



2023

ANNUAL REPORT



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Preface:

HENK VAN HOUTEN

CHAIRMAN OF THE NAE BOARD

We are proud to present you this first annual report of the Netherlands Academy of Engineering. A report on 2023, which for NAE was primarily a year in which we, as a founding board and office, worked intensively on laying a healthy foundation for the future of NAE. A year that started with determining our vision and position in the knowledge- and innovation landscape. Central to this is our goal: NAE strives to promote an environment in which responsible, inclusive and impactful engineering-based innovations are effectively achieved.

We not only used our own insights, but also looked closely at how other Academies of Engineering abroad function. We have had numerous discussions with stakeholders in our playing field, such as our sponsors from the outset (the Ministries of Education, Culture and Science (OCW) and Economic Affairs and Climate (EZK) and the 4TU Federation) and organizations such as KIVI, STT, NWO, KNAW, ROM-Nederland, Techleap, VNO-NCW and several top sectors. We have received many valuable suggestions and identified opportunities for collaboration.

We then laid down the outlines of our activity plan. NAE will develop activities of the Forum, Pivot and Advice type. The Forum function provides a platform for constructive debate about engineering and innovation, the Pivot function aims to stimulate action together with the knowledge and innovation ecosystem and the Advisory function will support this with targeted advice.

Six themes span and connect the Forum, Pivot and Advisory activities: engineering talent, ecosystem improvements (removing barriers for innovation), innovation for social transitions, innovation of engineering practice, effective valorisation and start-ups, and international cooperation and best practices.

Of course, 2023 was also the year in which we appointed our first cohort of Fellows. Their installation and the launch of NAE, with an opening event in the Nieuwe Kerk in The Hague, was certainly a highlight. NAE Fellows are appointed not only on the basis of their merit, but also because they want to commit themselves to NAE activities and have the right network for this. The Fellows provided numerous ideas, which we have incorporated into our activity plan.

A lot of work has been done in the background to establish NAE as an organisation. This involved a lot of work, such as: drawing up articles of association, drawing up our code of conduct to avoid conflicts of interest, finding housing, writing a position paper, drawing up an outline action plan and much more. On behalf of the board, I would like to thank our office employees very much for this achievement.

We will develop our first activities in 2024. To this end, we have installed program committees for Forum, Pivot and Advise, an international committee and a Young Engineers committee. There is still a lot to do, but the foundation has been laid!

Henk van Houten



**THE WORLD IS BECOMING MORE
COMPLEX AND COMPETITIVE. IT IS
THEREFORE ESSENTIAL TO STRONGLY
CONNECT SCIENCE-, TECHNOLOGY-
AND INNOVATION POLICIES.**

We must focus on those areas where the Netherlands can become one of the very best within Europe and worldwide.

This is desperately needed to create economically viable solutions for social transitions and to maintain our earning capacity. Excellence in engineering-based innovation and its associated industry is crucial.

Henk van Houten
Chairman of the NAE board



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Introduction:

WILLEM JACOBS

DIRECTOR NAE

NAE is an association with a social mission. NAE wants to promote and increase the translation of knowledge and insights – in the field of technology and innovation – into applications for social benefit. To this end, we want to strengthen the interaction and cooperation between companies, knowledge institutions, governments and citizens. And we focus on a multidisciplinary approach and systems thinking.

NAE's connecting role is therefore included in its mission, which we believe we can achieve with the help of our Fellows and Young Engineers. They are top experts in the field of engineering, from knowledge institutions and the business community. Naturally, they have a passion for technology and innovation. But they are also willing to use their knowledge, insights and network unremunerated. They form our power to connect, to make engineering more visible and give it a clearer voice, and to exert influence so that the engineering perspective is better taken into account in policy making, regulations, and (political) decision-making.

In the founding year of 2023, the foundation for our future was laid. Building a new organization is a profession in itself. No matter how much start-up experience there is - and there was plenty of it - everything takes extra energy the first time. A lot of attention has been paid to the way in which the board, agency and members want to work together – with a total of more than seventy new people.

We benefit a lot from our sister organizations, collected in a European context within Euro-CASE and worldwide within CAETS. Considerable attention has also been paid to setting up processes to guarantee independence and meet all accountability requirements.

