

The Federal Republic of Germany is made up of 16 federal states, the Länder. The German health system as well as the research and innovation system has a complex governance structure where decision-making is shared between the federal and state levels, along with strong self-governing bodies. Initiatives are funded at different levels (European, federal, state - regional, foundations).

During the pandemic the federal government was granted temporary powers to enable coordinated COVID-19 responses across states (from State of Health in the EU Germany Country Health Profile 2021

https://health.ec.europa.eu/document/download/63ee076a-9f9f-4d39-a25d-7d82809f2058_en?filename=2021_chp_de_english.pdf)

Part of Germany's Recovery and Resilience Plan is related to accelerating research and development of vaccines against SARS-CoV-2 (EUR 591 million). Since 2008, Germany has been developing the One Health approach, in collaboration with several federal ministries (covering health; food and agriculture; education and research; environment, nature conservation, nuclear safety and consumer protection; and economic co-operation and development). In order to connect the research community, the Federal Ministry of Education and Research took the lead in funding the One Health Platform, a national initiative. see <https://onehealthplatform.net/> and <https://www.gesundheitsforschung-bmbf.de/de/ohp-one-health-plattform-17504.php>

In a cross-governmental approach all six ministries collaborate to fund projects based on the One Health research agenda of the platform.

Furthermore, antimicrobial resistance is an important topic for the German government. The priorities of the German Antibiotic Resistance Strategy DART2030 (see <https://www.bundesgesundheitsministerium.de/en/themen/praevention/antibiotika-resistenzen/dart-2030.html>) include prevention, further strengthening of appropriate use of antibiotics in human and veterinary medicine, and closer involvement of the environmental sector in activities to combat antimicrobial resistance. The strategy shows promising first accomplishments as for example community antibiotic consumption in Germany has been declining steadily. (from State of Health in the EU - Germany - Country Health Profile 2023, pg. 19 https://health.ec.europa.eu/system/files/2023-12/2023_chp_de_english.pdf)

Germany is also home for the following international structure :

-The WHO Hub for Pandemic and Epidemic Intelligence inaugurated in 2021 is established in Berlin to facilitate a global collaboration of partners from multiple sectors that supports countries and stakeholders to address future pandemic and epidemic risks with better access to data, better analytical capacities, and better tools and insights for decision-making. See <https://pandemichub.who.int/>

This country profile is not exhaustive and should be updated regularly.

R&I Policies and Strategies

The information is not exhaustive and should be updated regularly.

Country has a dedicated strategy for research and innovation related to pandemic threat? Yes

R&I strategy URL <https://www.bundesregierung.de/breg-de/service/publikationen/global-health-strategy-of-the-german-federal-government-1803156>
https://www.gesundheitsforschung-bmbf.de/files/Addendum_Rahmenprogramm_Gesundheitsforschung_barrierefrei.pdf

Country has an open science portal with information on publicly financed scientific research? Yes

R&I portal www.foerderportal.bund.de

Country has R&I webpage on COVID-19; Monkey pox; Other WHO viral risks; Antimicrobial resistance (AMR); Chemical, Biological, Radiological and Nuclear (CBRN) threats

Website open science/ open data initiative with respect to pandemic threats, such as COVID-19 open

Name (alphabetically ordered)

URL

Federal Ministry of Education and Research Germany

<https://www.gesundheitsforschung-bmbf.de/en/index.php>

Federal Office of Civil Protection and Disaster Assistance

https://www.bbk.bund.de/EN/Home/home_node.html

Robert Koch Institute

<http://www.rki.de>

Country has coordinating structures to link public health needs and research needs? **Yes**

Coordinating structures URL www.rki.de

R&I Infrastructures, Initiatives and Clinical Trials *The initiatives are listed in alphabetical order, are not exhaustive and should be updated regularly.*

Country has the following research infrastructure for infectious diseases and outbreaks available, or under construction

BSL 3; BSL 4; Emergency intervention units; Clinical trial units; High level isolation units; High level isolation transport; Reference centres of excellence

Name Infrastructure

URL

Available for

Open to

German Center for Infection Research (DZIF)

