

Collaboration, connection and innovation

Implementation plan NWO Domain Social Sciences and Humanities

Contents

Introduction	3
1 NWO's role for the social sciences and humanities	4
2 Ambitions	6
2.1 Nexus: agendas, connecting science and society	6
2.2 People: perspectives for researchers	9
2.3 Research: collaboration for excellence and innovation	11
2.4 Infrastructure: accessible and sustainable scientific infrastructure	14
2.5 Knowledge utilisation: effective use of knowledge through co-design and co-creation	16
3 Organisation	19
4 Summary	21

Introduction

On 1 January 2017, a transformed NWO started. One of the department units is the domain Social Sciences and Humanities (SSH), which arose from the merger of the former NWO divisions Social Sciences (MaGW) and Humanities (GW). Setting up an SSH domain seems to be an obvious thing to do, especially as we have become used to talking about "SSH" within the European context. Nevertheless, the concept of an SSH domain is scarcely found among any other research funding bodies in the world.

The contrasts between the humanities and the social sciences are often the reason why the funding of these sectors falls under different organisations. In the Netherlands, a different course was chosen. On the one hand, this course poses the challenge of serving a wide variety of very different disciplines as well as possible within a single domain, yet on the other hand, a single SSH domain gives a unified voice in a wide range of administrative and scientific bodies.

The transformed NWO formally started in 2017. Much of what has happened in 2017 and 2018 has been business as usual. NWO-SSH realised the old programmes of the Social Sciences (MaGW) and Humanities (GW) divisions, as a result of which researchers have scarcely noticed the effects of the new NWO up until now. And that is good news. During the transition process, the "shop" kept running. Furthermore, NWO has used this initial period to design a new strategy, which was presented to the Minister of Education, Culture and Science on 11 April 2018 and which provides the frameworks within which the domains shall operate in the future.

With this implementation plan, the NWO Domain Social Sciences and Humanities provides a concrete realisation of the NWO strategy. Moreover, NWO-SSH shall also shape its nexus role by seeking to establish good connections between researchers and between science and society. Such connections will be established to optimally position the social sciences and humanities within the Netherlands and beyond. Furthermore, there will be five main lines of funding: the NWO Talent programme, the NWO Open Competition, the Dutch National Research Agenda, research in the context of the Knowledge and Innovation Contract (the "top sectors") and the funds for large-scale infrastructure. It is within these lines of funding that the SSH Domain will facilitate excellent research in the social sciences and humanities and ensure that this research has both a scientific and societal impact.

The further elaboration and development of NWO-SSH's ambitions will mainly take place in the annual plans and their associated budgets.

During the writing of this implementation plan, grateful use was made of the valuable reactions that the domain received from a large number of researchers, administrators and policymakers from knowledge institutions in response to the open consultation.

We want to thank everybody who shared their thoughts with us.

Wim van den Doel,
Chair Social Sciences and Humanities Domain Board

Dirk-Jan den Boer,
Director NWO Domain Social Sciences and Humanities

1 NWO's role for the social sciences and humanities

Social sciences and humanities – facts and figures

The social sciences and humanities (SSH) cover a broad and heterogeneous range of academic disciplines that are grouped under the categories social and behavioural sciences, law, economics and humanities. NWO has divided the entire academic field into 39 main disciplines; no less than 26 of these fall within the broad domain of the social sciences and humanities.

There are 52 SSH faculties at Dutch universities, with a total capacity of about 15,000 researchers. Additionally, various KNAW and NWO institutes also operate in the area of the social sciences and humanities. NWO funds about 3300 FTE of the SSH researchers in the Netherlands.

NWO currently manages about 1800 research projects in the area of social sciences and humanities. That is about 40% of all current NWO projects. Each year, SSH researchers receive large individual grants from NWO, such as the Spinoza Prize, Stevin Prize and Vici grants.

Dutch research in the social sciences and humanities is among the best in the world. For example, Dutch SSH researchers are very successful in the ERC programme, where they acquire relatively more grants than researchers from large science nations such as the United Kingdom, Germany and France.

Strength and added value of the social sciences and humanities

Societal issues can only be addressed by taking society as a starting point and yardstick and continually asking questions from different perspectives. And that is what researchers in the social sciences and humanities do.

Research in the social sciences and humanities yields up-to-date knowledge and insights about people, human behaviour and products of the human mind: the human factor. This improves our understanding of society and enables us to explain societal developments.

Knowledge from SSH research is therefore essential for tackling major scientific and societal issues, such as the ones concerning migration, climate change, the impact of new technologies, sociocultural diversity and geopolitical shifts. The social sciences and humanities are therefore immensely valuable for business services, education, the cultural sector, public governance, healthcare *and* the technology sector.

Collaboration, connection and innovation

The goal of NWO Domain SSH is to optimally facilitate the social sciences and humanities in realising this scientific and societal role by supporting the entire breadth of the field, by encouraging collaboration, connection and innovation within and outside of science, and by realising a well-balanced policy (including funding) that meets the needs of the field. Accordingly, NWO-SSH will realise the mission, vision, ambitions and core values of NWO, which form the golden thread for the actions of all NWO units.

Mission, vision, ambitions and key values of NWO

Mission

NWO facilitates scientific research of international repute, that has both scientific and societal impact.

Vision

NWO facilitates excellent, curiosity-driven disciplinary, interdisciplinary and multidisciplinary research. NWO aims at all scientific disciplines and across the entire knowledge chain, focussing on curiosity-driven research. NWO connects researchers from all scientific disciplines and the entire knowledge chain and brings researchers and societal partners together. NWO finances personal and material costs for scientific research and activities in the area of knowledge utilisation at Dutch universities and public research institutions. NWO invites partners, with their own knowledge questions, from industry, government and civil society organisations to contribute to the programming, realisation and co-funding of scientific research in the Netherlands.

Ambitions

NWO has formulated five ambitions for the period 2019-2022:

- A. Nexus: agendas, connecting science and society;
- B. People: perspectives for researchers;
- C. Research: collaboration for excellence and innovation;
- D. Infrastructure: accessible and sustainable scientific infrastructure;
- E. Knowledge utilisation: effective use of knowledge through co-design and co-creation.