The year 2024 will be the first year with substantive activities. Within our Forum, we will emphatically ask ourselves in the debate what we want and can do with the topic and what the next steps are. Our advice will be short-cyclical and practical in nature, encouraging action. With our Pivotal Function we aim to actually take action. We cannot and do not want to do this alone. We will always explicitly seek cooperation in our activities and use our connecting role to build bridges.

Our thanks go to the Ministries of Economic Affairs and Climate Policy and OCW and to the 4TU Federation for their efforts to make the establishment of NAE possible. We are grateful to ActI for its donation. The founding board and office employees deserve appreciation for their continued dedication to getting NAE off the ground successfully. Finally, we are grateful to all parties we spoke to for their critical view.

Willem Jacobs

SOLVING THE MAJOR CHALLENGES FACING SOCIETY REQUIRES A COMMITMENT FROM ALL. FROM AN ENGINEERING PERSPECTIVE, WE WANT AND CAN CONTRIBUTE TO THIS WITH TARGETED ADVICE.

Sjoukje Heimovaara
Vice-chair



OPENING NAE

On November 13, 2023, NAE opened its doors and installed its first group of Fellows: 62 top experts from the broad engineering and innovation field. Place of celebration: the Nieuwe Kerk in The Hague. Outgoing Minister of Education, Culture and Science Robbert Dijkgraaf and President of the Royal Swedish Academy of Engineering Sciences and Chairman of Euro-CASE, Tuula Teeri were our guests of honour. Outgoing Minister of Economic Affairs and Climate Policy Micky Adriaansens and Arthur Mol, on behalf of the 4TU Federation, contributed via a video message. The festive meeting marked the moment when the NAE Fellows started realizing NAE's ambitions; an academy, set up following the example of other academies in Europe and the United States.

INVOLVEMENT

NAE experienced great involvement during our opening meeting. An involvement that partly arises from the passion for making a positive contribution to contribute to major social issues, including the current overload on our planet. What connects us is the belief that engineering, through the combination of science, technology and innovation, can play an important role in devising and applying solutions to social issues, our society and economic position in the world.

The Ministry of Education, Culture and Science, the Ministry of Economic Affairs and Climate Policy and the 4TU Federation showed their commitment to NAE through their presence and through their long-term financial commitment to NAE. Outgoing Minister Dijkgraaf emphasized that with the establishment of NAE, the Netherlands now has a place where important innovators and experts from engineering practice come together to actually bundle knowledge and skills.





Henk van Houten

SYSTEM IMPROVEMENTS

NAE believes that society should be striving for sustainable system improvements instead of combatting symptoms. Henk van Houten explained that a broad interdisciplinary engineering perspective has unique value, because it enables people to design innovative and sustainable solutions for social transitions, which can also contribute to our earning capacity. Such as when, after the flood of 1953, a structural and innovative solution was realized with the Delta Works, which commanded admiration around the world. This would not have been possible without joining forces between science, engineering and business.

STRENGTHENING THE DUTCH ECONOMY IN THE INTERNATIONAL CONTEXT

The smart solutions that result from joining forces are good for strengthening the Dutch economy, for example through the manufacturing industry, by scaling up technological start-ups and increasing export opportunities. Outgoing Minister Micky Adriaansens emphasized that NAE can effectively play the role of connector to comparable organizations in other countries. To learn and to promote Dutch positions and best practices. Tuula Teeri, representative of one of the oldest engineering academies in Europe (IVA), underlined the importance of international cooperation and the unique role that national academies play through their impartial and fact- and expertise-based advice to policymakers, governments and parties in the knowledge and innovation ecosystem.



Tuula Teeri

TECHNICAL KNOWLEDGE AS A MEDICINE AGAINST DISINFORMATION

NAE sees technical knowledge as a medicine against disinformation. Engineers can objectively refute false assumptions about today's major challenges with evidence-based information. Silvia Lenaerts, rector of Eindhoven University of Technology, therefore encouraged NAE to actively participate.



Silvia Lenaerts en Aldith Hunkar

MORE STUDENTS NEED TECHNICAL EDUCATION

But the Netherlands will fall behind if we fail to increase the inflow of technically skilled workers and limit the outflow. The Netherlands produces far too few technically trained people every year compared to other European countries. The 4TU Federation sees a good role for NAE to jointly address this problem. NAE has figureheads who can inspire young people to opt for a technical education.