<https://www.dzif.de/en>

academia/ industry/
other

Yes

German Network for Bioinformatics Infrastructure (de.NBI) - InfectControl

<https://neic.no/pari/>

www.infectcontrol.de/

academia/ industry/
other

Yes

Modeling Network for Serious Infectious Diseases (MONID)

<https://webszh.uk-halle.de/monid/?p=1682&lang=en>

academia/ industry/
other

Yes

Network University Medicine (NUM)

<https://www.netzwerk-universitaetsmedizin.de/>

academia/ industry/
other

Yes

Country supporting the participation to the following ESFRI initiatives relevant for infectious diseases

BBMRI; EATRIS; ECRIN; Other (EU-Openscreen)

Website network of clinical trials (e.g. to facilitate the access to clinical trials) : the country (or a German organisation) is/has been involved in the following initiatives funded at different levels (European, federal, regional) *listed in alphabetical order, are not exhaustive and should be updated regularly*

Name network

URL

COMBACTE-COMBATting BACTERial resistance in Europe

<https://www.combacte.com/>

DZIF "Clinical Trial Unit" (CTU) - network of 12 clinical trial centres

<https://www.dzif.de/en/infrastructure/clinical-trial-unit>

European & Developing Countries Clinical Trials Partnership (EDCTP)

<https://www.edctp.org/>

European Clinical Research Alliance on Infectious Diseases

<https://www.ecraid.eu/>

European Clinical Research Infrastructure Network

<https://ecrin.org/>

European Research and Preparedness Network for Pandemics and Emerging Infectious Diseases

<https://eu-response.eu/>

European Vaccine Initiative (EVI) - a leading European non-profit Product Development Partnership (PDP) that is supporting global efforts to develop effective and affordable vaccines

<https://www.euvaccine.eu/>

against diseases of poverty and emerging infectious diseases is located in Heidelberg.

KKSN - Netzwerk der Koordinierungszentren für Klinische Studien - German network of coordinating centres for clinical trials; the national hub for non-commercial clinical trials that is a part of ECRIN

<https://www.kks-netzwerk.de/netzwerk/ueber-uns/>

National Research Network of University Medicine on Covid-19

<https://www.netzwerk-universitaetsmedizin.de/>

Randomised, Embedded, Multi-factorial, Adaptive Platform Trial for Community-Acquired Pneumonia

<https://www.remapcap.org/>

Rapid European COVID-19 Emergency Response response

https://commission.europa.eu/about/departments-and-executive-agencies/recovery-and-resilience-task-force_en

VACCELERATE - clinical research network for the coordination and conduct of COVID-19 vaccine trials

<https://vaccelerate.eu/>

Budget mobilisation mechanisms and funding sources *The information is not exhaustive and should be updated regularly.*

Basic Research

url

funding for basic research accessible for industry? No

source of funding Public (research) agencies

Applied Research

url

funding for applied research accessible for industry? Yes

source of funding Public (research) agencies

Translational Research

url

funding accessible for industry? Yes

source of funding Public (research) agencies

Clinical Research (in general)

url

funding accessible for industry? Yes

source of funding Public (research) agencies

phase funded? Phase 1; Phase 2; Phase 4

Clinical Research (in pandemic phase)

url

accessible for industry? Yes

source of funding Public (research) agencies

phase funded ? Phase 1; Phase 2; Phase 3; Phase 4

Innovation Projects

url

funding for innovation projects accessible for industry? Yes

source of funding Public (research) agencies

Flexible funding is provided in case of emergency

R&I actors, authorities and activated processes that are activated in case of a health threat

The actors are listed in alphabetical order, the list is not exhaustive and should be updated regularly.

R&I actors, authorities and

ministries involved in case of an outbreak; mobilisation processes of research forces; (existing) national or regional structures that advise governments on R&I during emergencies; administrative procedures to diminish the administrative burden for researchers and funding administrations; assessment of research outputs produced during a crisis; incentives ensuring qualitative scientific dissemination during a crisis; mechanisms to identify promising therapies or medical products for pandemic preparedness that are in the pipeline; international scientific collaboration in case of an outbreak

