEAN countries**

Hungary has a bilateral Science and Technology co-operation agreement with the following countries:

ASEAN countries	Starting date	Comments
Malaysia	21 April 1997	
Singapore	9 October 2007	<i>Not intergovernmental, it is a co-operation</i>

		<i>between A*STAR and NKTH</i>
Thailand	29 November 1999	
Vietnam	20 July 2005	

In Hungary the main reasons for starting intergovernmental bilateral S&T co-operation with ASEAN partner countries are the possibility to establish contact for new project or co-operation opportunities and the scientific excellence of the partner country in a particular field. The main reasons that can hinder the co-operation are the lack of information regarding the national context and competences of the main actors as well as the lack of budget for travelling, staff and communication.

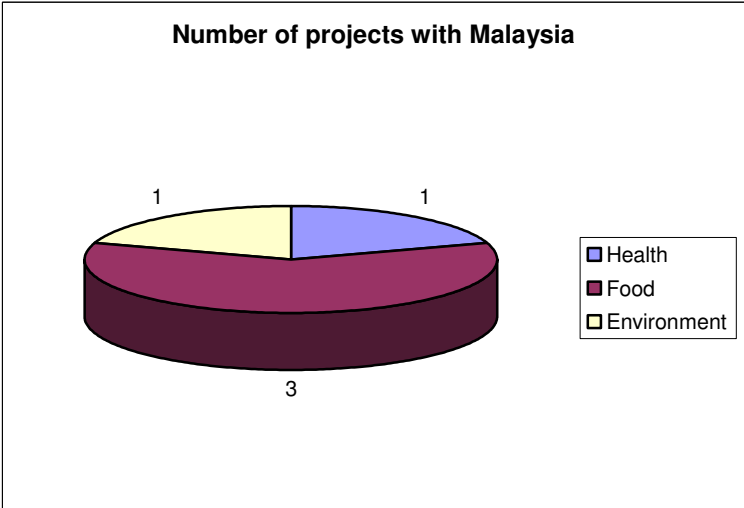
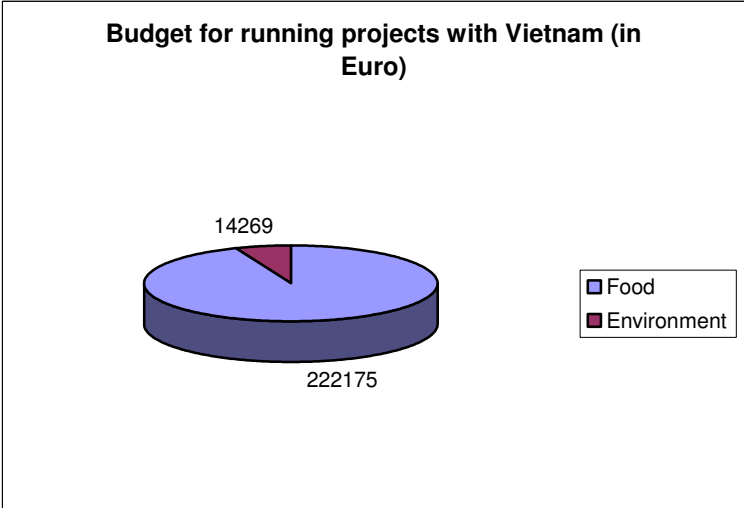
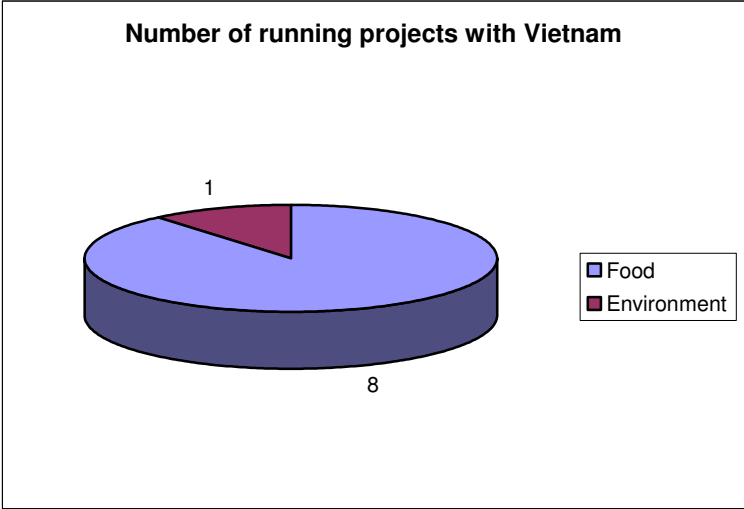
The main results of the co-operation were the enlargement of the collaboration network, the increase of knowledge on multilateral and bilateral co-operation instruments as well as the increasing number of joint publications. Complicated internal and external administrative procedures were the main problems during the co-operation process.

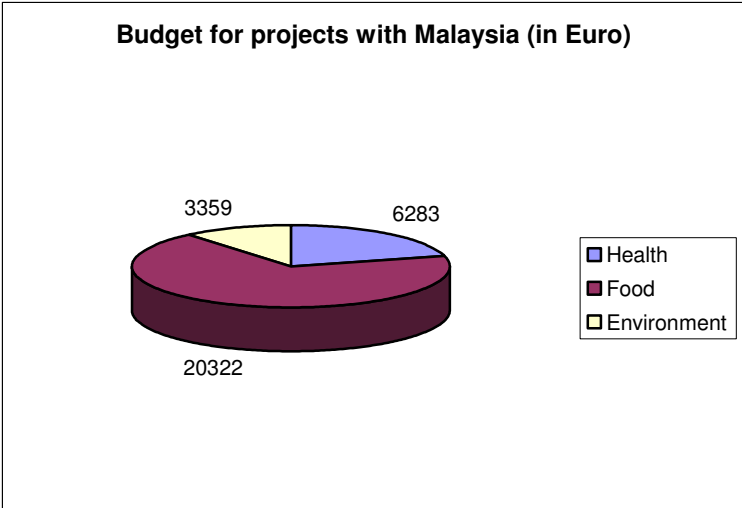
The following co-operation activities are supported by Hungary:

		Malaysia	Singapore	Thailand	Vietnam
Mobility*		10		10	30
Research*			200		
	Basic research	X		X	X
	Applied research	X	X	X	X
	Experimental development		X		X
Infrastructure*					

\* In thousand Euro per project if indicated

**Thematic areas of the running projects between Hungary and the ASEAN countries**



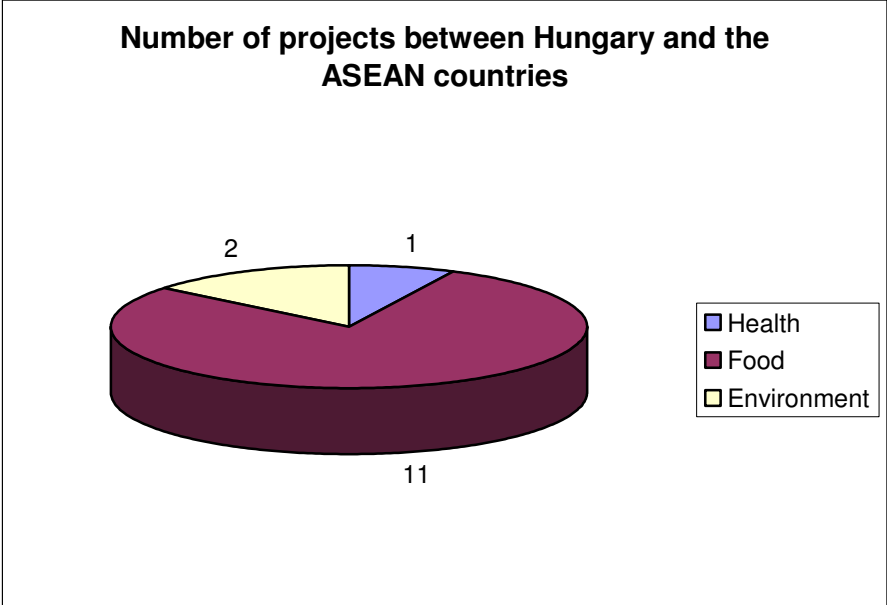


**Hungary and Singapore**

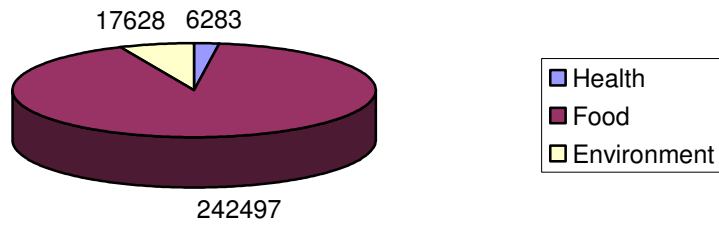
There is no intergovernmental scientific and technological agreement between Hungary and Singapore. The co-operation will be carried out under the framework of the Master Collaboration Agreement between A\*STAR and NKTH signed on October 9, 2007.