From left: Dennis Schipper, Marieke Huisman, Christa Hooijer, Henk van Houten.

STRATEGIC THEMES



STRATEGIC THEMES

To determine our multi-year agenda, we spoke with numerous organisations and experts in the public and private sector. We also conducted a survey among members to gain insight into what they see as important themes for NAE. Based on the results, we chose six overarching and mutually reinforcing strategic themes that will be our guiding principles for the coming years. From now on, it is the NAE Fellows' turn to give concrete substance to the themes. For its elaboration, NAE explicitly seeks cooperation with the important players in the Dutch knowledge and innovation ecosystem.





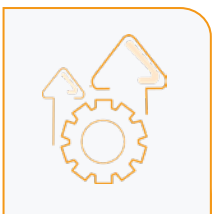
ENGINEERING TALENT

INCREASE INTRODUCTION, RESTRICT OUTFLOW, STRENGTHEN
STEM-EDUCATION

Our members are figureheads of impactful, engineering-based innovation. Making their work visible contributes to public understanding of the value of technology for society and to inspiration for young people to choose a course in one of the STEM subjects (Science, Technology, Engineering and Mathematics).

To this end, it is important that NAE shows that engineers are diverse, so that all young people can identify with them. Diversity in the workplace and in training programs is an important factor for attracting and retaining talent. For international talent, it is important to find a culture of pride and appreciation for foreign talent, as well as clarity about their opportunities for further study and career in the Netherlands.

Increasing the inflow and preventing the outflow of technical talent requires the development of well-thought-out strategies in collaboration with ecosystem parties. This includes joint initiatives at secondary schools, support for teachers and advice in developing teaching materials and attractive programs that show the practical and creative aspects of technology.



ECOSYSTEM IMPROVEMENTS

AGENDATING AND ORCHESTRATING POSITIVE ACTION

In order to guarantee the strong competitive position of the Netherlands, we believe that an integrated science, technology and innovation policy must be continuously encouraged. We see a role for NAE in putting positive action on the agenda and orchestrating specific areas, for example by strengthening the ties between (regional) knowledge institutions and large industries and small and medium-sized enterprises (SMEs). A key point is improving access to knowledge, financing and infrastructure. Breaking down those barriers paves the way for a world-class innovation climate in which knowledge can be converted into innovative ideas in a shorter time. That's going too slow now. The Netherlands develops a lot of knowledge, but lags behind Europe in converting it into actual impact.

START-UPS PLAY A CRUCIAL ROLE IN TRANSLATING NEEDED INNOVATIONS TO THE MARKET.

It is therefore essential to accelerate this process and improve the start-up ecosystem. It is not without reason that this is a strategic theme for NAE.

Eline van Beest
Treasurer





EFFECTIVE VALORISATION AND START-UPS

HOW WILL THE NETHERLANDS BECOME THE 'BOSTON' OF THE EU IN THE FIELD OF ENGINEERING AND INNOVATION?

In the ongoing search for solutions to social issues that also contribute to our earning capacity, valorisation of accumulated knowledge plays a crucial role. The Netherlands has a wealth of intellectual capital, but to fully utilize this potential, we must strengthen and accelerate our valorisation process. Start-ups are an essential link in this process. The investment climate for them in the Netherlands must improve, because currently only a small percentage of start-ups are knowledge-intensive and a small part comes from knowledge institutions.

NAE sees a role in researching what is needed in terms of growth financing for start-ups and matters surrounding intellectual property and talent with which start-ups can start in a balanced way. In the phase of growth towards scale-ups, we focus on the questions: which forms of experience-oriented support are the most effective, how can intellectual property be translated into actual impact and how can cooperation between companies and deep-tech start-ups be improved for the Netherlands to become the EU's 'Boston' in the field of engineering and innovation?



