

Report of the Executive Board for 2003

In 2003, the Executive Board devoted special attention to shaping the organisation to conform better to the targets articulated in connection with the evaluation of the Research Council in 2001 and the subsequent reorganisation. The Research Council is now well on its way to achieving these targets, which include enhancing the quality of Norwegian research and devoting more attention to both basic and innovation-oriented research.

In 2003, the Executive Board attached great importance to following up efforts to enhance the quality of Norwegian research and to developing an even better Research Council by reorganising to conform to the signals in the evaluation. The reorganisation was celebrated by opening 'The new Research Council' on 1 September 2003, in accordance with a project plan devised in autumn 2002. The reorganisation will be followed up closely throughout 2004, not least with a view to improving contact with user groups, developing a more transparent research council that features new working methods, and intensifying the role of the Executive Board.

During the year under review, a number of meetings were held with external partners such as ministries, business and industry, and research institutions. Close attention has been devoted to partners' opinions on the reorganisation as well as on other important issues, not least the development of a new general strategy for the Research Council.

Although the national budgets for 2003 and 2004 contained gratifying increases in allocations to basic research and segments of industrial research, aggregate Norwegian R&D spending is still low. The Research Council will continue its efforts to ensure that the politically adopted escalation plan for Norway's research spending is brought to fruition.

The quality of Norwegian research

In 2003, the Research Council followed up its intense focus on quality-promoting measures in the Norwegian research system. *The Centres of Excellence* (CoE) scheme was established in 2002, and all CoEs were fully operational by the end of 2003. Several CoEs have already carved out a good reputation for themselves in international arenas, and the Executive Board will advocate an expansion of the CoE scheme from 2007.

The 'Outstanding Young Investigators' (OYI) initiative adopted in 2003 is also an important quality-promoting measure. The Executive Board has taken note of the favourable evaluation of *the Advanced Research Programme* within medical research, and has decided the programme will be co-ordinated with the OYI scheme from 2005.

In 2004, a study will be made of a CoE-inspired scheme involving *Centres for Outstanding Innovation* (COI), which the Executive Board considers to be an interesting concept.

An even better research council

The evaluation and reorganisation of the Research Council drew attention to a number of organisational challenges. In autumn 2003, these challenges were the focus of a comprehensive brainstorming process in the administration, under the scope of the project *An even better research council*. The efforts resulted in seven packages of measures to be implemented in 2004. The Executive Board has given extra high priority to improvements related to external functions and contacts, not least with a view to increasing the legitimacy of the processing of applications. The latter is essential in the light of the large number of applications and the fact that they deserve the best possible processing every year. In 2003, the Research Council's administration received 5 518 applications, 34 per cent of which were granted.

Internet-based research administration (the IFA project) reached an important implementation milestone when electronic application procedures were introduced in 2003. The

IFA project is intended to simplify and improve the efficiency of the Research Council's work processes, giving users more predictability, transparency, efficiency, security and quality in research administration.

Highlights

The Research Council's long-term ambition is for Norway to make significant contributions to international knowledge development, and for research-based knowledge to be genuinely appreciated as an important part of Norwegian culture. The four thematic initiatives adopted by the Storting (Norway's parliament) in conjunction with the White Paper entitled 'Research at the beginning of a new era' in February 2000 comprise a key element in the ranking of priorities. In addition, efforts are being invested in basic research outside the thematic research initiatives, featuring biotechnology, materials research and petroleum research as high-priority fields.

The establishment of the Fund for Research and Innovation in 1999 has helped secure new funding for the research system. The Fund's yield of MNOK 90 in 1999 had increased to about MNOK 800 in 2003. One-third was allocated directly to the universities, while two-thirds were channelled through the Research Council. Of these funds, roughly 77 per cent goes to the universities, 22 per cent to the research institutions and 1 per cent to business and industry.

During deliberations on the revised national budget for 2004, the Government proposed cutting MNOK 53.5 from the allocations for industrial research. However, due to pressure exerted by business and industry, the Research Council and the research communities involved, the proposal was stopped in the Storting. A cut in allocations would have affected existing research contracts between the Research Council and business and industry. Accordingly, the Executive Board notes with satisfaction that the cut was not implemented. On the other hand, the proposed cuts of MNOK 24 in agricultural research were upheld.

In spring 2003, a Sandefjord enterprise filed a complaint about the Research Council's administrative procedure in connection with an application that was rejected by the Programme Committee for Maritime Research. This triggered an important discussion both in-house and in the media about the handling of competency-related issues in respect of the processing of applications. It was decided to establish a special committee under the supervision of Professor Eivind Smith to submit a recommendation in February 2004. The Smith Committee's recommendation will help ensure the Research Council's administrative procedures continue to maintain high international standards, given that societal trends are moving towards requirements for more transparency, independence and competence.