The individual organisational units of NWO contribute to realising these ambitions. They do this from the perspective of their connecting, financing and/or implementing roles. They match their activities with the needs, expertise and knowledge of Dutch science and society.

Key values

To realise its ambitions, NWO has adopted four key values that underpin its daily work:

- Groundbreaking: NWO pioneers and explores the boundaries of existing knowledge, applications and processes.
- Committed: NWO anticipates developments in science and society.
- Reliable: NWO does what it promises and is honest, transparent and meticulous.
- Connecting: NWO has an open attitude and connects actors, expertise and agendas.

Source: NWO strategy 2019-2022

Chapter 3 of this implementation plan describes how each of NWO's five ambitions has been translated to the social science and humanities.

2 Ambitions

2.1 Nexus: agendas, connecting science and society

Summary

NWO-SSH seeks to strengthen its role as an intermediary - nexus - by making the connection between researchers and between science and policy/civil society organisations. Therefore, NWO-SSH shall periodically organise a large conference for SSH researchers and regularly organise small-scale meetings to facilitate and support researchers optimally. Such meetings are also useful for acquiring information. The domain board considers good contact with universities and other institutions to be important and shall therefore establish platforms and make site visits.

The strong connection of the research within the social sciences and humanities with societal sectors is also expressed in the collaboration with public and private stakeholders (government bodies, education, societal and cultural organisations, companies and citizens). NWO-SSH shall bring together science and relevant public and private parties for the development (co-design) and realisation of research programmes that contribute to insight and solutions for societal issues (co-creation), especially in the context of the Dutch National Research Agenda. International networks contribute to the exchange of knowledge and data and are therefore valuable for the development of SSH research.

Role NWO Domain SSH

Within the Dutch science system, NWO is undisputedly seen as an independent and reliable partner. That certainty forms the basis for NWO-SSH's role in realising greater coordination within the social sciences and humanities and in making connections between science and public and private stakeholders (government bodies, education, societal and cultural organisations, companies and citizens). NWO-SSH realises this nexus role by encouraging, generating and disclosing knowledge that provides the basis for solutions to societal issues in close collaboration with parties within and outside of science.

In short, NWO-SSH seeks to make connections between researchers within the social sciences and humanities:

- among the researchers;
- with researchers from different domains;
- as well as with societal stakeholders.

Dialogue in science

The annual national conference, organised by NWO-SSH, is one of the few opportunities in the Netherlands where researchers from all disciplines within the social sciences and humanities can meet each other. For researchers, the conference serves as both a networking event as equally an opportunity to inspire and be inspired. It is also a moment when the domain board can meet researchers and acquire and share information.

In the future, NWO-SSH shall organise and facilitate additional meetings – in cooperation with other NWO domains, where relevant – to support researchers in setting the agenda for key societal issues, the associated questions and the preparation of funding proposals. This applies to the Dutch National Research Agenda and the programmes that have arisen in the context of the agreement with the top sectors (Knowledge and Innovation Contract) in particular. The requesting of funding for and the realisation of a significant part of this research will be in the

hands of consortia. NWO-SSH shall facilitate researchers in finding each other and possible consortium partners so that strong consortia arise to draw up proposals, carry out research and achieve top results.

The development of innovative programmes and current knowledge agendas in the context of the Dutch National Research Agenda and the Knowledge and Innovation Contract depends on the commitment of researchers. NWO-SSH will develop platforms along thematic lines to facilitate that commitment to create a social infrastructure that feeds NWO policy and that ties in with developments in the social sciences and humanities – in connection with other science areas.

- The SSH Domain Board will reserve budget for the funding of small-scale networking activities such as meetings and platforms.
- NWO-SSH will make site visits to universities and relevant institutes to properly inform researchers about policy, instruments and calls. These visits will preferably have an interactive character under which the institutions will also provide information from their side, especially about policy-related issues.
- The SSH board highly appreciates being able to make use of the expertise of and feedback from researchers and other stakeholders. The board shall therefore regularly invite them to exchange ideas.
- NWO-SSH will maintain close contacts with the deans and faculty boards, institute directors, the KNAW Humanities Domain and the Behavioural Sciences, Social Sciences and Law Domain, and with the Social Sciences and Humanities (SSH) Council, which was established for the entire field of the social sciences and humanities and is chaired by the KNAW.
- The collaboration with the NWO and KNAW institutes in the area of the social sciences and humanities (DANS, Fryske Akademy, Huygens ING, IISG, KITLV, Meertens Institute, NIOD Institute for War, Holocaust and Genocide Studies, NIDI, NIAS, NSCR) now mainly occurs on an ad hoc basis or within projects. In the coming period, NWO-SSH shall further review this collaboration.

As new insights often arise at the boundaries of scientific disciplines, NWO-SSH, in its nexus role, shall try to realise more interdisciplinary collaboration both between the disciplines within its domain as well as with disciplines from other domains, and public and private organisations will have a clear role in this. It is vital that interdisciplinary research is intellectually challenging for all disciplines and is aimed at relevance as well as innovation.

Within the Dutch National Research Agenda and the Knowledge and Innovation Contract, NWO-SSH will seek sufficient opportunity for such relevant and innovative interdisciplinary research. The basic premise is that the social sciences and humanities must have a fully-fledged position in interdisciplinary research that cuts across domains. Involving the human and societal/cultural aspects right from the start is a necessary condition for the research questions that researchers from other scientific areas formulate. In the calls for proposals and the associated communication, NWO-SSH will request clear and attractive attention for these aspects. Only then will meaningful changes be able to take place.

Responsible innovation

NWO-SSH has a lot of experience with interdisciplinary research, for example in the Responsible Innovation programme. This programme maps the possible societal and ethical issues of a (technological) innovation at an early stage with the aim of realising responsible innovations that can count on broad public support. Researchers from the humanities, natural sciences and social sciences work together in projects and jointly approach the issue from the perspective of their

expertise to guarantee an integral approach.