INNOVATING FOR SOCIAL TRANSITIONS

INTEGRAL APPROACH

NAE promotes the role and visibility of engineering in addressing major social issues. We look at new technologies, regulations, material scarcity, shortages of technically qualified personnel, open science and geopolitical developments. NAE sees its role as increasing understanding of these aspects and making solutions possible together with ecosystem parties. NAE wants to promote an interdisciplinary approach in creating solutions. And with a systems approach, instead of combatting symptoms. Systems thinking is the ultimate strength of engineering. Moreover, NAE does not only want to see the transitions as a problem, as a threat, but as an additional opportunity for the Netherlands to come up with innovations that contribute to our earning capacity.



INNOVATION OF THE ENGINEERING PROCESS

INFLUENCE OF ICT

Engineering and the associated technical professions are constantly changing as a result of developments in the field of ICT. The transition to software-defined systems, the need for a circular economy and developments in artificial intelligence and robotics bring new challenges and opportunities for methods and standards in the engineering process. NAE wants to increase awareness among ecosystem parties, including universities and the business community, on the impact of these developments. Consider advice and knowledge sharing about adjustment and process improvement.



INTERNATIONAL COOPERATION AND BEST PRACTICES

ACTIVE INVOLVEMENT IN EU-POLICIES AND KNOWLEDGE EXCHANGE

For NAE, cooperation does not stop at national borders. Through the International Commission it maintains relationships with international engineering academies and umbrella organizations such as Euro-CASE and CAETS. NAE encourages Fellows to participate in international committees or working groups, attend international conferences, and contribute to reports. We aim to identify insights and best practices to convey and explain the implications for the Dutch context. Innovation will always benefit from collaboration and knowledge exchange with international peers.

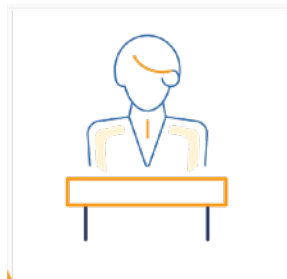


From left: Arie van Deursen, Silke Hemming, Benno van Dongen, Lucas Noldus, Willem Mulder, Catholijn Jonker, Elia Formisano, Jenny Dankelman.

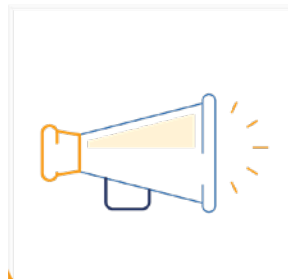
FORUM, PIVOT & ADVICE



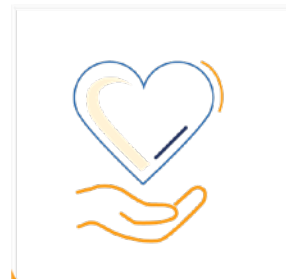
NAE develops the six strategic themes in its Forum, Pivot and Advisory functions. The Forum offers a platform for constructive debate. NAE acts as a hub in the knowledge and innovation ecosystem, orchestrating action by uniting parties behind common goals. Finally, through the Advisory Function, NAE provides action-oriented advice to stakeholders in the ecosystem – striving for complementarity and collaboration with existing advisory bodies.



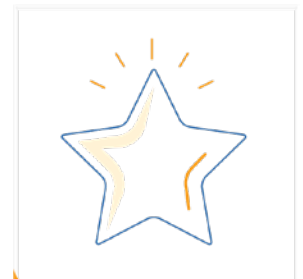
We offer a **platform** for constructive debate.



We make our **voices** heard as engineers to key decision makers.



We **promote** public appreciation for the role of technology in innovation.



We **encourage** networking & inspiration for Fellows and Young Engineers.

FORUM

Through Forum, NAE connects its members with experts from the broad knowledge and innovation ecosystem.

Our Forum Meetings are primarily aimed at our members, in which free debate and formulating next steps towards the other NAE functions form the core. NAE Expert Meetings explore pressing issues in depth and provide input to the Advisory or Key Functions. The annual Innovation Conference is our most important event for members, the business community, knowledge institutions and government, where NAE puts a current theme on the agenda for the knowledge and innovation system. It is our ambition to hold an international edition of the Innovation Conference every 5 years in collaboration with one of our international partners.