**Hungary and Thailand**

The last joint committee meeting was held in June 2002, no projects were funded.



**Budget for projects between Hungary and the ASEAN countries**



## INDONESIA

*The data is based on the WP2 questionnaire filled in by the State Ministry of Research and Technology*

### **Institution: State Ministry of Research and Technology – (RISTEK)**

Jl. M.H. Thamrin No.8 BPPT 2<sup>nd</sup> Building 6<sup>th</sup> Floor,

Jakarta Pusat Indonesia 10340

Tel: +62 21 316 9198

Fax: +62 21 310 1728

[www.ristek.go.id](http://www.ristek.go.id)

### **Contact person: Nada Marsudi**

Acting Director for International Research, S&T Programme

Tel: +62 21 316 9198

Fax: +62 21 310 1728

e-mail: [nada@ristek.go.id](mailto:nada@ristek.go.id)

### **Description of the institution**

The State Ministry of Research and Technology established in 1962 has the responsibility to assist the President of the Republic of Indonesia in formulating national policies and implementing coordination in the field of research, science and technology.

### **General Science and Technology policy issues**

The main actors in the development of the Science and Technology policy in Indonesia are the State Ministry of Research and Technology (whose task is to assist the President in formulating policies and coordinate research, science and technology fields and to conduct the management and development of the Center for Science and Technology) and the National Research Council (whose task is to assist the State Minister for Research and Technology in formulating the direction and the main priority of S&T development and the National Strategic Policy for Science and Technology).

The main actors in carrying out research and development activity are the Indonesian Institute of Sciences (LIPI), the Agency for the Assessment and Application of Technology (BPPT) and the universities.

### **Science and Technology co-operation between Indonesia and FP7 countries**

Indonesia has a bilateral Science and Technology co-operation agreement with the following countries:

EU countries	Starting date	Comments
Austria	29. November 2006	
France	1974	
Germany	20. March 1979	
Italy	20. October 1997	
Netherlands	11. February 2002	
Slovenia	30. November 2006	



In Indonesia the co-operation with European partner countries is of high intensity, the reasons for starting intergovernmental bilateral S&T co-operation with these countries is the possibility of networking and mobility of researchers, innovation benchmarking and the access to financing of research projects. Indonesia finds the access to international S&T knowledge, the increase of technology transfer, the exchange of research personnel, the increase in the research capabilities, in co-patenting, in scientific publications and the enlargement of the collaboration network with European countries very important.

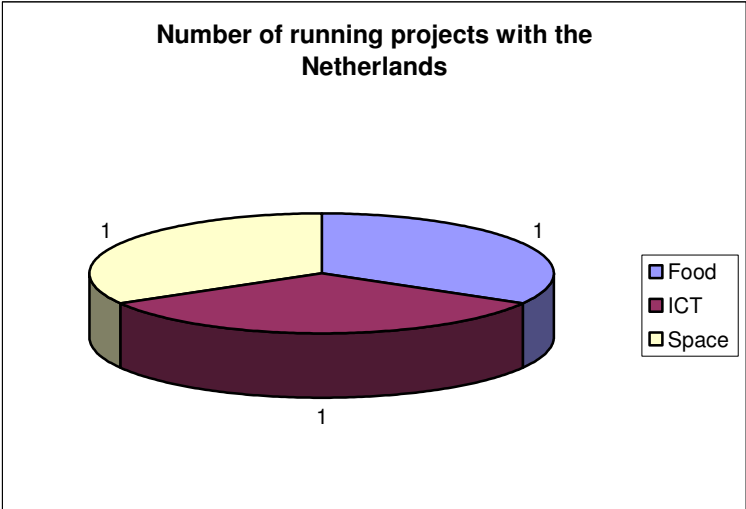
The main expectations of the scientific co-operation with European countries is the increase of the exchange of researchers, the increased number of international S&T conferences and the better access to financing for research projects. The main problems that can hinder further co-operation are the lack of information on financial tools for co-operation as well as the lack of budget for travelling or for the organisation of international conferences.

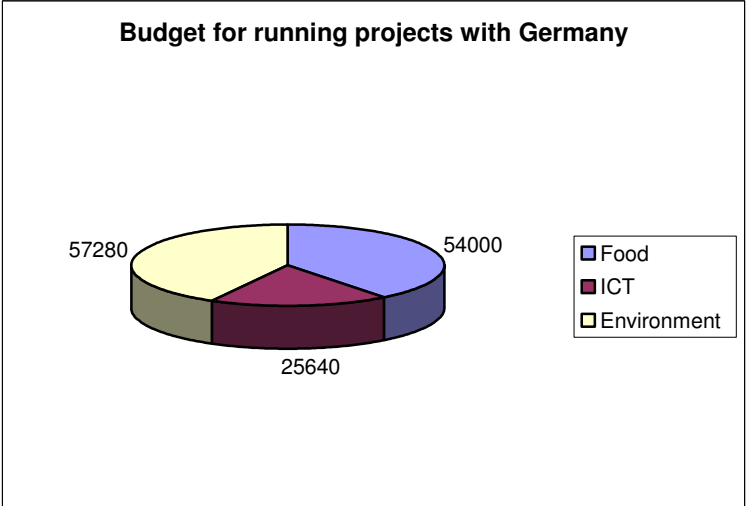
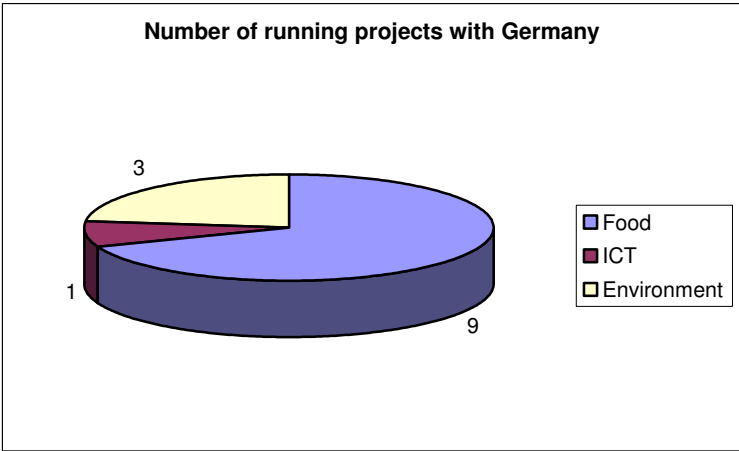
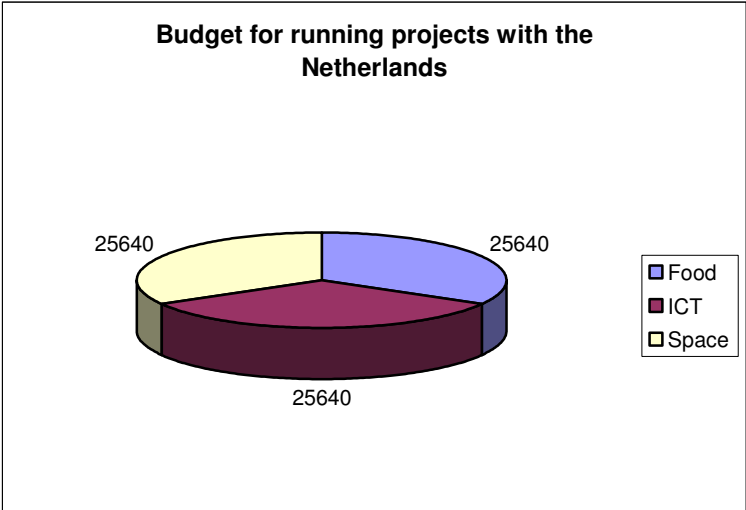
The following co-operation activities are supported by Indonesia:

		Germany	Italy	Netherlands
Mobility*		6	5	8
Research*		26	26	26
	Basic research	X	X	
	Applied research	X	X	X
	Experimental development		X	
Infrastructure*		X		

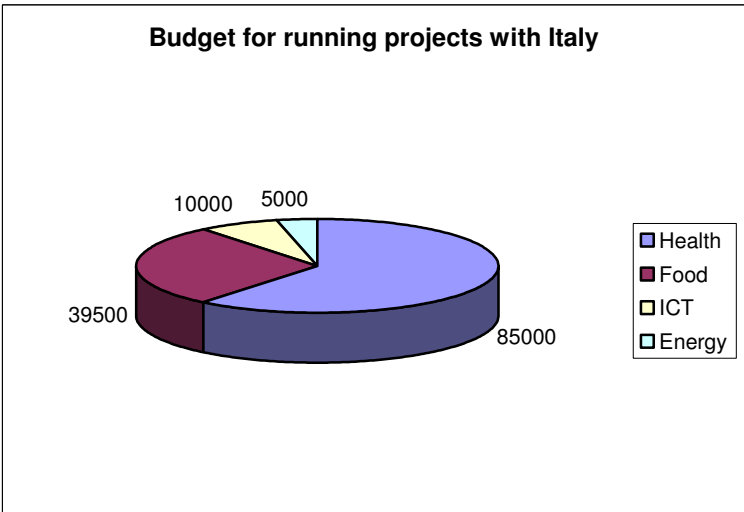
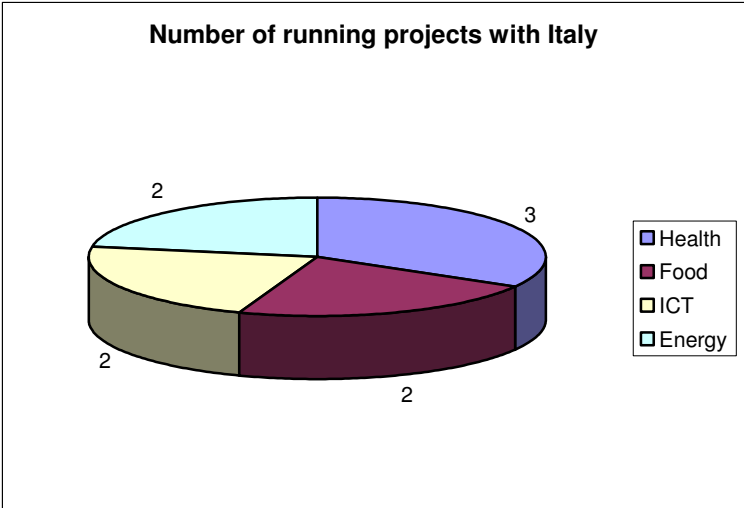
\* In thousand Euro per project if indicated

**Thematic areas of the running projects between Indonesia and the FP7 countries**

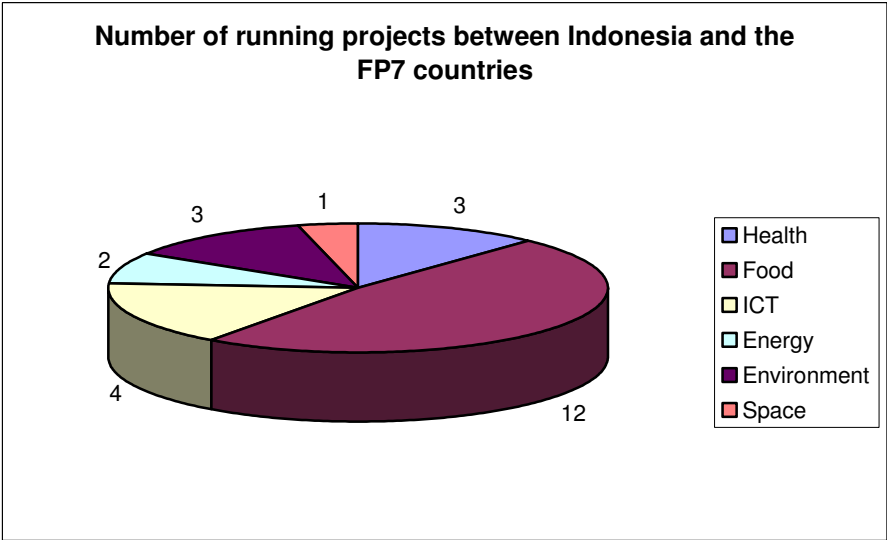




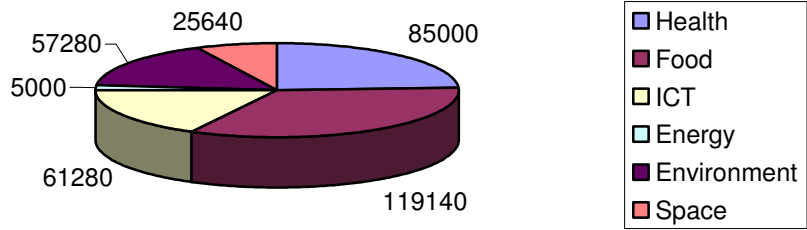
The budget for the Tsunami Early Warning System is an extra 3 845 846 €.



The Program Nusantara 2009-2010 is a proposal between Indonesia and France. There is a project proposal on the field Food, Agriculture and Fisheries, Biotechnology with a budget of 25 640 €.



### Budget for running projects between Indonesia and the FP7 countries



## MALAYSIA

*The data is based on web research*

### **Institution: Ministry of Science, Technology and Innovation (MOSTI)**

International Division  
Level 6, Block C4, Complex C  
Federal Government Administrative Centre  
62662 Putrajaya, Malaysia  
Tel: +03-8885 8090  
Fax: +03-8889 2977  
[www.mosti.gov.my](http://www.mosti.gov.my)

### **Contact person: Mr. Wan Ashbi**

Tel: +03-8885 8348  
e-mail: [ashbi@mosti.gov.my](mailto:ashbi@mosti.gov.my)

### **Description of the institution**

The three major goals of the Ministry of Science, Technology and Innovation in Malaysia (MOSTI) are: knowledge generation (to generate knowledge to spur the economic advancement through human capital and intellectual property development), wealth creation (to value-add the existing sources of wealth and create new sources towards elevating national competitiveness and ensuring economic advancement) and societal well-being (to enhance societal well-being and improve the standard and quality of life).

### **Science and Technology co-operation between Malaysia and FP7 countries\***

<b>EU countries</b>	<b>Starting date</b>	<b>Comments</b>
Austria		<i>ASEA-UNINET</i>
France		
Hungary	21. April 1997	
Netherlands	2004	Cooperation is not based on an S&T agreement
Poland	30. August 2000	

\*This data is based on the information given by the partner countries.

## **NETHERLANDS**

*The data is based on the questionnaires filled in by the Royal Netherlands Academy of Arts and Sciences, the Netherlands Organisation for Scientific Research and SenterNovem*

### **Institution: Royal Netherlands Academy of Arts and Sciences (KNAW)**

Department of International Relations and Quality Assessment (ISK)

PO Box 19121

1000 GC Amsterdam

The Netherlands

Tel: +31 (0)20-5510700

Fax: +31 (0)20-6204941

[www.knaw.nl](http://www.knaw.nl)

**Contact person:** Dr. Rudie Trienes

Position: Coordinator International Funding

Tel: +31 (0)20 5510828 (extension secretariat #788)

Fax: +31 (0)20 6204941

e-mail: [rudie.trienes@bureau.knaw.nl](mailto:rudie.trienes@bureau.knaw.nl)

### **Description of the institution**

Main functions of KNAW are: advising the government on matters related to scientific research; assessing the quality of scientific research (peer review); providing a forum for the scientific world and promoting international scientific cooperation; acting as an umbrella organisation for the institutes primarily engaged in basic and strategic scientific research and disseminating information.