Dialogue with society

The strong connection of the research in the social sciences and humanities with societal sectors is expressed in collaborations with societal stakeholders.

Platform31

Platform31 is one of the intermediary organisations that NWO-SSH collaborates with. This platform connects research, policy and practice in the area of cities and regions. Through its large network – more than 300 partners: advisory bureaus, corporations and market parties, ministries, provinces and cities – many participants have access to NWO-SSH research.

For the development (co-design) and realisation (co-creation) of research programmes that contribute to insights and solutions or societal issues in the context of the Dutch National Research Agenda and the Knowledge and Innovation Contract, NWO-SSH will bring together science and relevant societal partners.

- NWO-SSH shall develop a communication strategy to bring together researchers and societal stakeholders via meetings and online platforms.
- More than in the past, NWO-SSH shall encourage researchers to share the importance of their research and research results with societal stakeholders and to collaborate with them. Stakeholders should be involved not just in the individual research projects or programmes but also in their design and structure.
- Where relevant, NWO-SSH shall connect research with policy, for example through organising workshops and encouraging researchers to present their results in policy papers as well. NWO-SSH will also work with intermediary organisations that form a link between knowledge and society in a specific area.
- Furthermore, NWO-SSH shall facilitate researchers by providing best practices and information about specific subjects. Newsletters, the NWO-SSH website and workshops are appropriate instruments for this. In the coming period, NWO-SSH shall explore the possibilities for deploying new digital instruments, such as webinars.
- NWO-SSH shall keep a good eye on citizen science: the involvement of citizens in the collection of data and/or data annotation, formulation of research questions and dissemination of results. Experience has already been acquired with this in various programmes in the form of valorisation and citizens panels. As part of the palette of NWO's funding modules, the domain shall further explore the possibilities that citizen science offers. The involvement of citizens can lead to additional knowledge about and a better understanding of the scientific process and, with that, higher confidence in the independence and reliability of scientific knowledge.

International dialogue

Collaboration between researchers across national boundaries contributes to innovation, and that is especially the case for the social sciences and humanities. Dutch researchers have achieved excellent results in international collaborations.

In the coming years, NWO-SSH will explore the possibilities of organising a large-scale, international, mission-driven programme that fits within the Dutch National Research Agenda, has added value in Europe and works with a lead agency as the assessing authority.

HERA and NORFACE

For many years, the social sciences and humanities have participated in international networks of research funding bodies including HERA (Humanities in the European Research Area) and NORFACE (New Opportunities for Research Funding Agency Cooperation in Europe). This NWO-SSH policy arises from the conviction that scientific and societal issues are not national in nature and that international collaboration often leads to a strengthening of research. The networks contribute to the international exchange of knowledge and data and are therefore valuable for the development of SSH research.

2.2 People: perspectives for researchers**Summary**

In the coming period, NWO-SSH wants to ensure that the best researchers retain sufficient perspective for realising curiosity-driven research, in both small and large research projects as well as in more fundamental and more practice-oriented research projects.

NWO-SSH will therefore continue to invest in individual talent. During the transition of the Innovational Research Incentives Scheme to the NWO Talent Programme, NWO-SSH will take due account of the needs within the field.

NWO-SSH will offer senior researchers possibilities for funding via the NWO Open Competition SSH. NWO-SSH will monitor and evaluate whether mid-career researchers have sufficient opportunities in other funding instruments.

In both the NWO Talent Programme and the Open Competition, NWO-SSH will serve the entire breadth of the domain by working with assessments of subareas via panels.

Curiosity-driven top research

NWO-SSH is responsible for a large and diverse scientific field. In the coming period, NWO-SSH wants to ensure that the best researchers retain sufficient perspective for realising curiosity-driven research, in both small and large research projects as well as in more fundamental and more practice-oriented research projects.

When assessing proposals, NWO-SSH will pay careful attention to detecting top researchers from all SSH disciplines with equal opportunities for all participants. Selection via panels will therefore continue for the rounds where that is already the case. Even when the application pressure is high (as in the Veni round for 2018, for example), NWO-SSH will continue to use this approach and, in principle, will do this for all other "larger" funding instruments as well.

To ensure a balanced, rational research portfolio, NWO-SSH will provide shelter for excellent research within science areas that are sometimes vulnerable ("small areas") and can less easily connect with large-scale multidisciplinary or interdisciplinary research agendas, such as programmes in the context of the top sectors and the Dutch National Research Agenda. NWO-SSH will develop appropriate measures ("incentives") for these vulnerable areas to facilitate talent development and curiosity-driven research.

Talent

NWO-SSH will continue to invest in individual talent via the NWO Talent Programme, which is currently being developed as a successor to the Innovational Research Incentives Scheme. In doing so, NWO-SSH will pay due consideration to the needs of the field. In the spring of 2018, two significant measures were introduced, namely preselection of Veni candidates on the basis of a CV and research idea and the embedding guarantee for Vidi candidates. This is why NWO-

SSH has put other ideas on hold, such as the ratio between the number of positions Veni-Vici and the introduction of team Veni grants. NWO-SSH will consider these other measures later in the strategy period. During this process, NWO-SSH will consult with researchers in the domain.

With the PhD positions within projects (in the Vidi, Vici and Open Competition projects as well as in the context of the Dutch National Research Agenda and the top sectors), NWO is investing in the development of the next generation of researchers.

Application pressure initiative in the Veni

NWO-SSH is taking the initiative to adopt measures against high application pressure that provide genuine relief for the field. One measure to limit the workload of applicants and assessors concerns the Veni round of 2019 where a pre-proposal based on a more narrative CV and research idea has been introduced. Another is a pre-proposal based on a global research idea in the NWO Open Competition-SSH 2019. In both cases, it concerns a pre-proposal that leads to a decision about whether to elaborate the proposal: only some of the pre-proposals will result in the submission of a full proposal.