ADVICE

NAE-advice is primarily aimed at (non-governmental) stakeholders in the knowledge and innovation ecosystem, i.e. business and science. This can also be done to government agencies upon request. Our focus is on action: what specifically needs to be done, who should take care of this and how do we monitor the implementation? This should result in relatively concise and pragmatic (5 to 10 pages) advisory reports. In addition to our advice, we will also publish NAE positions

PIVOT

With NAE-Pivotactivities, we bring together actors in the knowledge- and innovation ecosystem on specific topics related to our national innovation system to orchestrate joint action. Our Pivotal Projects can arise from an NAE-advice, a Forum Meeting or a targeted question from our stakeholders.

From left: Inald Lagendijk, Ton van der Steen, Sjoukje Heimovaara.



THE FELLOWS AND YOUNG ENGINEERS FORM NAE'S THINK TANK.

Through our Forum, we give them the space to brainstorm interdisciplinary in order to arrive at good question articulation for our advice and pivotal activities.

Ton van der Steen
Board member

FELLOWS AND YOUNG ENGINEERS

Including the board members, NAE has 67 Fellows. They are leading experts in the field of technical sciences, applied research and development in the Netherlands. Fellows, who come from diverse backgrounds in science, government and industry, are selected for their impressive track record in engineering science and innovation, as well as their integrity, dedication, impact-oriented mindset that crosses sector boundaries. In the long term NAE aims to grow to 120 Fellows.

NAE has ten Young Engineers. Young Engineers are ‘transverse thinkers’ and active, enthusiastic and visible innovation leaders who have successfully realized highly innovative or design or construction solutions. They came from the predecessor of NAE: the Academy of Technology and Innovation (AcTI). The Young Engineers Program Committee ensures the participation of the next generation of top engineers in NAE’s activities and organizes activities specifically aimed at Young Engineers. The Young Engineers also participate in the regular NAE program. Ultimately, this number will grow to 15 Young Engineers.

FELLOWS SELECTION COMMITTEE

On May 19, the regulations for the election of Fellows were established. An independent Fellows Selection Committee (FSC) was installed with the task of nominating candidates for NAE membership to the NAE Board. The FSC was responsible for the correct conduct of the election procedure. The election procedure followed a carefully planned process in accordance with the Regulations of the Netherlands Academy of Engineering for the admission (nomination, selection, appointment and installation) of new Fellows. These regulations were established by the NAE board taking into account guarantees based on the KNAW Code of Conduct for Conflicts of Interest on Funds, Prizes and Memberships to prevent conflicts of interest.

On May 25, the call for candidates for NAE membership was distributed to 59 organizations eligible for nomination. This resulted in 113 unique presentations. Ultimately, the FSC submitted 62 candidates to the NAE board. The FSC proposal was adopted unchanged by the board, resulting in the appointment of 62 Fellows.



From left: Tim Baarslag, Inald Lagendijk, Kirsten Steinbusch



From left: Maarten Steinbuch, Jan van de Winkel, Hamed Sadeghian, Arjan Mol, Hans Schikan en Andrea Ramirez Ramirez.



**NAE DISTINGUISHES ITSELF BY NOT ONLY ORGANIZING
DEBATES AND PROVIDING ADVICES, BUT ALSO
ACTUALLY INTRODUCING INITIATIVES.**

The 'can do' mentality of engineers plays a crucial role in this.

Inald Legendijk
Board member

PEOPLE & RESOURCES



PEOPLE

NAE-BOARD



Henk van Houten

Chair



Sjoukje Heimovaara

Vice-Chair



Ton van der Steen

Board member



Inald Lagendijk

Board member



Eline van Beest

Treasurer

The board is unremunerated, but receives an expense allowance in accordance with the regulations for attendance fees for organisations with ANBI status.

NAE-OFFICE



Willem Jacobs

Director



Annelies ten Have

Program manager Forum



Anouk de Vlieger

PR and Communication



Jolanda van 't Hof

Office Manager

During the founding year of 2023 and in the run-up to it, Roel Meeuwesse made a major contribution as director. In addition, support was provided during the fourth quarter of 2023 in drawing up our activities plan by Jeroen Vugts. The position of webmaster is performed by Laura van Rooij (external). The office will be expanded with program managers for the Advisory and Pivotal functions.