### **Institution: Netherlands Organisation for Scientific Research (NWO)**

PO Box 93138 25-9 AC Den Haag

The Netherlands

Tel: +31 (0)70 344 06 40

Fax: +31 (0)70 385 09 71

[www.nwo.nl](http://www.nwo.nl)

**Contact person:** Renée van Kessel

Position: Director Social Sciences and Science for Global development

Tel: +31 (0)70 3440990

Fax: +31 (0)70 3832841

e-mail: [kessel@nwo.nl](mailto:kessel@nwo.nl)

### **Description of the institution**

The Netherlands Organisation for Scientific Research (NWO) funds thousands of top researchers at universities and institutes and steers the course of Dutch science by means of subsidies and research programmes.

**Institution: SenterNovem**

Juliana van Stolberglaan 3  
P.O.Box 93144  
2509 AC The Hague  
The Netherlands  
Tel: +31 (0) 373 50 00  
Fax: +31 (0) 373 51 00  
[www.senternovem.nl](http://www.senternovem.nl)

**Contact person: Taake Manning**

Position: Manager International Cooperation  
Tel: +31 (0) 70-3735534  
Fax: +31 (0) 70-3735100  
e-mail: [t.manning@senternovem.nl](mailto:t.manning@senternovem.nl)

**Description of the institution**

SenterNovem is an agency of the Dutch Ministry of Economic Affairs and implements national government policy in a professional, effective and inspiring way by order of the State government. It strives to achieve a strong innovative business community in a safe and supportive, sustainable society and promotes sustainable economic growth by building a bridge between the market and government, at both national and international levels. SenterNovem provides companies, (knowledge) institutions and government authorities with advice, knowledge and financial support. We bring parties together who have a passion for a sustainable and innovative society.

**General Science and Technology policy issues**

The main actors in the development of the Science and Technology policy in the Netherlands are the Ministry for Education, Scientific Research and Culture, the Ministry of Economic Affairs and KNAW.

The main actors in carrying out research and development activity are NWO, the Universities and the research institutes of KNAW.

The main actors in financing research and development activity are the Ministry for Education, Scientific Research and Culture and the Ministry of Economic Affairs. Important funding agencies are: SenterNovem, KNAW and NWO.

The main financial resources for research and development activity are the state budget and the private sector.

The ministers of the Ministry for Education, Scientific Research and Culture and the Ministry of Economic Affairs have the right to sign intergovernmental co-operation agreements.

**Science and Technology co-operation between the Netherlands and the ASEAN countries**

The Netherlands has a bilateral Science and Technology co-operation agreement with Indonesia, Malaysia, Singapore and Thailand. In addition to the before mentioned countries NWO funds research projects in all ASEAN countries through its generic subsidy programmes.

ASEAN countries	Starting date	Dutch partner, other comments
Indonesia	1968	KNAW, NWO, SenterNovem
Malaysia	2004	SenterNovem, <i>cooperation is not based on an S&amp;T agreement</i>
Singapore	2001	SenterNovem, <i>cooperation is not based on an S&amp;T agreement</i>
Thailand	2004	SenterNovem, <i>cooperation is not based on an S&amp;T agreement</i>

In the Netherlands the main reasons for starting intergovernmental bilateral S&T co-operation with ASEAN partner countries are the possibility to establish contact for new project or co-operation opportunities and the possibility to accede to financing instruments promoting STI co-operation. The main reasons that can hinder the co-operation are the lack of information regarding the national context and competences of the main actors as well as the lack of sufficient commercial R&D activity. The main results of the co-operation differ from one project to another. The main problem during the co-operation process was that the partners were not able to perform the requested activities.

The following co-operation activities are supported by SenterNovem:

		Indonesia	Malaysia	Singapore	Thailand
Mobility*					
Research*		350	350	600	350
	Basic research				
	Applied research	X	X	X	X
	Experimental development	X	X	X	X
Infrastructure*					

\* In thousand Euro per project if indicated

The Netherlands Ministry of Education, Culture and Science has a co-operation agreement with Indonesia, but the co-operation is lead by KNAW. The scientific programme between Indonesia and KNAW has a budget of 1, 5 million €. The purpose of the **Priority Programme** is to promote the establishment of joint research networks, involving close collaboration between a range of researchers from different institutions in the Netherlands and in Indonesia. Priority Programmes consist of evidently integrated and coherent sets of research activities (research projects), which have a clear focus on a specific research theme or scientific problem mutually agreed upon. The **Mobility Programme** seeks to contribute to the maintenance and construction of existing and future Indonesian - Netherlands scientific



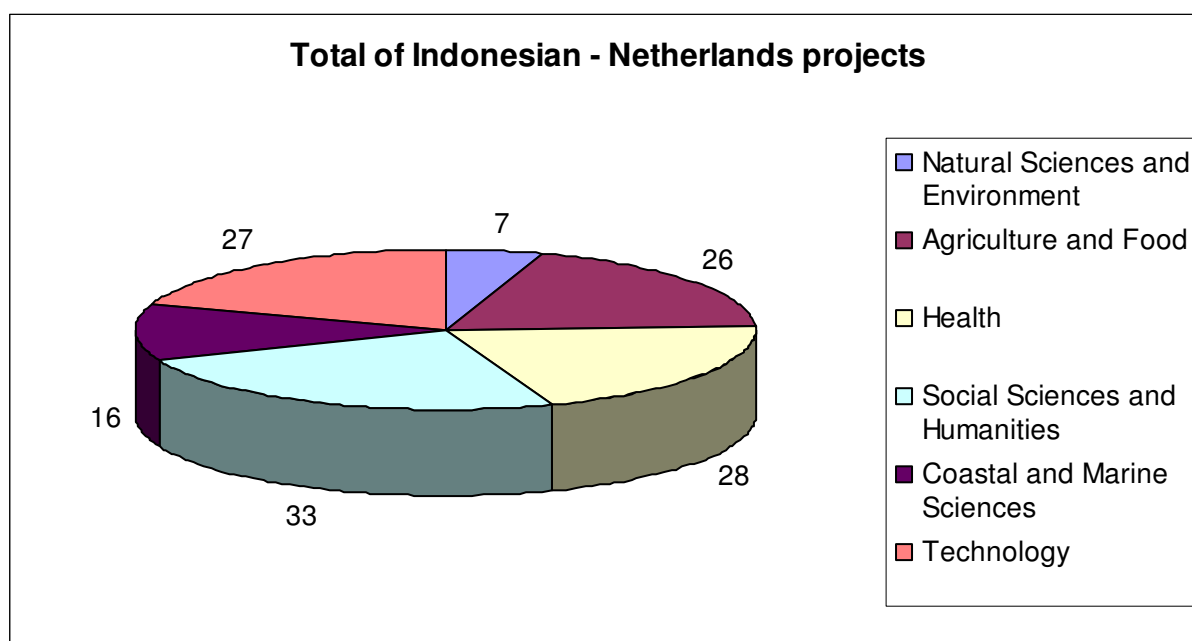
relations and (multilateral) networks in disciplines offering potential for successful cooperation, by awarding small travel grants to Indonesian talented and Netherlands senior researchers. The overall objective of the SPIN **Postdoc Programme** is to embed Indonesian postdocs in Indonesia's science system by providing postdoc positions for outstanding Indonesian PhD-graduates based at Indonesian universities or research institutes.

NWO also has a co-operation agreement with Indonesia. The partners carry out basic research with a budget of 100 thousand € per project. NWO is managing three large projects with Indonesia:

No.	Title of the project	Field of co-operation	Budget
1	Teluk Banten	Environment	2,5 million €
2	East Kalimantan Programme	Environment	3,5 million €
3	Agriculture beyond Food	Env. Resources	2,5 million €

All together it is estimated that the Netherlands invest about 8 to 10 million € in scientific co-operation with Indonesia per year. 50 to 60% is at the expense of KNAW and NWO and 40 to 50% is channelled through SenterNovem and the universities.