Open Competition

Researchers must retain perspectives for funding outside of the NWO Talent Programme. Senior researchers can continue and develop their line of research in the NWO-wide programme NWO Open Competition SSH. In this context, NWO-SSH offers researchers the possibility to apply for funding for both large and small projects. The Open Competition funds both the deepening and expansion of existing lines of research (the reproducibility of results, for example). This is vital for scientific development but also for the improved embedding of research groups in the science system.

Within this programme, funding is made available via funding modules from the standard palette. Due to the high application pressure, the domain cannot avoid the use of limiting conditions for the submission of proposals. However, researchers will benefit from these measures through higher award rates and limited application pressure.

After the funding round in 2019, an evaluation will take place that will reveal whether this measure is effective enough to achieve the desired award rate of about 25%. The extent to which mid-career researchers, who cannot participate in the funding round for 2019 due to limiting conditions, participate in other funding rounds such as those in the context of the Dutch National Research Agenda and the top sectors, will also play a role in the monitoring and evaluation.

Tailored applications

NWO has established a palette of funding modules to facilitate unity and transparency in the funding that can be applied for. NWO-SSH has chosen to make almost all modules available for the NWO Open Competition SSH and has thereby given maximum space to researchers to apply for what they think is needed to realise the intended project. During the assessment of these proposals, NWO-SSH will carefully examine whether the composition and size of the modules are appropriate for the research question.

International component

Realising a part of the research abroad can contribute to the acquisition of new skills and knowledge as well as connections with researchers in international networks. Via the Money follows Researcher scheme, the researcher can, under certain conditions, take a remainder of the funding to a foreign research institute to complete the project.

The Money follows Cooperation scheme offers the opportunity to include foreign partners in the consortium under certain conditions, such as the international component being necessary to boost the research at a Dutch institution. After a while, NWO-SSH will evaluate whether and how applicants have made use of this possibility.

Matthew effect

NWO-SSH is paying due attention to the possible consequences of the Matthew effect. The domain is investigating its magnitude and will take measures to safeguard the balance of awards, for example in the Gravitation rounds and the NWO Open Competition SSH. During the assessment of proposals, the emphasis should be on the research-related criteria and less on past performance.

Funding lines

The harmonisation of funding instruments has resulted in the following palette for the SSH domain, where each funding line has a unique objective:

1. **NWO Talent programme:** curiosity-driven, non-programmed research aimed at research talent;
2. **Open Competition:** curiosity-driven research;
3. Programmes in the context of the **Dutch National Research Agenda** for scientific and/or societal breakthroughs, in collaboration with public and/or private stakeholders where relevant;
4. **PPP:** projects or programmes in the context of the Knowledge and Innovation Agendas and collaboration with external public and/or private parties;
5. **Specific programmes:** programmes in the context of HERA, NORFACE, the Merian Fund with third countries, and the Caribbean research programme;
6. **Infrastructure:** the realisation of large-scale infrastructure.

In most cases, programmes and projects from the aforementioned lines of funding will be configured using the following modules:

- a. personnel: researcher in training/PhD, postdoc, researcher, non-scientific personnel;
- b. materials;
- c. investments: infrastructure, databases;
- d. knowledge utilisation;
- e. internationalisation.

2.3 Research: collaboration for excellence and innovation

Summary

NWO-SSH is firmly committed to encouraging interdisciplinary collaboration and collaboration between science and society to help contribute to solutions for societal challenges (both national and global) via programmes in the context of the Dutch National Research Agenda and the Knowledge and Innovation Contract (top sectors).

Within the Merian Fund, NWO-SSH will also seek to programme research for global challenges. NWO-SSH is committed to ample opportunities for contributions from the social sciences and humanities in the successor to the current Knowledge and Innovation Agenda (after 2019).

Research for societal challenges

NWO-SSH shall continue to emphasise that social sciences and humanities research

is vital for addressing societal challenges – in the context of the Dutch National Research Agenda and the Knowledge and Innovation Contract – and for contributing solutions to these. With this, NWO-SSH will make every effort to encourage interdisciplinary collaboration and collaboration between science and society. That is part of its nexus role. When it comes to global issues, NWO-SSH has considerable experience in collaborating with international stakeholders, and this collaboration will continue to be a focus in the coming period.

Within the Merian Fund, NWO-SSH will also seek to programme research for global challenges. NWO is setting up this fund to increase the visibility and profile of Dutch science abroad. The international collaboration with emerging science nations and developing countries fulfils an important role in this respect. The golden thread is formed by research that supports achieving the United Nations' Sustainable Development Goals (SDGs).

Dutch National Research Agenda and top sectors

The Dutch National Research Agenda and the Knowledge and Innovation Contract are aimed at generating scientific and societal impact in collaboration with public and private stakeholders. NWO-SSH shall support the field to make the contribution from the social sciences and humanities to societal challenges possible.

Dutch National Research Agenda

The Dutch National Research Agenda offers possibilities to encourage and facilitate bottom-up scientific research based upon both the routes (or parts of these) as well as the 140 questions these cover. At the same time, there are possibilities to connect the agendas and issues from government bodies and societal organisations with the Dutch National Research Agenda through the development of thematic programmes.

The Dutch National Research Agenda has four lines of action, which are:

1. research along Dutch National Research Agenda routes through interdisciplinary consortia that cover the breadth of the knowledge chain;
2. a subprogramme that makes it possible for government departments to invest in parts of Dutch National Research Agenda routes;
3. maintaining networks that have been created in the context of Dutch National Research Agenda routes and attention for developments and new knowledge questions from society;
4. science communication and outreach to actively inform society about the research results.

The first line offers possibilities to set up substantial research lines and groups over an extended period (more than four years) and to realise successive projects, as well as to create excellent collaborations.

The SSH Domain Board believes it is vital that issues relevant for the domain, public and private organisations and researchers are connected with each other, and it will encourage the formation of such collaborations in the years to come. As stated in the section about the nexus role, NWO-SSH shall facilitate researchers in this process.