FELLOWS SELECTION COMMITTEE (FSC)

Emmo Meijer

Chair - Chemistry - Food - Business - Top Sector Chemistry

Colette Alma

Chemistry - Business - QuerCa

Marc Hendrikse

Technology - Business - Holland High Tech

Ingrid Heynderickx

Visual Perception - TUE

René Penning de Vries

Health - Business - Academia - UTwente/PhotonDelta

Wim van Saarloos

Theoretical Physics - UL

Hans Schikan

Biopharma - Business - Pharvaris

Karin Sluis

Civil Engineering - Hydraulic Engineering Business
- Witteveen + Bos

FELLOWS



Maurice Aalders
Amsterdam UMC



Floor Alkemade
Eindhoven University of
Technology



Frank Baaijens
Eindhoven University of
Technology



Tim Baarslag
Center for Mathematics &
Computer Science, Utrecht
University



Marco Beijersbergen
Cosine



Somaya Ben Allouch
Amsterdam University of
Applied Sciences



Jos Benschop
ASML



Arie den Boef
ASML



Alessandro Bozzon
Delft University of Technology



Cees Buisman
Wageningen University &
Wetsus



Jenny Dankelman
Delft University of Technology



Piet-Hein Daverveldt
Delfland Water Board



Lieve Declercq
SPIE Netherlands



Irene Dedoussi
Delft University of Technology



Arie van Deursen
Delft University of Technology



Benno van Dongen
Roland Berger



Elia Formisano
University of Maastricht



Inez de Greef
Treeway & 3D-PharmXchange



Tim van der Hagen
Delft University of Technology



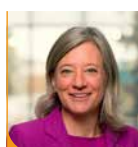
Erik Heeres
University of Groningen



Silke Hemming
Wageningen University and
Research



Paulien Herder
Delft University of Technology



Christa Hooijer
TNO High Tech Industry



Marieke Huisman
University of Twente



Suzanne Hulscher
University of Twente



Bayu Jayawardhana
University of Groningen



Catholijn Jonker
Delft University of Technology/
University of Leiden



Margrethe Jonkman
VU Amsterdam



Mandy Korff
Deltares



Rene Kuijten
EQT Group



Detlef Lohse
University of Twente



Mark van Loosdrecht
Delft University of Technology



Regina Lutge
Eindhoven University of
Technology



Abeje Yenehun Mersha
Saxion University of
Applied Sciences



Arjan Mol
Delft University of Technology



Willem Mulder
RadboudUMC / Eindhoven
University of Technology



Wiro Niessen
UMCG / University of
Groningen



Lucas Noldus
Noldus Information
Technology B.V.



Albert Polman
NWO-Institute Amolf



Jessie Qin-Dregely
Single Quantum B.V.



Andrea Ramirez
Delft University of Technology



Lukas Roffel
Thales Netherlands B.V.