Number of bilateral projects between the Netherlands and Indonesia\*



\*On the basis of the Report 2003-2007 about the Scientific Co-operation Netherlands-Indonesia

## **POLAND**

*The data is based on the WP2 questionnaire filled in by the Ministry of Science and Higher Education*

### **Institution: Ministry of Science and Higher Education**

20 Hoża Street

1/3 Wspólna Street

00-529 Warsaw 53

tel.: +48 22 529 27 18

fax: +48 22 628 09 22

<http://www.eng.nauka.gov.pl>

### **Contact person:**

Renata Kuskowska

International Exchanges Officer

Polish Academy of Sciences

Tel. No: +48 22 656 63 71

Fax No.: +48 22 620 33 74

e-mail: [Renata.Kuskowska@pan.pl](mailto:Renata.Kuskowska@pan.pl)

### **Description of the institution**

The Ministry of Science and Higher Education is one of the two main actors in the development of S&T policy in Poland. The task of the ministry regarding S&T policy includes the process of planning, coordination and evaluation of international co-operations, research and development programs also.

The head of the ministry is naturally the minister, to whom the secretary of state and the undersecretaries of state bear the responsibility.

### **General Science and Technology policy issues**

The other important actor in S&T policy-making is the Ministry of Economy. There are several participants who carry out research and development activity. The main actors are the research centres of the Polish Academy of Sciences, research and development units (e. g. affiliated with ministries) and higher education establishments (e. g. universities).

In Poland the main actors in financing research and development programs are the Ministry of Science and Higher Education, the National Centre for Research and Development, the Foundation for Polish Science and some other foundations also.

The main financial resource for research and development actions is the state budget.

Intergovernmental co-operation agreements can be officially signed by the Prime Minister and the Minister of Science and Higher Education.

### **Science and Technology co-operation between Poland and the ASEAN countries**

Poland has intergovernmental bilateral Science and Technology co-operation agreements with the following ASEAN countries:

<b>ASEAN countries</b>	<b>Starting date</b>
Malaysia	30 Aug. 2000
Singapore	15 Jan. 2005
Thailand	17 Sept. 1999

Vietnam	12 Sept. 1999
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In Poland there are several reasons for starting intergovernmental co-operation on the field of S&T with ASEAN partner countries, these are the possibility of learning new working methodologies, the access to new technologies, the possibility to establish contact for new project/co-operation, the excellence of the partner country in a particular field.

The main problem that could hinder the international co-operation is the lack of budget. But the lack of information regarding the national context and competences of the main actors can discourage the co-operation, as well as the lack of information for financial tools.

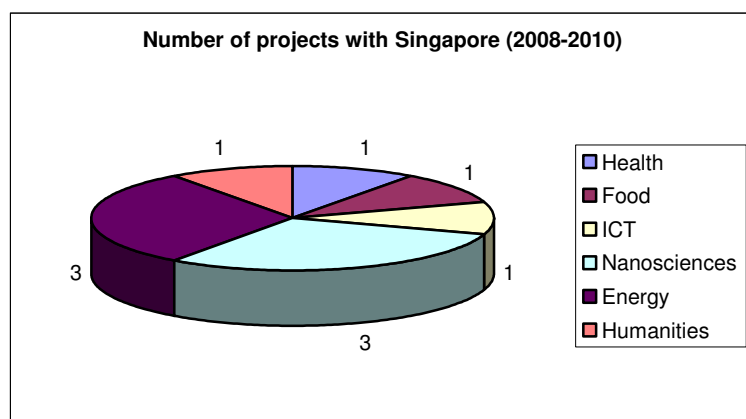
Regarding the results of the co-operation, the main outcome is usually the enlargement of collaboration network. During the process of the co-operation with ASEAN partners, the problems, which appeared were partially problematic in the field of the delay in partners feedbacks, communication problems, budget problems, internal and external administrative procedures.

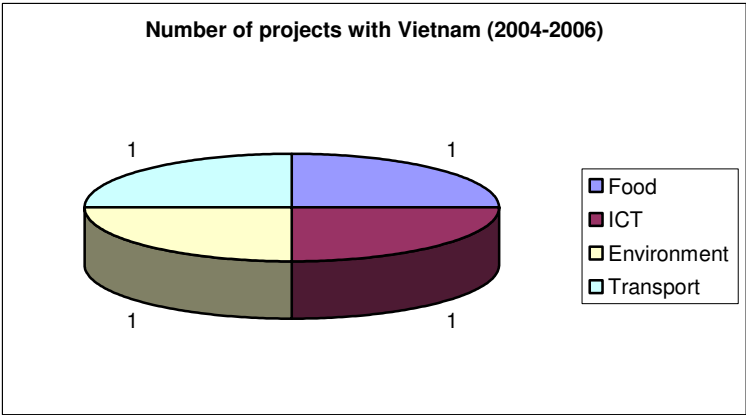
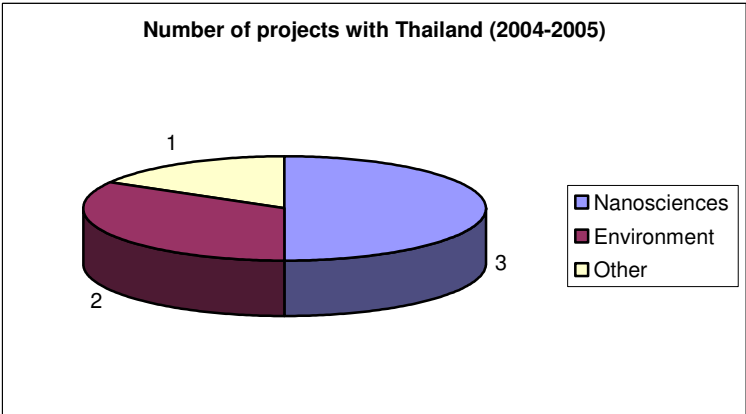
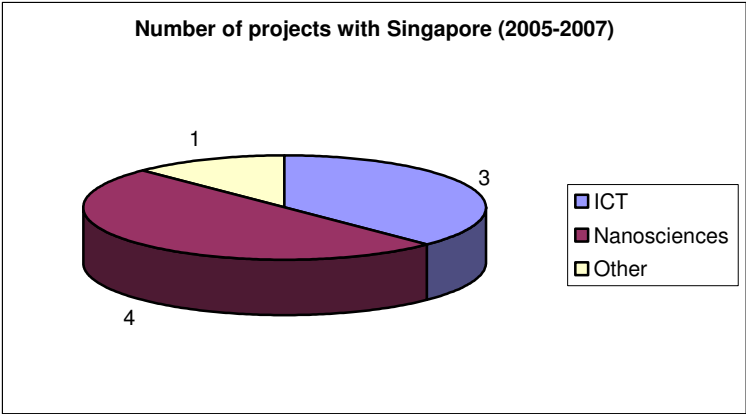
**The following S&T co-operation activities are supported by Poland:**

		Malaysia	Singapore	Thailand	Vietnam
Mobility			X		
Research	Basic research		X		
	Applied research		X		
	Experimental development		X		
Infrastructure					

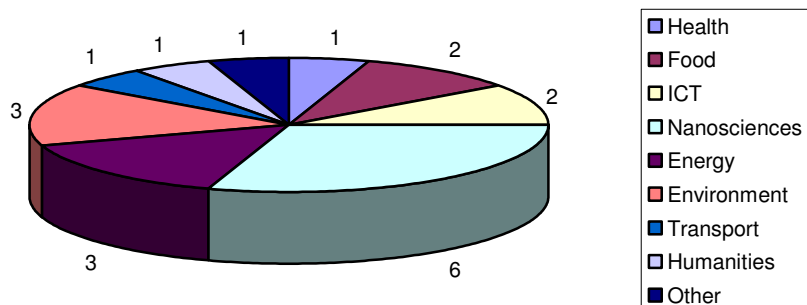
There is no data about the budget spent on these projects.

**Thematic areas of the projects between Poland and the ASEAN countries**





**Number of projects between Poland and the ASEAN countries**



## SINGAPORE

The data is based on the WP2 questionnaire filled in by the Agency for Science, Technology and Research and web research

### **Institution: Agency for Science, Technology and Research**

1 Fusionopolis Way

#21-10 Connexis

Singapore 138632

Tel: (65) 6826 6111

Fax: (65) 6777 1711

<http://www.a-star.edu.sg>

### **Contact person:**

Mr Andrew Fun

Head of Planning & International Relations

Tel. No: (65) 68266 267

Fax No.: (65) 6779 4679

e-mail: [andrew\\_fun@a-star.edu.sg](mailto:andrew_fun@a-star.edu.sg)

### **Description of the institution**

A\*STAR is the main actor in S&T policy making and funding. This agency represents Singapore on S&T matters at international forums. It has 9 sub-committees, which manage, coordinate, evaluate and implement projects in various areas. Planning & International Relations department is in charge of overall planning and coordination of the S&T policy laid out by Ministry of Trade and Industry. The 2 councils – Biomedical Research Council (BMRC) and Science & Engineering Research Council (SERC) – are in charge of execution and evaluation.