Top sectors

The contribution from NWO to the top sectors for the period 2018-2019 is described in the Knowledge and Innovation Contract (KIC). In this timeframe, NWO-SSH will focus on realising the initiatives established in the Knowledge and Innovation Contract for the NWO-SSH contribution to all top sectors. NWO-SSH will work closely with the other NWO domains to realise this. In the KIC 2018-2019 NWO-SSH coordinates the top sectors Creative Industry and Logistics. Moreover, NWO-SSH executes the Social Innovation Agenda.

NWO-SSH seeks to realise domain-overarching connections via various thematic programmes in the KIC, such as Digitisation, Transitions and Behaviour, Future of Work, and Big Data & Health. Within the Top Sector Logistics, NWO-SSH programmes interdisciplinary research for societal challenges in logistics, mobility and transport. Via de Roadmap Smart Culture, NWO-SSH puts research in the arts, culture and the creative industry on the agenda.

Furthermore, the domain also supports large and long-term projects. "Sustainable Living Labs" is a good example of this.

Sustainable Living Labs

This programme concerns research into actual situations within Logistics. Due to the connection with the programme Responsible Innovation, the consortia consist of researchers from the humanities, natural sciences and social sciences. The development of a real-life environment for interdisciplinary research and logistics ties in well with the need for researching societal challenges.

As the scale of the intended living labs must be large enough to ensure that outcomes are also relevant and can be scaled up, the programme concerns large projects with a budget around 3 million euros (grant from NWO and co-funding from public and/or private partners). In Sustainable Living Labs, NWO, TKI Dinalog, the Taskforce for Applied Research (NRPO-SIA) and the Ministry for Infrastructure and Water Management work together with the top sectors Energy and Water & Maritime.

NWO-SSH has also shaped the Social Infrastructure Agenda, which offers opportunities for SSH research that contributes to themes aimed at broad societal challenges within the top sectors. Examples of programmes within the Social Infrastructure Agenda are the Human Capital Agenda, Sustainable Business Models, Cyber Security and Responsible Innovation. The Social Infrastructure Agenda makes it possible to clearly position the social sciences and humanities in interdisciplinary research aimed at societal challenges.

Programmes in the future

In the programme for the top sectors, NWO-SSH connects with the Dutch National Research Agenda routes and knowledge and innovation agendas important for the social sciences and humanities, where relevant. Examples of such routes are: Towards Resilient Societies; Living History; Logistics and Transport in an Energetic, Innovative, and Sustainable Society; Between Conflict and Cooperation; Art: Research and Innovation in the 21st Century; and Smart, Liveable Cities. This research links everyday practice, societal relevance and scientific challenges, and strengthens the interaction between science and society. Calls for proposals are published in a coordinated manner and researchers from various programmes are brought together.

New types of research, such as research through design and artistic research, are an explicit part of the programme.

The preparations for the Knowledge and Innovation Contract 2020 and beyond will start in late 2018. The Dutch National Research Agenda will also be developed further. The knowledge and expertise of the SSH field must be involved in this. NWO-SSH will devote considerable attention to the conditions consortia must satisfy to realise interdisciplinary research in the context of open Knowledge and Innovation Contract calls.

NWO-SSH is committed to ample opportunities for contributions from the social sciences and humanities in the successor to the current Knowledge and Innovation Agenda (after 2019). Consequently, the domain board shall further develop the

Social Innovation Agenda in the coming period and, in this, state the themes with which NWO-SSH is in an ideal position to contribute to the top sectors. NWO-SSH is calling for the clusters that will be established for the follow-up to the Knowledge and Innovation Agenda to include space for SSH research.

2.4 Infrastructure: accessible and sustainable scientific infrastructure

Summary

Just like for other domains, a strong research infrastructure is vital for excellent SSH research. This infrastructure consists of research data that must not only be collected but also stored, made accessible and analysed. Besides this data, a good ICT infrastructure is essential to support digital developments and to make new and innovative social sciences and humanities research possible.

Furthermore, equipment for neurocognitive research is important to guarantee the strong international position of such research. Substantial investments are needed to realise this robust SSH infrastructure. Fragmentation must be avoided and existing initiatives must be consolidated as much as possible to ensure sustainability in the longer term. Such efforts can further build upon the national and international initiatives in which Dutch SSH researchers already play an essential role.

Within its nexus role, NWO-SSH can mainly help by i) bringing together the national and international scientific and societal partners and ii) creating a situation in which the field sets its own priorities and makes its own choices.

Need and importance

The need for investments in and access to large scientific infrastructures is considerable. This concerns facilities to establish new longitudinal sources or data collections or to continue and expand existing facilities. Furthermore, a substantial investment is needed to store and disclose such data in a FAIR manner and to link data sources with each other (this will require considerable hardware and software but also human resources with respect to ethical and legal aspects, big data and the like).

The importance of good research infrastructure for the social sciences and humanities is also visible in Europe and beyond. The organisations around SSH infrastructures recognise the importance of international collaboration and were among the first to form a European Research Infrastructure Consortium (ERIC): CESSDA-ERIC, CLARIN-ERIC, DARIAH-ERIC, ESS-ERIC and SHARE-ERIC. Two of these international ERICs are led by a Dutch person. The NWO/KNAW institute DANS and Dutch universities play a prominent role in almost every ERIC. The superb international position of Dutch researchers in the area of data collection should grow in the field of (human) Big Data.

Social sciences and humanities and the national investment agenda

The Permanent Committee for Large-Scale Scientific Infrastructure advises on strategic policy for encouraging the development of and participation in national and international infrastructure initiatives. The Permanent Committee has drawn up a National Roadmap for Large-Scale Research Facilities as a basis for the national investment agenda. An assessment framework is used to make the funding available via an allocation key for five years. At least ten percent of this budget for large-scale scientific infrastructures is allocated to SSH. The Permanent Committee ensures that the scientific fields work together as well as possible for the development of the research infrastructures and that they prioritise their own needs in this area.

