

1. New structure of the NABS

New NABS chapters		New NABS sub-chapters	
01	Exploration and exploitation of the earth		
02	Environment		
03	Exploration and exploitation of space		
04	Transport, telecommunication and other infrastructures		
05	Energy		
06	Industrial production and technology		
07	Health		
08	Agriculture		
09	Education		
10	Culture, recreation, religion and mass media		
11	Political and social systems, structures and processes		
12	General advancement of knowledge: R&D financed from General University Funds (GUF)	12.1	R&D related to Natural Sciences financed from GUF
		12.2	R&D related to Engineering Sciences financed from GUF
		12.3	R&D related to Medical Sciences financed from GUF
		12.4	R&D related to Agricultural Sciences financed from GUF
		12.5	R&D related to Social Sciences financed from GUF
		12.6	R&D related to Humanities financed from GUF
13	General advancement of knowledge: R&D financed from other sources	13.1	R&D related to Natural Sciences financed from other sources
		13.2	R&D related to Engineering Sciences financed from other sources
		13.3	R&D related to Medical Sciences financed from other sources
		13.4	R&D related to Agricultural Sciences financed from other sources
		13.5	R&D related to Social Sciences financed from other sources
		13.6	R&D related to Humanities financed from other sources
14	Defense		
85	Total civil		
99	Total		

2. Content of the chapter level

New NABS chapters	Content of the new NABS chapters
<p>01 Exploration and exploitation of the earth</p>	<p>This chapter includes research and experimental development (R&D) related to:</p> <ul style="list-style-type: none"> - The exploration of the earth's crust and mantle, seas, oceans and atmosphere, and their exploitation; - Climatic and meteorological research, polar exploration (under various headings, as appropriate) and hydrology. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Mineral, oil and natural gas prospecting; - Exploration and exploitation of the sea-bed; - Earth's crust and mantle excluding sea-bed; - Hydrology; - Sea and oceans; - Atmosphere. <p>This chapter does not include R&D related to:</p> <ul style="list-style-type: none"> - Pollution (included in Chapter 2); - Soil improvement (included in Chapter 4); - Land-use and fishing (included in Chapter 8).
<p>02 Environment</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The control of pollution, aimed at the identification and analysis of the sources of pollution and their causes, and all pollutants, including their dispersal in the environment and the effects on man, species (fauna, flora, microorganisms) and biosphere; - Development of monitoring facilities for the measurement of all kinds of pollution; - The elimination and prevention of all forms of pollution in all types of environment. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Protection of atmosphere and climate; - Protection of ambient air; - Solid waste; - Protection of ambient water; - Protection of soil and groundwater; - Noise and vibration; - Protection of species and habitats; - Protection against natural hazards; - Radioactive pollution.

<p>03 Exploration and exploitation of space</p>	<p>This chapter includes all R&D related to civil space.</p> <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Scientific exploration of space; - Applied research programmes; - Launch systems; - Space Laboratories and space travel. <p>This chapter does not include corresponding R&D in the defence field (included in Chapter 14).</p> <p>It should be noticed that civil space R&D is not, in general, concerned with particular objectives, it frequently has a specific goal, such as the increase of general knowledge (e.g. astronomy), or relates to particular applications (e.g. telecommunications satellites).</p>
<p>04 Transport, telecommunication and other infrastructures</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - Infrastructure and land development, including the construction of buildings; - The general planning of land-use; - Protection against harmful effects in town and country planning. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Transport systems; - Telecommunication systems; - General planning of Land-use; - Construction and planning of building; - Civil engineering; - Water supply. <p>This chapter does not include R&D related to other types of pollution than harmful effects in town (included in Chapter 2).</p>
<p>05 Energy</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The production, storage, transportation, distribution and rational use of all forms of energy; - Processes designed to increase the efficiency of energy production and distribution; - The study of energy conservation. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Energy efficiency; - CO2 capture and storage; - Renewable energy sources; - Nuclear fission and fusion; - Hydrogen and fuel cells; - Other power and storage technologies. <p>This chapter does not include R&D related to:</p> <ul style="list-style-type: none"> - Prospecting (included in Chapter 1); - Vehicle and engine propulsion (included in Chapter 6).