The Executive Board has decided to establish regional representation in the four university regions as well as in Nordland County, Rogaland County and Oppland County, with a view making the Research Council a key player in innovation nation-wide. The regional offices will all be set up in 2004.

The Norwegian research institution sector's accounts for 2002 show an aggregate deficit and thus a trend that gives cause for concern. Norway needs to conduct a comprehensive review of this sector, firmly anchored in the Government's Research Committee and the Ministry of Education and Research.

International activities

The pace of internationalisation in research and technology has accelerated, assuming new, more global forms. The Research Council considers it more important than ever to stimulate the internationalisation of Norwegian research. Participation in European research co-operation and the EU's Framework Programme for Research and Technological Development are absolutely essential aspects of these efforts. The EUREKA collaboration on market-led research and development and

the international grant/fellowship schemes, as well as bilateral agreements with a number of countries are among the most important instruments at hand.

Norwegian research groups have obtained considerable funding in important areas under the EU's 6th Framework Programme for Research and Technological Development (6RP) instituted in 2003. Norway's success rate was especially high for the schemes comprising Networks of Excellence and Integrated Projects. Norway's research institutions often have problems meeting their own funding obligations for EU projects. As a result, the Executive Board proposed a national scheme that largely guarantees supplementary funding for institutions that are part of EU projects. The funding scheme will be introduced in 2004, and efforts are being made to set up a general scheme for the duration of the 6RP period. The financial consequences are estimated at about MNOK 70 in 2004, increasing to roughly MNOK 200 per year in 2006.

The EU's new framework programme continues to target thematic research initiatives and horizontal instruments, but is also in the process of developing a European Research Area (ERA) with emphasis on stronger co-ordination between EU research and national efforts. Norway has had extraordinary success with the existing ERA-Net scheme, an allocation granted by the EU Commission to allow individual countries to open their programmes for co-ordination with other countries.

In 2003, the EU Commission had lengthy discussions about establishing a European research council. 2004 will be an important year as regards the outcome of those discussions. This is primarily a question of more intense co-ordination of basic research which will, in turn, be incorporated into future framework programmes.

It would be advisable to strengthen Norwegian activities in the EUREKA network, where Norway joined 16 new projects in 2003. Eight of the projects were initiated without any kind of direct support from the Norwegian government. Compared with other countries, this figure is too high. All Norwegian participants in EUREKA projects are now taking advantage of the SkatteFUNN scheme that allows enterprises to take tax deductions for R&D expenses.

Norway pays high membership dues to institutions such as the European Organization for Nuclear Research (CERN) and the European Space Agency (ESA). Norway's research strategy is challenged by the fact that the allocations for participatory research are significantly less than the membership dues. One of the Research Council's goals is to strike a better balance between membership dues and participatory research, with a view to making the most of the resources at hand.

In 2003, the Nordic Council of Ministers published a White Paper recommending that Nordic research co-operation be fortified, and a number of proposals were sent out for comment at year-end 2003.

One important task in the international arena will be to develop a strategy that takes a clear position on which countries merit high priority when it comes to research collaboration, and which technologies and subjects are most interesting. The Ministry of Education and Research is in the process of drawing up such a strategy, which ought to attach importance to European research co-operation, at the same time as taking into account that the USA is the world's most dynamic research nation. The proposition to the Storting also identifies Canada, Germany, France, Japan and China as interesting partner countries.

SkatteFUNN

SkatteFUNN is a non-industry-specific tax deduction scheme for enterprises that engage in research and development work and are liable to tax in Norway. The scheme gained considerable momentum in 2003, receiving about 4 770 applications, compared with about 2 660 the year before. The Research Council has developed an Internet-based, fast and non-bureaucratic administrative procedure and SkatteFUNN has very rapidly become the largest, most important public policy instrument in Norway when it comes to industrial research and development (R&D).

ICT enterprises have been active applicants, while traditional industry, commerce, services and tourism have been more poorly represented. Unfortunately, pioneering enterprises and sole proprietorships are not benefiting from the scheme.

SkatteFUNN's success has contributed to enhancement of the most applied research, at the same time as pure basic research was also strengthened during the year. The Executive Board is of the opinion that the general allocations to user-driven research were reduced without just cause, and will revert to this problem in 2004.