Nexus role of NWO-SSH in the area of research infrastructure

NWO-SSH supports the policy of the Permanent Committee by encouraging researchers to submit good and thorough proposals for the roadmap round. NWO-SSH encourages knowledge dissemination by the organisations involved in digital infrastructures within the field. Furthermore, NWO-SSH shall also promote collaboration with similar organisations in the future wherever this is possible and useful. This could concern issues such as sustainable funding, but also legal and ethical issues, the development of methodologies and techniques, accessibility, storage, linking of data, curation, user involvement, et cetera. NWO-SSH supports the social sciences and humanities field in the expansion of CLARIAH, the setup of ODISSEI and the setup of and coordination with related international infrastructure initiatives (for example with Biobanking and BioMolecular resources Research Infrastructure BBMRI-ERIC).

The need for infrastructural facilities is greater than the financial possibilities and consequently coordination with stakeholders is essential for realising a strategy for the development and sustainable funding of large-scale infrastructure facilities for the field. Researchers and scientific users should make choices in this regard and establish long-term priorities. The domain will advise researchers on how to organise the decision-making process for such choices.

CLARIAH and ODISSEI

A solid data infrastructure is vital for the development of the domain. With CLARIAH, the Netherlands plays a leading role in the digital revolution that is taking place in the humanities. Via this distributed infrastructure*, researchers will have sustainable access to large collections of digital data and user-friendly applications for the processing of that data. An integrated flexible infrastructure is also under development within the social sciences: ODISSEI. It is used for the collection, integration, storage, enrichment and disclosure of social sciences data by and for researchers. The research field will be shaping this platform further in the coming years. NWO-SSH shall monitor this process and actively support it where necessary.

CLARIAH has been embedded at the KNAW; for ODISSEI, the first steps have been taken to realise a well-equipped structure that can be further expanded into an infrastructure for the entire broad field of the social sciences over the coming years. CLARIAH and ODISSEI are initiatives that will provide an important part of the Dutch contribution to the international ERICs. A sustainable business model is necessary to realise this.

*Distributed infrastructure differs from single site infrastructure (such as a telescope or fMRI device). The collection and storage of the data can occur at various "authorised" locations. Findability of the data proceeds via a central hub.

Funding instruments for infrastructure

NWO-SSH wants to invest in the further development of a national infrastructure that is broadly accessible. Universities only have limited funds available for infrastructure. NWO-SSH will therefore make the module for small-scale infrastructure available in the NWO Open Competition SSH from the first round in 2018 onwards. NWO-SSH supports and encourages the field to collaborate to optimally use the opportunities available. At the same time, the programme NWO Investment Grants Large offers researchers the possibility to apply for funding for the realisation and further development of infrastructures with a larger budget, for advanced equipment or innovative data collections.

Open science

NWO-SSH emphasises the importance of open science. This concerns both open access publications as well as the sharing of data. The NWO/KNAW institute DANS plays an active role in the development of Open Science, in the international Data Alliance (RDA) and the Science Europe Data Management workgroup. The ERICs CLARIN, DARIAH, CESSDA and BBMRI play an active role in the development of EOSC (European Open Science Cloud).

National facilities

Science has a growing need for the rapid analysis, storage and accessibility of research data. A good ICT infrastructure is therefore essential for social sciences and humanities research in order to support digital developments and to make new and innovative research possible. This is also because researchers often work with privacy-sensitive data (personal data), which makes access to a high-performance computer that can be shielded from the outside world vital.

NWO-SSH believes it is imperative that a structural facility becomes available for the social sciences, just like the facility that is already available for the humanities (KNAW Humanities Cluster).

Connection with existing national facilities

NWO-SSH values the relationship with the Network Digital Heritage as a stimulus for utilising the storage facilities for the cultural domain (libraries, archives, museums, institutes for digital culture) and the connection of the infrastructure with e-government (in the areas of inspection, accountability and supervision).

International collaboration and participation in treaty organisations

The Netherlands participates in several international treaty organisations and ERICs that frequently fulfil a major role in the development and management of large-scale scientific infrastructure. NWO is making an inventory of such participations, and based upon this, it will consult with the Ministry of Education, Culture and Science about continuing the membership of such bodies and the associated funding of the membership fees for Dutch participation in international infrastructures.

Collaboration

Various institutes are closely connected with facilities on the National Roadmap for Large-Scale Research Facilities that have a European ESFRI roadmap or landmark status. Utrecht University is the international coordinator of the CLARIN-ERIC. The NWO/KNAW Institute DANS provides the chief integration officer for the DARIAH-ERIC and is the national service provider of CESSDA-ERIC.

2.5 Knowledge utilisation: effective use of knowledge through co-design and co-creation

Summary

The joint development and exchange of knowledge is a condition for societal and economic impact and contributing solutions to societal issues. NWO-SSH shall therefore actively encourage knowledge utilisation. NWO-SSH shall act as a "broker" to connect researchers with public and private stakeholders and to encourage the sharing of knowledge.

NWO-SSH shall continue to facilitate ample opportunity for public-public funding in addition to public-private participation and funding.

Knowledge utilisation in the social sciences and humanities

The joint development and exchange of knowledge is a condition for societal and economic impact and contributing solutions to societal issues. NWO-SSH shall therefore actively encourage knowledge utilisation.

Knowledge sharing and knowledge utilisation are an important part of the thematic research programmes that contribute to societal issues, i.e. the Dutch National Research Agenda and the programmes within the Knowledge and Innovation Contract. Within these programmes, researchers work together with public and private stakeholders. Through their involvement, the stakeholders participate in the research, generate knowledge and enrich science with insight from practice.

Knowledge utilisation facilitates this exchange.

NWO-SSH is committed to connecting policy and practice with these programmes. Programme meetings and research coaches have proven to be successful instruments in this respect. NWO-SSH it is also committed to making the exchange of results from the Talent and Open Competition programmes and thematic programmes possible, for example by inviting researchers to activities, sending thematic newsletters, and making publications accessible and actively sharing these. NWO-SSH supports the development of an instrument for proof-of-concept studies that will enable researchers to explore the societal potential of research previously funded by NWO. NWO-SSH will appoint ambassadors to bring research and its results to the attention of a wider public and to demonstrate the relevance of the social science and humanities. These ambassadors will be influential researchers who can realise this goal in an accessible and convincing manner.