Maroeska Rovers
RadboudUMC /
University of Twente



Floris Rutjes
RadboudUMC



Hamed Sadeghian
Nearfield Instruments



Jacquelin Scherpen
University of Groningen



Dennis Schipper
DEMCON



Hans Schikan
Pharvaris



Dirk Smit
Energy Transition Consultancy



Maarten Steinbuch
Eindhoven University of
Technology



Kirsten Steinbusch
DAB.BIO



Vinod Subramaniam
University of Twente



Jaap den Toonder
Eindhoven University of
Technology



Gabrielle Tuijthof
University of Twente



Jouke Velstra
Fixeau and Sourcertainable



Jolanda de Vries
RadboudUMC



Paul Vulto
Mimetas



Marco Waas
NOBIAN



Hans van der Weijde
TATA Steel Netherlands



René Wijffels
Wageningen University and
Research



Jan van de Winkel
GENMAB



Guoqi Zhang
Delft University of Technology

YOUNG ENGINEERS



Marissa de Boer
SUSPHOS



Wouter Bruins
INOVO



Jiajun Cen
AQUABATTERY



Rudy Dijkstra
ACQUAINT



Marjolein Helder
PLANT-E



Daan Luining
MEATABLE



Bart Sanders
STENTIT



Jeroen ter Schiphorst
LUSOCO



Liselotte Stolk
PRAXA SENSE

PROGRAM COMMITTEE FORUM

Gabrielle Tuijthof
Chair - University of Twente

Cees Buisman
Wageningen University & Wetsus

Jos Benschop
ASML

Silke Hemming
Wageningen University & Research

Lieve Declercq
SPIE Netherlands

Catholijn Jonker
Technical University Delft – University Leiden

Christa Hooijer
TNO High Tech Industry

Dirk Smit
Energy Transition Consultancy

Albert Polman
NOW AMOLF

PROGRAM COMMITTEE ADVICE

Maroeska Rovers
Chair - Radboud University Medical Centre

Tim van der Hagen
Delft Technical University

Mandy Korff
Deltares

Somaya Ben Allouch
Amsterdam University of Applied Sciences - UVA

PROGRAM COMMITTEE SPIL

Marco Waas <i>Chair - Nobian</i>	
Benno van Dongen Roland Berger	Tim Baarslag Center for Mathematics & Computer Science, Utrecht University
Rene Kuijten EQT Group	Regina Luttgé Technical University Eindhoven
Jouke Velstra Acacia Water and Fixeau	

PROGRAM COMMITTEE YOUNG ENGINEERS

Hans Schikan <i>Chair - Pharvaris</i>	
Suzanne Hulscher University Twente	Wiro Niessen UMCG – University of Groningen
Paul Vulto Mimetas	Jessie Qin-Dregely Single Quantum B.V.

COMMITTEE INTERNATIONAL

Lucas Noldus <i>Chair - NAE delegate for CAETS Communications Committee</i> Noldus Information Technology	
Frank Baaijens Technical University Eindhoven	Alessandro Bozzon <i>NAE delegate - CAETS working group AI</i> Technical University Delft
Jenny Dankelman <i>NAE delegate - CAETS working group Engineering for the Sustainable Development Goals - Technical University Delft</i>	Bayu Jayawardhana <i>NAE delegate - CAETS working group Diversity & Inclusion</i> Groningen State University
Lukas Roffel <i>NAE delegate for Euro-CASE</i> Thales Netherlands.	Dirk Smit <i>NAE delegate - CAETS Energy Community</i> Energy Transition Consultancy
Guoqi Zhang <i>NAE delegate - CAETS working group Engineering Education</i> Technical University Delft	

RESOURCES

GOVERNMENT SUBSIDY AND BENEFICIATION

Granting of institutional subsidy

On April 20, 2023, NAE received the decision to award the institutional subsidy for 2023 from the ministries of OCW and EZK. On November 27, 2023, they confirmed the award of the institutional subsidy for 2024.

Beneficiation from the ecosystem

The 4TU Federation granted a benefit of two times 300k for the years 2024 and 2025. The positive balance of NAE's predecessor, AcTI, was donated to NAE. This beneficiary is used for the pivotal function of NAE. A strategy to expand and perpetuate this form of financing through benefits is currently being developed.

INCOME AND EXPENSES

€	REALISATION 2023		BUDGET 2023	
INCOME				
Income from government subsidies	500.000		500.000	
Income from other non-profit organisations	144.880		130.000	
Total income		644.880		630.000
EXPENDITURES				
Spent on the targets of the association				
Forum	173.611		154.977	
Pivot	108.294		114.977	
Advice	98.294		104.976	
	380.199		374.931	
Fundraising expenses	-		-	
Cost management and administration	71.196		75.431	
Total expenditures		451.395		450.362
Financial income and expenditure		-		-
TOTAL INCOME AND EXPENDITURE				
		193.485		179.638
RESULT DISTRIBUTION				
Addition to the fund		48.605		49.638
Addition to reserve allocated to Pivot		144.880		130.000
		193.485		179.638

ANBI Status

NAE is recognized as a Public Benefit Organization (ANBI).

ANNEX 01 MILESTONES

MANAGEMENT

The founding board met seven times in 2023 and had two days of group brainstorming.



POSITION PAPER

In May 2023 we published our position paper.
[Download here](#)



HEADQUARTER

On July 1, 2023, NAE moved into its office at Koninginnegracht 19 in The Hague.



COMMUNICATION

On May 25, NAE launched its website www.nae.nl. The foundation has also been laid for one communication plan.