### **Science and Technology co-operation between Singapore and FP7 countries**

<b>EU member states</b>	<b>Comments</b>
Czech Republic	Has interaction
Finland	Project level
France	AGA/BMRC
Germany	In preparation
Hungary	BMRC – not intergovernmental
Italy	Has interaction
Netherlands	Has interaction
Poland	SERC
Sweden	Has interaction
United Kingdom	
<b>Associated countries to FP7</b>	
Israel	Project level
Norway	Project level

## **International R&D Collaboration**

Research collaborations are most effectively driven by research institutions and their individual researchers and research groups. A\*STAR encourages its research institutes (RIs) to collaborate with other research institutions, and welcomes other research institutions to make contact with their RIs to explore collaboration opportunities in areas of common interest.

A\*STAR itself also has agreements on cooperation in Science & Technology with agencies in several countries, including China, Japan, Korea, Canada and Germany, that aim to foster research collaborations, the exchange of researchers and students, and joint symposia, seminars and workshops.

## **THAILAND**

*The data is based on the questionnaires (WP2 and WP4) filled in by the National Science and Technology Development Agency and the Ministry of Science and Technology*

### **Institution: National Science and Technology Development Agency (NSTDA)**

111 Thailand Science Park  
Pathumthani 12120, Thailand  
Tel: +66-2 564-7000 Ext. 1522  
Fax: +66-2 564-7084  
[www.nstda.or.th](http://www.nstda.or.th)

#### **Contact person: Prof. Sirirurg Songsivilai**

Assistant President  
Tel: +66-2 564-7000 Ext. 1522  
Fax: +66-2 564-7084  
e-mail: [sirirurg@nstda.or.th](mailto:sirirurg@nstda.or.th)

#### **Description of the institution**

The National Science and Technology Development Agency (NSTDA) is committed to promoting research and development to strengthen Thailand's sustainable competitiveness, complemented with technology transfer and development of human resource and infrastructure in science and technology, with utmost effectiveness of outcomes as a goal. NSTDA is responsible for S&T policy planning in line with the National Science and Technology Strategic Plan as well as for project coordination, execution and evaluation.

### **Institution: Ministry of Science and Technology (MOST)**

Rama VI Road, Bangkok 10400  
Tel: +66-2-3544466  
Fax: +66-2-3543763  
[www.most.go.th](http://www.most.go.th)

#### **Contact person: Mr Nopadon Arayatham**

Foreign Relations Officer  
Tel: +66-2- 354 4466 Ext. 338  
Fax: +66-2- 354 3769  
e-mail: [nopadon@most.go.th](mailto:nopadon@most.go.th)

#### **Description of the institution**

Ministry of Science and Technology (MOST) consists of 13 organisations: 4 government agencies, 4 autonomous agencies, 2 state enterprises and 3 public organizations. Its task is to formulate the national policy on science and technology and innovation of Thailand.



## General Science and Technology policy issues

The main actors in the development of the Science and Technology policy in Thailand are the Ministry of Science and Technology (MOST), the National Science and Technology Development Agency (NSTDA), the Thailand Institute of Scientific and Technological Research and the National Innovation Agency.

The main actors in carrying out research and development activity are the Ministry of Science and Technology (MOST), the National Science and Technology Development Agency (NSTDA), the Thailand Institute of Scientific and Technological Research and the National Research Council of Thailand.

## Science and Technology co-operation between Thailand and FP7 countries\*

NSTDA has a bilateral Science and Technology co-operation agreement with the following countries:

EU countries	Starting date	Comments
Austria	2004 (MoU)	MoU between research ministries + <i>ASEA-UNINET</i>
France		In preparation
Germany		
Hungary	1999	
Netherlands	2004	Cooperation is not based on an S&T agreement
Poland	1999	
<b>Associated countries to FP7</b>		
Switzerland		
Turkey		Not ratified by the parliament yet

\*On the basis of the data given by NSTDA and the partner countries

In Thailand the co-operation with European partner countries is of medium intensity, the main reason for starting intergovernmental bilateral S&T co-operation with these countries is the possibility of networking and mobility of researchers. The main impacts of international S&T co-operation in general are the better access to international S&T knowledge, the technology transfer, the increased international exchange of the research personnel, the enlargement of the collaboration network and the increase of knowledge of bilateral and multilateral research instruments.

The main problems of the S&T collaboration with Europe are the administrative difficulties. The main expectation of the scientific co-operation with European countries is the increase of the exchange of researchers and the increased number of international S&T conferences. The main problem is the lack of the follow-up.

**The following co-operation activities are supported by Thailand:**

		Germany	Switzerland
Mobility*			
Research*		100	100
	Basic research		X
	Applied research		
	Experimental development		X
Infrastructure*			

\* In thousand Euro per project if indicated

## **TURKEY**

*The data is based on web research and some information given by TUBITAK.*

### **Institution: The Scientific and Technological Research Council of Turkey – (TUBITAK)**

International Cooperation Department  
TUBITAK FP7 National Coordination Office  
Ataturk Blv. No: 221  
Kavaklıdere 06100  
Ankara-Turkey  
Tel: +90-312-468 53 00  
<http://www.tubitak.gov.tr>

**Contact person:** Ms. Elif Ozkaragoz  
Tel: +90 312 468 53 00/ Ext. 2760  
Fax: +90 312 427 40 24  
e-mail: elif.ozkaragoz@tubitak.gov.tr

### **Description of the institution**

The Scientific and Technological Research Council of Turkey (TÜBİTAK) is the leading agency for management, funding and conduct of research in Turkey. The Council is an autonomous institution and is governed by a Scientific Board whose members are selected from prominent scholars. TÜBİTAK promotes and funds academic or applied research and development projects undertaken by universities, industry, private and public sector line with national targets and priorities in order to increase the country's competitiveness.

TÜBİTAK supports the Government in formulating Turkey's science, technology and innovation policies. It is the secretariat of the Supreme Council for Science and Technology (SCST), the highest S&T policy making body in Turkey. TÜBİTAK establishes and manages international STI collaborations. It performs STI research in strategic areas within its research institutes.

TÜBİTAK monitors the STI indicators of the country, initiates development actions in SCST and analyses the STI capacity of Turkey.

### **General Science and Technology policy issues**

Established in 1983, the Supreme Council for Science and Technology (SCST) is the highest policy making body in science and research composed of representatives of the government, universities, industry and NGOs. TÜBİTAK serves as the secretariat for SCST. Related Ministries, Higher Education Council (YÖK), Turkish Academy of Sciences (TÜBA), State Planning Organisation (DPT) Turkish Patent Institute (TPE), Turkish Statistical Institution (TÜİK), Undersecretariat of Foreign Trade (DTM) Small and Medium Industry Development Organisation (KOSGEB), Technology Development Foundation of Turkey (TTGV), Union of Chambers and Commodity Exchanges of Turkey (TOBB) are the other actors in S&T policy in Turkey.

The main actors in carrying out R&D activity are TÜBİTAK, universities, private enterprises and public research institutes.

The main actors in financing R&D are TÜBİTAK, the State Planning Organisation, the Undersecretariat of Foreign Trade, the Scientific Research Programmes of the Universities, the Small and Medium Industry Development Organisation and the Technology Development Foundation of Turkey.

The main financial resources for R&D are the private and the public sector, followed by other national funds and foreign resources.

TÜBİTAK has the right to sign intergovernmental co-operation agreements in Turkey.

### **Science and Technology co-operation between Turkey and the ASEAN countries**

Turkey has a signed S&T Agreement with Thailand that has not been ratified by the Turkish Parliament yet. Other agreements with Malaysia and Singapore are in preparation. There are no running projects between Turkey and the ASEAN countries.