NWO-SSH shall act as a “broker” to connect researchers with public and private stakeholders and encourage the sharing of knowledge. NWO-SSH shall therefore organise matchmaking and network meetings and do this together with other domains where relevant. It must be clear to all parties involved what the added value of the collaboration is and what the financial and other forms of participation in the research can yield them. Therefore, NWO-SSH also wants to involve prominent figures from organisations that are important for the domain, e.g. universities, but also public parties such as Statistics Netherlands, Netherlands Bureau for Economic Policy Analysis, Association of Netherlands Municipalities, Interprovinciaal Overleg, and local government bodies. NWO-SSH also wants to help researchers by providing them with best practices and information about specific subjects.

The results that emerge from general and thematic research are very diverse, and consequently, knowledge utilisation has many different forms. Examples include publications in journals; educational modules; design labs or experimental spaces; guidelines for companies, government bodies and other stakeholders about the implementation of results; new sustainable business models; and innovations that have broad public support because their design took the societal and ethical aspects into account.

Co-funding

Public and private stakeholders should be involved right from the start of initiatives that are aimed at contributions to societal issues. Joint involvement in the programming, development (co-design) and realisation of the research (co-creation) in the context of the Dutch National Research Agenda and Knowledge and Innovation Contract increases the involvement of stakeholders. Where relevant, NWO-SSH will help to realise collaboration with stakeholders and shall seek inspiration for this from proven models for collaboration.

There are various possibilities for co-funding, in cash and/or in kind. Due to the strong societal connection of SSH research, NWO-SSH shall continue to facilitate

ample opportunity for public-public funding in addition to public-private participation in the funding of projects.

Independent scientific research

Collaborations with public and private partners can only be successful if the independence of the research is guaranteed. NWO-SSH shall continue to safeguard and, where necessary, draw attention to this through the appointment of user committees and the monitoring of projects, for example.

Impact ex-ante assessment

For funding proposals aimed at contributions to societal issues, NWO-SSH requests applicants to describe and justify the intended scientific and societal impact of these research projects. In the final reports, NWO-SSH will also ask applicants to describe and substantiate the impact of the research.

Industrial and Societal Doctorates

The Industrial and Societal Doctorates programme is very valuable for the social sciences and humanities because working in a professional practice environment makes researchers more aware of the importance of science for solving societal issues, knowledge utilisation and the conditions that these two aspects must satisfy. The converse is also true. Professionals are facilitated in acquiring scientific knowledge and disseminating this within the sector. Working in the practice situation enriches science because it also leads to more profound questions and new issues to tackle.

Besides knowledge utilisation, societal doctorates can support the professionalisation of the working field as is already the case in the Museum Grants and Doctoral Grants for Teachers programmes. The Societal Doctorates also contribute to the strengthening of the knowledge base in a societal sector and the careers of PhD researchers.

3 Organisation

The NWO Domain Social Sciences and Humanities (NWO-SSH) has arisen from the merger of the former NWO units Social Sciences, Humanities, the National Initiative Brain & Cognition and WOTRO. This chapter describes the organisation of the domain, including the connection with the Netherlands Initiative for Education Research.

The domain board

NWO-SSH has a domain board that is responsible for developing policy and that takes decisions about the allocation of financial resources. Board members are prominent professors in the social sciences or humanities at a Dutch university or research institute as well as a societal representative from outside science. The chair of the board is part of the NWO-wide executive board that is responsible for the policy and operational management within the entire NWO organisation.

The Scientific Advisory Board (WAC)

The Scientific Advisory Board of the NWO Domain Social Sciences and Humanities assesses the suitability of potential referees for funding rounds and evaluates the progress of research projects. The domain board finds this important because – analogous to the principle that proposals are assessed by independent experts in selection committees – the choice of referees and the evaluation of progress reports should also be independent and should not be realised by experts involved in the project. The members of the Scientific Advisory Board are appointed by the domain board.

Three departments

The office consists of three departments that work in conjunction with each other.

Department of Curiosity-Driven Research and Science Domain

The Department of Curiosity-Driven Research and Science Domain focusses on the policy, realisation and (partly NWO-wide) coordination of the open research, talent research and research infrastructure. The facilitation of knowledge utilisation and impact through open research is also one of the department's tasks, as equally policy concerning scientific integrity. The focus lies on connecting with the research field and other stakeholders of the domain.

Department of Collaborative Initiatives

The Department of Collaborative Initiatives programmes and funds innovative research that is inspired by society and makes an impact. Together with external commissioning bodies, partners and stakeholders, the department manages programmes and facilitates the societal and scientific impact of research funded by NWO.

The department works on the programming of research in the context of the top sectors policy and the Dutch National Research Agenda, realises the participation in international programmes in the context of the Joint Programming Initiatives (JPIs) and international networks such as NORFACE and HERA, and is involved in international initiatives with respect to research infrastructure.

Since 2017, the department has accommodated NWO-WOTRO Science for Global Development (see further in this document) and several other cross-domain themes and initiatives. Furthermore, where necessary and useful, the department coordinates its activities with the Netherlands Initiative for Education Research.

Department of Management and Quality

The Department of Management and Quality contributes to the NWO-wide vision regarding the management of projects and programmes, harmonisation of processes and desired quality standards. This NWO-wide vision subsequently forms the framework for the working practices of the Department of Management and Quality within the SSH domain. The department provides management and accountability information for internal and external use. Furthermore, the department facilitates and supports the other two departments within NWO-SSH, i.e. the Department of Curiosity-Driven Research and Science Domain and the Department of Collaborative Initiatives including WOTRO, as well as the Netherlands Initiative for Education Research, during the realisation of their tasks.

About WOTRO Science for Global Development

As a cross-domain initiative within NWO, WOTRO Science for Global Development shapes and facilitates research for inclusive global development. WOTRO's programmes are aimed at providing knowledge and expertise that contribute to sustainable solutions for societal and ecological issues in low- and middle-income countries.