Advisory services, dialogue and strategy

In 2003, the Research Council worked on devising a new strategy that is scheduled for completion in spring 2004. The Research Council has a three-pronged purpose: To provide advice on research policy to the Government and the ministries, to implement research policy once it is adopted, and to serve as a meeting place/network builder. The new strategy focuses on the Research Council's own implementation of research policy, while research policy advice will generally be furnished through contributions to the next White Paper on Research, expected in 2005.

The new organisation

The reorganisation involved six divisions being replaced by three specialist divisions: Science, Strategic Priorities and Innovation; as well as the two common services units: Administration and Communications. During the year, considerable attention was devoted to establishing smooth co-operation between the divisions, and the Executive Board and the Research Boards have made considerable headway in developing a common understanding of the most important challenges in their respective fields *and* in common fields.

The new specialist divisions have their own Research Boards, which are appointed by the Executive Board. The Board structure has overlapping representation, that is, the chairs of the Research Boards are appointed from among the members of the Board of Directors. The directors are personal representatives by virtue of their professional eminence, and do not serve as representatives of sectors or institutions.

About 300 nominations were made for members of the Research Boards. The selection process attached considerable attention to establishing boards with a strong professional grounding and the ability to reflect the diversity of the Norwegian research system.

The Division for Science primarily aims at contributing to the development of basic research in subjects and disciplines, and to the development of inter- and multi-disciplinary research. The division is to stimulate professional revitalisation and the production of new scientific knowledge, and to strive to improve the general conditions for Norwegian research. By maintaining close contact with universities, university colleges and research institutions, the division will help strengthen research communities at the institutions, promoting closer collaboration between them.

In 2003, the division followed up the evaluation and reorganisation by conducting extensive confidence-building exercises in relation to partners and key user groups, as well as by striving to continue enhancing the quality of Norwegian research through, for example, the CoE scheme. The initiative Outstanding Young Investigators (OYI) was established during the year to provide a number of skilled researchers under the age of 40 with particularly good general conditions to help them realise their potential for international excellence and qualify as good research supervisors. The Executive Board has also decided the Research Council will participate in the European Young Investigator Awards (EURYI) scheme as a part of the OYI scheme.

The Division for Strategic Priorities is to identify and study national strategic research needs and strive to build up knowledge and research capacity in high-priority fields. The division is

responsible for operationalising general research policy initiatives in collaboration with the public sector, research communities and business and industry. It also bears special responsibility for research related to policy making and social challenges.

The evaluation of the Research Council recommended establishing large-scale initiatives that span a period of five to 10 years. This was followed up by the establishment of seven programmes under the policy instrument *Large-scale research programmes*. Guidelines were drawn up and adopted during the year. Six of the programmes will be in full operation in 2004: FUGE (Functional Genomics), NANOMAT (Nanotechnology and New Materials), HAVBRUK (Aquaculture, A growth Industry), RENERGI (Clean Energy System for the Future), PETROMAKS (Research on Maximum Exploitation of petroleum Reserves) and NORKLIMA (Climate Change and its Consequences for Norway). The seventh programme, VERDIKT (Core Competence and Value Creation in ICT), will be established in 2005.

The **Division for Innovation** is to have comprehensive expertise on innovation and innovation policy and be a key strategic and operative player in this field. Through its work to promote research, development and innovation, the division will be an important partner for the business community as well as the public sector at the national and regional levels.

In 2003, the division devoted considerable attention to optimising co-operation with Innovation Norway, and to establishing the knowledge base needed to develop an innovation policy and strategy for the Research Council. The division has identified four main national challenges for stimulating more innovation: more innovation and growth in existing industry; the public sector as a source of and arena for innovation; more growth in new knowledge-intensive industries; and more commercialisation of ideas produced by R&D institutions.

The Norwegian innovation system has not yet found its permanent form, pending more knowledge about which instruments are optimal. Among other things, it is important to develop public instruments that will encourage business and industry to place more emphasis on research. The efforts to review the instruments available to the Research Council in the field of innovation with a view to developing new, more expedient instruments, will be given high priority in 2004.

The *Enabling Technologies* scheme will facilitate the development of national groups of specialists of particular relevance for future economic development. The establishment of PhD and post-doctoral positions is a crucial policy instrument. The goal is for the majority of PhD students to go into business and industry once they complete their studies.

Information, the media and public relations

Strategic communications activities and the dissemination of information about research to the general public are crucial policy instruments for achieving the Research Council's goals. The Research Council's most comprehensive public relations activity is the annual *'Research Week'*, organised for the 9th time in 2003 and drawing record crowds as 180 institutions organised approximately 1 000 events all across the country. In addition, the Research Week secretariat produced six regional newspaper supplements that were distributed with the newspapers *Aftenposten*, *Fædrelandsvennen*, *Stavanger Aftenblad*, *Bergens Tidende*, *Adresseavisen* (Trondheim) and *Nordlys* (*Nordlys*).