## UNITED KINGDOM

*The data is based on web research*

### **Institution: The Royal Society**

6-9 Carlton House Terrace  
London SW1Y 5AG  
tel: +44 (0)20 7451 2500  
fax: +44 (0)20 7930 2170  
<http://royalsociety.org>

**Contact person:** Laura Dawson  
Asia Manager  
Tel:  
Fax:  
e-mail: [laura.dawson@royalsociety.org](mailto:laura.dawson@royalsociety.org)

### **Description of the institution**

Royal Society is a learned society for science that was founded 1660 and is considered by most to be the oldest such society still in existence. Although a voluntary body, it serves as the academy of sciences of the United Kingdom.

As a funding agency, the Society supports around 400 of the best young scientists in the UK as well as 17 senior research professors. In addition, more than 3000 scientists from the UK and abroad benefit from Society grants to undertake research or participate in visits or conferences.

The Society's influential position as the UK's academy of science means it can influence policy makers by providing them with independent and objective science advice on a wide range of issues.

As the UK academy of science, the Society represents the UK scientific community both in the UK and abroad and organises events to showcase outstanding overseas research. It also encourages international scientific interaction through its funding schemes.

The Society publishes seven peer-reviewed international journals to support the sharing of scientific knowledge.

### **Science and Technology co-operation between the Royal Society and the ASEAN countries**

The Royal Society has a bilateral Science and Technology co-operation agreement with the following countries:

Country	Starting date	Comments
Malaysia		MoU
The Philippines		MoU
Thailand		MoU

## VIETNAM

*The data is based on the WP4 questionnaire filled in by the Institute of Oceanography and web research*

### **Institution: National Center for Scientific and Technological Information (NACESTI)**

<http://english.vista.gov.vn/english>

**Contact person:** Tran Thu Lan

e-mail: [tlan@vista.gov.vn](mailto:tlan@vista.gov.vn)

### **Institution: Ministry of Science and Technology**

Bo Khoa Hoc Cong Nghe Va Moi Truong

39 Tran Hung Dao

Hanoi

Vietnam

Tel: +84-4-826 33 88

Fax: +84-4-825 27 33

e-mail: [hksang@moste.gov.vn](mailto:hksang@moste.gov.vn)

[www.moste.gov.vn](http://www.moste.gov.vn)

### **Institution: Institute of Oceanography**

**Contact person:** Dr. Bui Hong Long

Position: Director

Address: No. 1, Cau Da, Nha Trang

E-mail: [haiduong@vnn.vn](mailto:haiduong@vnn.vn)

Tel. No.: 058-590032

Fax No.: 058-590034

### **Description of the institution**

The Institute of Oceanography (IO) is under the Vietnamese Academy of Science and Technology. It has several tasks, for instance: research on the scientific and technological problems, coordination with the research and producing agencies in the country to implement and apply of the research results into the production and life, transmission of the advanced technologies in the above mentioned fields from the foreign countries into Vietnam, developing international cooperation.

### **General Science and Technology policy issues**

The Vietnamese Academy of Science and Technology is the governing body in the national innovation system. There exist also some important institutions, like the University of Science, VNU Hanoi and VNU HCM, the Nha Trang University and the Institute of Oceanography, which cooperate in the field of research and teaching as well.

This institute's international S&T programmes are financed sometimes by government funding, but mostly by public-private-partnerships.

## Science and Technology cooperation between Vietnam and the EU countries

EU countries are very important partners in the field of environment, survey and investigate sea, as well as coral reef. The partnership in these cases is established and works well.

Vietnam has bilateral co-operation agreement with the following countries\*:

	Starting date	Comments
Austria	2005 (MoU)	MoU between research ministries + ASEA-UNINET
France	1977	
Germany	1997	Actively pursued by BMBF, but not a real S&T agreement, rather a Memorandum of Understanding
Hungary	20 July 2005	
Poland	12 Sept 1999	

\*This data is based on the information given by the partner countries

In Vietnam there are many reasons for starting intergovernmental bilateral S&T co-operation with EU countries. The most important rationales are the access to new S&T knowledge, international exchange of students, increase in the research capacities, access to research infrastructures of partners, enlargement of collaboration network, increase of knowledge of bilateral and multilateral cooperation instrument.

The main results of the cooperation are usually the better access to new S&T knowledge, increase in the research capabilities, international exchange of research persons, and last but not least, tapping of further funding. But unfortunately the collaboration with EU countries doesn't have as many effects as the cooperation with other Asian countries. However projects with all European Countries like: Research on harmful diatom (Denmark); Research on penetrated current (Germany); project Marine Environment (SIDA, Sweden) have strong points like that: EU countries have developed science-technology, big budget, high level of staff. Expectations are the same: more exchange of researchers and international S&T conferences. Telling the truth there are some obstacles, which can hinder the collaboration. The most important is the lack of budget for travelling or organisation of international conferences.

## Results of the Survey

### *Bilateral S&T co-operation*

#### Matrix of co-operation

This matrix shows the bilateral co-operation activities of the project participants with the partner region. SEA-EU-NET partners are marked with bold. Only those FP7 countries are listed that were mentioned by our South-East-Asian partners.

There are differences in the interpretation of bilateral co-operation among the countries: in most cases it means intergovernmental S&T agreements, but in some cases it refers to project-based co-operation. Most of the agreements are active with running projects, but some of them are not actively pursued by the two governments. The matrix drawn upon the basis of the data sent by the project partners contains all types of co-operation. Further analysis of the differences between the various types of co-operation is the aim of our next questionnaire.

	Brunei	Cambodia	<b>Indonesia</b>	Lao PDR	<b>Malaysia</b>	Myanmar	Philippines	Singapore	<b>Thailand</b>	<b>Vietnam</b>
<b>Austria</b>		X	X	X	X	X	X		X	X
Czech Rep.								X		
Finland								X		
<b>France</b>	P	X	X	X	X		X	X	X	X
<b>Germany</b>			X					X	X	X
<b>Hungary</b>					X			X	X	X
Italy			X					X		
<b>Netherlands</b>			X		X			X	X	
<b>Poland</b>					X			X	X	X
Slovenia			X							
Sweden								X		
<b>UK</b>								X		
Israel								X		
Norway								X		
Switzerland									X	
<b>Turkey</b>					P			P	X	

X: there is scientific co-operation between the two countries

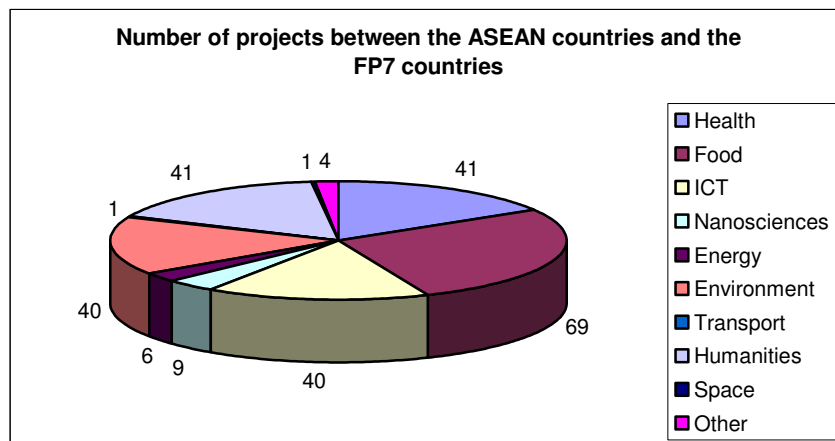
P: an S&T Agreement is in preparation

#### Fields of co-operation

Altogether 6 partners (Austria, Germany, Hungary, Indonesia, the Netherlands and Poland) sent co-operative project lists, so we could summarize only this small portion of all the bilateral projects. Totally we had 252 bilateral projects based on intergovernmental agreements.