Together with its partners, WOTRO develops research programmes that encourage innovative forms of research with and in these countries, according to the lines formulated in the WOTRO strategy (to be published in autumn 2018). To safeguard the societal impact of research, WOTRO works hard to ensure the sharing of knowledge and use of research results in both policy and practice. This requires the participation of representatives from policy, local knowledge institutions and society from the development phase of research projects onwards.

About the Netherlands Initiative for Education Research (NRO)

The Netherlands Initiative for Education Research (NRO) is formally accommodated within the NWO Domain Social Sciences and Humanities but is not an integral part of the domain. However, collaborative relationships are established between NWO-SSH and NRO.

NRO works on improving and innovating education. It does this by coordinating and funding education research and by improving the connections between practice and research in accordance with the strategy NRO Programme 2016-2019.

NRO has three main tasks: (1) facilitating the coherency of educational research by playing a directive role at the national level; (2) awarding grants for high-quality research; and (3) facilitating knowledge utilisation through better connections between science and practice and between science and policy.

NRO covers a broad working field:

- The research ranges from pre-school and infant education through to higher education, including special education, adult education and continuing education and training.
- Various disciplines are involved in realising the research, including educational sciences, psychology, pedagogics, science of teaching, sociology, law, public administration, economics, ethics and neurosciences.
- The themes vary from research "in the classroom/lecture theatre" (for example pertaining teacher-pupil interactions) to "in society" (such as tackling educational disadvantages).

To realise its activities, NRO maintains close contact with researchers, policymakers, sector councils, school directors and school managers, teachers and numerous other educational stakeholders.

4 Summary

The key points from this implementation plan are summarised below.

AMBITIONS	SUMMARY
<p>Nexus <i>agendas, connecting science and society</i></p>	<ul style="list-style-type: none"> ▪ NWO-SSH seeks to strengthen its role as an intermediary - nexus - by making the connection between researchers and between science and policy/civil society organisations. Therefore, NWO-SSH shall periodically organise a large conference for SSH researchers and regularly organise small-scale meetings to facilitate and support researchers optimally. Such meetings are also useful for acquiring information. The domain board considers good contact with universities and other institutions to be important and shall therefore establish platforms and make site visits. ▪ The strong connection of the research within the social sciences and humanities with societal sectors is also expressed in the collaboration with public and private stakeholders (government bodies, education, societal and cultural organisations, companies and citizens). NWO-SSH shall bring together science and relevant public and private parties for the development (co-design) and realisation of research programmes that contribute to insights and solutions for societal issues (co-creation), especially in the context of the Dutch National Research Agenda. ▪ International networks contribute to the exchange of knowledge and data and are therefore valuable for the development of SSH research.
<p>People <i>perspectives for researchers</i></p>	<ul style="list-style-type: none"> ▪ In the coming period, NWO-SSH wants to ensure that the best researchers retain sufficient perspective for realising curiosity-driven research, in both small and large research projects as well as in more fundamental and more practice-oriented research projects. ▪ NWO-SSH will continue to invest in individual talent. During the transition of the Innovational Research Incentives Scheme into the NWO Talent Programme, NWO-SSH will take due account of the needs within the field. ▪ NWO-SSH will offer senior researchers funding opportunities via the NWO Open Competition SSH. ▪ NWO-SSH will monitor and evaluate whether mid-career researchers have sufficient opportunities in other funding instruments. ▪ In both the NWO Talent Programme and the Open Competition, NWO-SSH will serve the entire breadth of the domain by working with assessments of subareas via panels.
<p>Research <i>collaboration for excellence and innovation</i></p>	<ul style="list-style-type: none"> ▪ NWO-SSH is firmly committed to encouraging interdisciplinary collaboration and collaboration between science and society to help contribute solutions for societal challenges (both national and global) via programmes in the context of the Dutch National Research Agenda and the Knowledge and Innovation Contract (top sectors). ▪ Within the Merian Fund, NWO-SSH will also seek to programme research for global challenges. ▪ NWO-SSH is committed to ample opportunities for contributions from the social sciences and humanities in the successor to the current Knowledge and Innovation Agenda (after 2019).
<p>Infrastructure <i>accessible and sustainable scientific infrastructure</i></p>	<ul style="list-style-type: none"> ▪ Just like for other domains, a strong research infrastructure is vital for excellent SSH research. This infrastructure consists of research data that must not only be collected but also stored, made accessible and analysed. ▪ Besides this data, a good ICT infrastructure is essential to support digital developments and to make new and innovative social sciences and humanities research possible. Furthermore, equipment for neurocognitive

	<p>research is important to guarantee the strong international position of such research.</p> <ul style="list-style-type: none"> ▪ Substantial investments are needed to realise this robust SSH infrastructure. Fragmentation must be avoided and existing initiatives must be consolidated as much as possible to ensure sustainability in the longer term. Such efforts can further build upon the national and international initiatives in which Dutch SSH researchers already play an essential role. ▪ Within its nexus role, NWO-SSH can mainly help by i) bringing together the national and international scientific and societal partners and ii) creating a situation in which the field sets its own priorities and makes its own choices.
<p>Knowledge utilisation <i>effective use of knowledge through co-design and co-creation</i></p>	<ul style="list-style-type: none"> ▪ The joint development and exchange of knowledge is a condition for societal and economic impact and contributing solutions to societal issues. NWO-SSH shall therefore actively encourage knowledge utilisation. ▪ NWO-SSH shall act as a “broker” to connect researchers with public and private stakeholders and to encourage the sharing of knowledge. ▪ NWO-SSH shall continue to facilitate sufficient opportunity for public-public funding in addition to public-private participation and funding.

Netherlands Organisation
for Scientific Research (NWO)

Domain Social Sciences and Humanities

Laan van Nieuw Oost-Indië 300
The Hague, the Netherlands
PO Box 93138
2509 AC The Hague, the Netherlands
Telephone +31 70 344 0640
sgw@nwo.nl
www.nwo.nl/ssh

September 2018