<p>06 Industrial production and technology</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The improvement of industrial production and technology; - Industrial products and their manufacturing processes. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Increasing economic efficiency and competitiveness; - All manufactures as defined in the NACE Rev. 2 (codes 10 to 33); - Recycling waste (metal and non metal). <p>This chapter does not include R&D related to industrial products and their manufacturing processes where they form an integral part of other objectives (e.g. defence, space, energy, agriculture).</p>
<p>07 Health</p>	<p>This chapter includes R&D related to protecting, promoting and restoring human health - broadly interpreted to include health aspects of nutrition and food hygiene. It ranges from preventative medicine, including all aspects of medical and surgical treatment, both for individuals and groups, and the provision of hospital and home care, to social medicine and paediatric and geriatric research.</p> <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Prevention, surveillance and control of communicable and non-communicable diseases; - Monitoring the health situation; - Health promotion; - Occupational health; - Public health legislation and regulations; - Public health management; - Specific public health services; - Personal health care for vulnerable and high risk populations.
<p>08 Agriculture</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The promotion of agriculture, forestry, fisheries and foodstuff production; - Chemical fertilizers, biocides, biological pest control and the mechanization of agriculture; - The impact of agricultural forestry activities on the environment; - The field of developing food productivity and technology. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Agriculture, forestry, and fishery; - Animal and dairy science; - Veterinary science and other agricultural sciences. <p>This chapter does not include R&D related to:</p> <ul style="list-style-type: none"> - The reduction of pollution (included in Chapter 2); - The development of rural areas, the construction and planning of buildings, the improvement of rural rest and recreation amenities and agricultural water supply (included in Chapter 4); - Energy measures (included in Chapter 5); - The food industry (included in Chapter 6).

<p>09 Education</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - Education general including training, pedagogy, didactics; - Education, special (to gifted persons, those with learning disabilities). <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Pre- and primary school; - Secondary school; - Post secondary non-tertiary education; - Tertiary education; - Tertiary education; - Subsidiary services to education.
<p>10 Culture, recreation, religion and mass media</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The social phenomena of cultural activities, religion and leisure activities so as to define their impact on life in society; - Racial and cultural integration and on socio-cultural changes in these areas. The concept of "culture" covers the sociology of science, religion, art, sport and leisure and also comprises inter alia R&D on the media, the mastery of language and social integration, libraries, archives and external cultural policy. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Recreational and sporting services; - Cultural services; - Broadcasting and publishing services; - Religious and other community services; - Public administration.
<p>11 Political and social systems, structures and processes</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - The political structure of society, - Public administration issues and economic policy; - Regional studies and multi-level governance; - Social change, social processes and social conflicts; - The development of social security and social assistance systems; - The social aspects of the organization of work. <p>This chapter also includes R&D related to:</p> <ul style="list-style-type: none"> - Gender-related social studies including discrimination and familiar problems; - The development of methods of combating poverty at local, national and international level; - The protection of specific population categories on the social level (immigrants, delinquents, "drop outs" etc.), on the sociological level, i.e. with regard to their way of life (young people, adults, retired people, the handicapped etc.) and on the economic level (consumers, farmers, fishermen, miners, the unemployed etc.); - Methods of providing social assistance when sudden changes (natural, technological or social) occur in society. <p>This chapter does not include R&D related to Industrial health, the health control of communities from the organisational and socio-medical point of view, pollution at the place of work, prevention of industrial accidents and the medical aspects of the causes of industrial accidents (included in Chapter 07).</p>