The Research Council's Prize for Outstanding Research was awarded to Atle Kittang, professor of Comparative Literature at the University of Bergen. The Research Council's Prize for the Outstanding Dissemination of Research for 2003 was awarded Bente Træen, professor of Health Psychology at the University of Tromsø.

In 2003, the website *forskning.no* enjoyed an average of 180 000 unique hits per month, a whopping 80 per cent more than expected. The website is quoted daily by broadcasters and newspapers, and a market survey indicates a very high success rate among the high-priority target groups.

Parallel to 'The new Research Council' getting a new visual image, the magazine *Forskning (Research)* was redesigned and revitalised. August marked the publication of a special issue of the English-language magazine *Tell'us*, featuring reports from each of Norway's 13 Centres of Excellence.

The knowledge project 'Curious George' consists of the *Curious George* magazine, a teachers' guide to scientific working methods, courses in project work and the national competition *The Curious George of the Year*. 'Curious George' maintained a high level of activity in 2003, introducing a new website, among other things.

Results of the year's activities

Research Council revenues aggregated MNOK 4 368 in 2003. Of that amount, grants from the ministries totalled MNOK 4 208. Operating expenses, including both administrative and R&D expenditure, added up to MNOK 4 435. Capitalised research obligations (earlier transfers) came to MNOK 559, compared with MNOK 621 in 2002.

The Research Council's net result for the year was a loss of MNOK - 60.9. This amount included a reduction of research obligations by MNOK - 62.1, used to reduce capitalised research obligations. The result after research obligations came to MNOK 1.2, which will be added to the Research Council's equity.

The working environment

Total absence due to illness in the administration was 4 per cent in 2003, which is low, but reflects a slight increase from 2002. The reorganisation of the Research Council does not seem to have had an effect on absence due to illness, as absenteeism in Q4 2003 was at the same level as in 2002.

The Research Council signed an agreement on A More Inclusive Workplace that took effect on 1 January 2003. Despite the agreement, absenteeism has not been reduced, but that may be ascribable to the fact that the level is generally low. It is nevertheless assumed that the agreement will help sustain low absenteeism and ensure better follow up of employees on sick leave. The latter applies specifically for those on long-term sick leave. Those on long-term sick leave, i.e. individuals with a total absence due to illness of more than 10 per cent, comprised 30 individuals in 2003, the same level as in recent years.

Employees and equal opportunity

The Research Council is headquartered in Oslo. The Research Council's activities do not pollute the environment. At 31 December 2003, the Research Council's administration consisted of 314.5 man-years of labour/324 individuals. In addition, individuals accounting for 31.5 man-years of labour were employed on a temporary basis. Advisers are the largest group of employees, accounting for a total of 140.7 man-years of labour. This is an increase of some five man-years of labour from 2002. The executive officer group comprises 78.3 man-years of labour, an increase of 7.5 man-years from 2002.

Women account for 60 per cent of the Research Council's administration. With the exception of the executive director group, which consists of 25 per cent women, there are about 50 per cent women in all job categories. Half the members of the Executive Board are women, while there are five men and four women on all the Research Boards.

The Research Council's charter features a separate point entailing an obligation to strive to achieve equal opportunity. In-house documents also emphasise that equal opportunity will be taken into account when filling job vacancies.

The road ahead

It has long been a political goal for Norway to increase its R&D spending as a percentage of gross domestic product (GDP) to the average for the countries in the Organisation for Economic Co-operation and Development (OECD). One of the Research Council's most important tasks in future will be to render concrete the reasons why this the goal is important.

The public and private sectors alike must increase R&D spending if Norway is to reach this goal. When the decision to escalate to the OECD average was adopted in 1999, R&D spending in Norway was about NOK five billion below the OECD level; research budgets have subsequently expanded by NOK 3.7 billion (1999 NOK). In the meantime, Norway's GDP has also expanded. In connection with the upcoming White Paper on Research, it should be discussed whether R&D efforts will be best served by having a quantitative target in the form of a specific amount of money or a qualitative target in the form of, for example, a percentage of GDP. Discussions of overall R&D efforts must also take into account factors such as the current industry structure and the structure to which we aspire in the future.

Oslo, 31 December 2003

15 April 2004

The Executive Board of the Research Council of Norway

Geir Stene-Larsen
(Chair)

Ingvild Sælid Gilhus
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Knut Liestøl

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