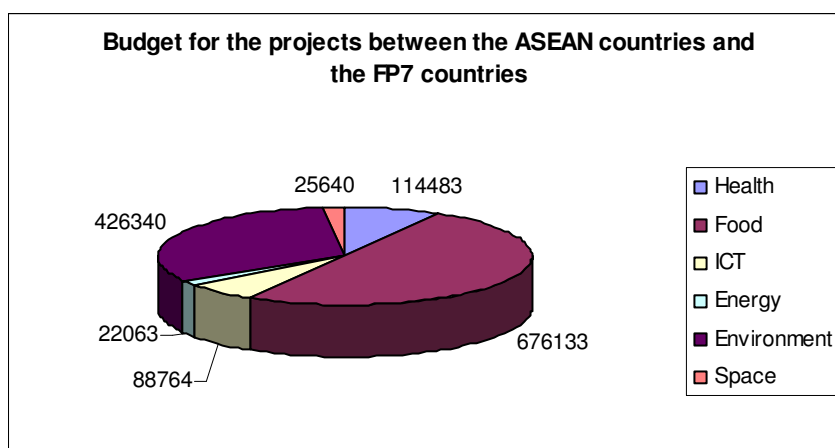
This sample is far from being representative so more data is needed in order to draw the correct conclusions. We were interested in the thematic areas, in which the partners co-operate.





### Budget for co-operation

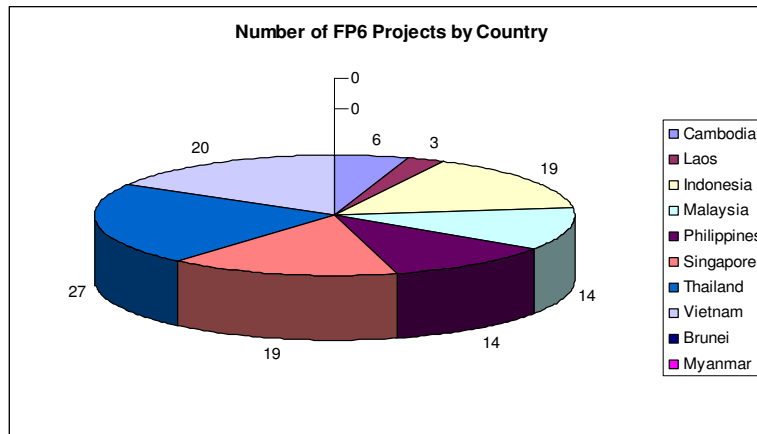
We received even less data about the budget spent on the before mentioned bilateral projects: we do not have budgetary information on the Austrian, the Dutch and the Polish projects. As a result there is a difference between the listed thematic areas.



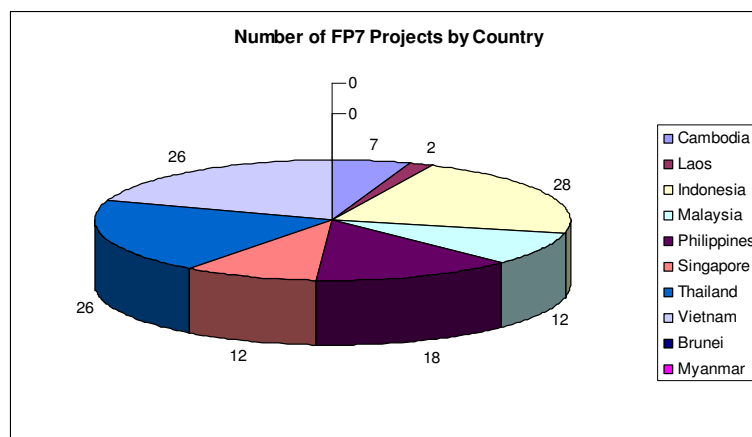
## Multilateral S&T co-operation

The multilateral co-operation of the project partners was analysed on the basis of the participation of ASEAN countries in the Framework Programmes.

### Number of projects



Our project partners: Indonesia, Malaysia, Thailand and Vietnam have participated in 66 % of the projects, which is a high percentage, but the total number of the projects is quite low. Overall success rate of SEA partners in FP6 is good – around 20%. SEA participates in a total of 83 projects, of which 23 were INCO projects.

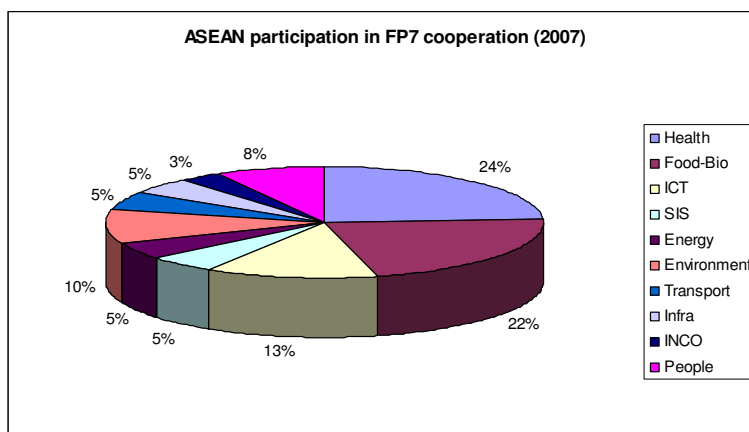


The participation of Indonesia, Malaysia, Thailand and Vietnam increased to 70 %, so our project partners are quite active in the scientific co-operation with Europe. The number of projects is still low.

### Fields of co-operation

There were 40 projects with 85 ASEAN participants with a focus on Food/Biotechnology, Health, ICT and Environment. These fields refer to the whole

ASEAN region, not only to our project partners. Certainly the number of projects will increase till the end of FP7 and the charts will be updated every year.



## Summary and conclusions

### ***Reasons for starting bilateral S&T co-operation***

Generally speaking the main reasons for starting intergovernmental bilateral S&T co-operation with the countries of the partner region is the possibility to establish contacts for new projects or co-operation opportunities.

#### ***Conclusions, possible solutions:***

1. The name and contact details of existing project partners could be a good starting point for further co-operation. The project inventory the attachment of the questionnaire for mapping exercise should be filled in every case very accurately. A list of co-operating partners with phone number and e-mail address could be a basis for further co-operation.
2. As the major goal of our project correspond with the reason for starting bilateral S&T agreements, the rise in the number of S&T agreements can contribute to the growth of other co-operation activities, like the participation of ASEAN countries in FP7 projects.

### ***Hindrances of co-operation***

The main reasons that can hinder the co-operation are the lack of information on financial tools for co-operation, the lack of information regarding the national context and competences of the main actors and the lack of budget for travelling, staff and communication.

#### ***Conclusions, possible solutions:***

1. The SEA-EU-NET project concentrates on the information of the ASEAN partners about financing possibilities of the 7<sup>th</sup> Framework Program. Information events have already been and will be organised in the ASEAN region during the project.

2. The NCP network, established by SEA-EU-NET, will be able to give information about FP7 as the main financial tool of European S&T policy. The support of this network is of crucial importance.
3. The WP2 questionnaire tried to map the S&T policy frameworks of the partner countries in order to offer an overview about these issues. The data of all the responding countries have been collected and published on the SEA-EU-NET website.
4. The ASEAN countries should be informed about European mobility schemes (e.g. Marie Curie Actions, Erasmus Mundus programme).

### ***Results of the co-operation***

The main results of the co-operation were the enlargement of the collaboration network as well as the increasing volume of joint publications. The partner countries have faced relatively different problems during the co-operation process so it is not possible to draw general conclusions.

### ***Comparison of multilateral and bilateral projects***

<b>Priority areas</b>	<b>FP7 projects</b>	<b>Bilateral projects</b>
Health	24%	16%
Food/Biotechnology	22%	27%
ICT	13%	16%
Environment	10%	16%
<b>SUM:</b>	<b>69%</b>	<b>75%</b>

The focus of the multilateral and the bilateral projects are similar. The main fields of co-operation are: Health; Food, Agriculture and Fisheries, Biotechnology; Information and Communication Technologies and Environment (including climate change). These scientific fields may be regarded as common areas of interest.

In the frame of the Stakeholder Conferences of SEA-EU-NET thematic sessions on the before mentioned fields have been and are intended to be organised. The aim of these thematic sessions is to put researchers in touch with politicians in order to find common priority areas and to define concentrated programmes (e.g. SICA-s) on these areas. In addition to these largescale conferences separate brokerage events are also organised on these fields.

The number of the bilateral projects (on the basis of only 6 partners!) exceeds the order of the participation in the Framework Programme, so the importance of the bilateral relations should not be underestimated. It is also a good starting point for future multilateral projects.

The resources for establishing new co-operation opportunities are available through the SEA-EU-NET project at the moment, but further resources ought to be allocated to this co-operation so that sustainability can be achieved. An Action Plan is being elaborated to secure this objective.