<p>12 General advancement of knowledge: R&D financed from General University Funds (GUF)</p>	<p>See content of subchapters</p>
<p>13 General advancement of knowledge: R&D financed from other sources</p>	<p>See content of subchapters</p>
<p>14 Defense</p>	<p>This chapter includes R&D related to:</p> <ul style="list-style-type: none"> - Military purposes, - Basic, nuclear and space R&D financed by Ministries of Defence. <p>This chapter does not include for example R&D financed by Ministries of Defence in the fields of meteorology, telecommunications and health, should be classified in the relevant chapters.</p>
<p>85 Total civil</p>	<p>SUM of chapters 01 to 13 (= 99 - 14)</p>
<p>99 Total</p>	<p>SUM of chapters 01 to 14</p>

3. Content of the sub-chapter level

Chapter 12 — General advancement of knowledge: R&D financed from General University Funds (GUF)

New NABS sub-chapters	Content of the new NABS sub-chapters
<p>12.1 R&D related to Natural Sciences financed from GUF</p>	<p>This heading covers: R&D financed from GUF on mathematics, computer and information sciences, physical sciences, chemical sciences, earth and related environmental sciences, biological sciences (medical included in 12.3, and veterinary included in 12.4), other natural sciences.</p>
<p>12.2 R&D related to Engineering Sciences financed from GUF</p>	<p>This heading covers: R&D financed from GUF on civil engineering, electrical engineering, electronic engineering, information engineering, mechanical engineering, chemical engineering, materials engineering, medical engineering, environmental engineering, environmental biotechnology, industrial biotechnology, nano-technology, other engineering and technologies.</p>
<p>12.3 R&D related to Medical Sciences financed from GUF</p>	<p>This heading covers: R&D financed from GUF on basic medicine, clinical medicine, health sciences, medical biotechnology, other medical sciences.</p>
<p>12.4 R&D related to Agricultural Sciences financed from GUF</p>	<p>This heading covers: R&D financed from GUF on agriculture, forestry, and fishery, animal and dairy science, veterinary science, agricultural biotechnology, other agricultural sciences.</p>
<p>12.5 R&D related to Social Sciences financed from GUF</p>	<p>This heading covers: R&D financed from GUF on psychology, economics and business, educational sciences, sociology, law, political science, social and economic geography, media and communications, other social sciences.</p>
<p>12.6 R&D related to Humanities financed from GUF</p>	<p>This heading covers: R&D financed from GUF on history and archaeology, languages and literature, philosophy, ethics and religion, art (arts, history of arts, performing arts, music), other humanities.</p>

Chapter 13 — General advancement of knowledge: R&D financed from other sources

New NABS sub-chapters	Content of the new NABS sub-chapters
<p>13.1 R&D related to Natural Sciences financed from other sources</p>	<p>This heading covers: R&D financed from other sources on mathematics, computer and information sciences, physical sciences, chemical sciences, earth and related environmental sciences, biological sciences (medical included in 13.3, and veterinary included in 13.4), other natural sciences.</p>
<p>13.2 R&D related to Engineering Sciences financed from other sources</p>	<p>This heading covers: R&D financed from other sources on civil engineering, electrical engineering, electronic engineering, information engineering, mechanical engineering, chemical engineering, materials engineering, medical engineering, environmental engineering, environmental biotechnology, industrial biotechnology, nano-technology, other engineering and technologies.</p>
<p>13.3 R&D related to Medical Sciences financed from other sources</p>	<p>This heading covers: R&D financed from other sources on basic medicine, clinical medicine, health sciences, medical biotechnology, other medical sciences.</p>
<p>13.4 R&D related to Agricultural Sciences financed from other sources</p>	<p>This heading covers: R&D financed from other sources on agriculture, forestry, and fishery, animal and dairy science, veterinary science, agricultural biotechnology, other agricultural sciences.</p>
<p>13.5 R&D related to Social Sciences financed from other sources</p>	<p>This heading covers: R&D financed from other sources on psychology, economics and business, educational sciences, sociology, law, political science, social and economic geography, media and communications, other social sciences.</p>
<p>13.6 R&D related to Humanities financed from other sources</p>	<p>This heading covers: R&D financed from other sources on history and archaeology, languages and literature, philosophy, ethics and religion, art (arts, history of arts, performing arts, music), other humanities.</p>