EXECUTION PLAN

The position paper was translated into the NAE execution plan during the second half of 2023.
[Download here](#)



STAKEHOLDER ENGAGEMENT

We spoke to the organisations below during 2023 in the context of stakeholder engagement to investigate opportunities for collaboration and to receive input for the NAE Execution Plan: KIVI, NWO, ROM Netherlands, VNO-NCW and MKB-Nederland, Techleap, Arthur D. Little, Invest NL - Deep Tech Fund, KNAW, STT, Top Sector ICT, Top Sector Energy and the University of Amsterdam. Regular contact moments took place with the 4TU Federation and the Ministries of Economic Affairs and Climate Policy and OCW during 2023.

TEKNOLOGY 2023

On June 27, 2023, the NAE founding board introduced NAE during TEKNOLOGY.





23 MEI

SOCIAL MEDIA

NAE has had a LinkedIn account since May 23, 2023. The number of followers grew during the year to 1050 followers. The number of unique spontaneous views was highest in May due to the launch of NAE and in November due to the announcement of the Fellows and publications related to the opening of NAE. The numbers vary between 1000 and 2500 views. The social media strategy is part of the overall NAE communications strategy.



MEMBERSHIP EURO-CASE

On September 26, we received membership of Euro-CASE from chairman Tuula Teeri at the annual conference of Euro-CASE in Madrid.



MEMBERSHIP CAETS

On November 10 in Zagreb, NAE became a member of the International Council of Academies of Engineering and Technological Sciences (CAETS).



OPENING AND INSTALLATION FELLOWS

On November 13, 2023, NAE celebrated its opening and the installation of the Fellows.



MEDIA

14 NOVEMBER

NRC publishes the article: 'Thinking like an engineer': solution-oriented. [Read the article>](#)

14 DECEMBER

Delta, the journalistic magazine of TU Delft, publishes the article 'NAE wants to be an engineering club with decisiveness' [Read the article>](#)



ACADEMIC STARTUP COMPETITION (ASC) 2023

On September 29, 2023, NAE participated in the Academic Startup Competition – Get connected.



INNOVATING R&D

NAE and Arthur D. Little reached an outline agreement in 2023 on cooperation in, among other things, a series of events in the context of the theme of innovation in the engineering process and the conduct of an international study in this regard. With the collaboration, both organizations aim to enable companies and individuals to learn from each other.

ANNEX 02

CODE OF CONDUCT TO PREVENT CONFLICTS OF INTEREST

Although NAE expressly seeks cooperation with government agencies, knowledge institutions and companies, NAE is completely independent in determining its agenda and forming its positions and advice. To ensure the independence of its board, committees, working groups and office staff and to avoid (the appearance of) a conflict of interest, NAE requires that all members and staff adhere to a code of conduct.

We therefore subscribe to the KNAW Code of Conduct for conflicts of interest in funds, prizes and memberships and the KNAW Code of Conduct to prevent the (appearance of) a conflict of interest. This concerns the following situations:

- A** issuing written advice or developing Pivotal Activities;
- B** the assessment of nominations for membership of NAE (Fellows and Young Engineers);
- C** the assessment of nominations for awards.

In addition, as an elaboration of the KNAW codes in our internal regulations, we have arranged a number of things with a project proposal form and a declaration of interests.

The project proposal form contains questions that touch on the preconditions within which an NAE Advice or Pivotal Activity must be achieved. The declaration of interests is an online form in which working group members for an Advisory or Pivotal Activity fill in questions about any conflicts of interest due to side activities, financial and personal circumstances. Project proposals and declarations of interests are assessed by the responsible board members and chairmen of Program Committees.

The prevention of (the appearance of) conflicts of interest is also anchored in the financial reporting. NAE receives funding from the government and from the knowledge and innovation ecosystem, including knowledge institutions and industry, to support its activities and organisation. To prevent (the appearance of) a conflict of interest, our budget and accounting is set up in such a way that there is a strict separation between government subsidies and ecosystem benefit funds and the associated expenses.

Our Forum and Advice tasks are financed exclusively with public funds (government subsidy). Funding from the ecosystem is only used for the Pivotal Function.



ANNUAL REPORT 2023

Version: 292404TBF

Texts: : NAE

Design & layout: Laura van Rooij, The Branding Foundation

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