Name	Description	url
Bernhard Nocht Institute for Tropical Medicine (BNITM) – research actor	BNITM is dedicated to research, teaching, training and further education as well as counselling and care in the field of tropical diseases and emerging infectious diseases. BNITM is also WHO Collaborating Centre Center for Behavioral Research in Global Health (BRIGHT)	http://www.bnitm.de/en/
Braunschweig Center for Systems Biology (BRICS) – research actor	The Braunschweig Center for Systems Biology (BRICS) is an interdisciplinary and internationally oriented research center for systems biology. We want to understand health in order to be able to fight diseases better.	https://www.tu-braunschweig.de/brics
Centre for Experimental and Clinical Infection Research (TWINCORE) - research actor	TWINCORE, a joint venture between HZI and MHH (Medizinische Hochschule Hannover) is a translational centre, which closely links basic and clinical research. Our research is focused on the interdisciplinary search for new strategies for the diagnosis, prevention and treatment of infectious diseases. At TWINCORE medical personnel and basic research scientists from various disciplines conduct infection research side by side. Our focus is upon translational research the interface between basic research	https://www.twincore.de/en/home/
Centre for Individualised Infection Medicine (CiiM) - research actor	The CiiM (Centre for Individualised Infection Medicine) is a joint initiative of the Helmholtz Centre for Infection Research (HZI) in Braunschweig and the Hannover Medical School (MHH). The activities based at CiiM will explore the influence of individual patient and pathogen conditions on susceptibility to infection, disease progression and therapeutic success. Optimised individualised patient care is the goal.	https://www.ciim-hannover.de/en
Centre for Structural Systems Biology (CSSB) - research actor	CSSB is a joint initiative of nine research partners from Northern Germany, including three universities and six research institutes that devotes itself to infection biology research. CSSB partners : Bernhard Nocht Institute for Tropical Medicine (BNITM) Deutsches Elektronen-Synchrotron (DESY) European Molecular Biology Laboratory (EMBL) Forschungszentrum Jülich (FZJ) Hannover Medical School (MHH) Heinrich Pette Institute (HPI) Helmholtz Centre for Infection Research (HZI) Research Center	https://www.cssb-hamburg.de/
Federal Ministry for the Environment, Nature Conservation, Nuclear Safety and Consumer Protection (BMUV) - and the Federal Office for Radiation Protection (BfS) – federal actor	BMUV and BfS are involved in case of radiological emergency	https://www.bmu.de/en https://www.bfs.de/EN/home/home_node.html
Federal Ministry of Education and Research (BMBF) - federal actor	BMBF supports innovative projects and ideas in research through targeted funding programmes.	https://www.bmbf.de

Federal Ministry of Food and Agriculture (BMEL) - federal actor	In 2010 BMEL became the official host of the GISAID platform (https://gisaid.org/) and EpiFlu™ database providing sustainability of the platform and stability through its public-private-partnership with the GISAID Initiative to this day.	https://www.bmel.de/DE/ministerium/forschung/gisaid2018.html
Federal Ministry of Health (BMG) - federal actor	BMG is responsible for a variety of policy areas, whereby its activities focus predominantly on the drafting of bills, ordinances and administrative regulations. Moreover, by means of prevention campaigns, the Federal Ministry of Health seeks to improve the population's health.	https://www.bundesgesundheitsministerium.de/en/index.html
Federal Office for Civil Protection & Disaster Assistance (BBK) - federal actor	Executive agency of the Federal Ministry of the Interior and Community, involved in case of emergency	https://www.bmi.bund.de/EN/topics/civil-protection/bbk/bbk-node.html
German Center for Infection Research (DZIF) - research actor	Over 500 doctors and scientists from 35 establishments collaborate at DZIF, jointly developing new approaches to prevent, diagnose and treat infectious diseases. This synergistic alliance of universities, hospitals and research institutes has established a globally unique infrastructure - aiming to effectively translate research results from bench to bedside, and vice versa: applying insights from clinical practice to research.	https://www.dzif.de/en
German Research Foundation (DFG) - federal actor	DFG is a the central self-governing research funding organisation in Germany.	https://www.dfg.de/en/index.jsp
Helmholtz Institute for One Health (HIOH) - research actor	HIOH in Greifswald is off-site location of the Helmholtz Centre for Infection Research (HZI) In close cooperation with its local founding partners, the University of Greifswald, the University Medical Center Greifswald and the Friedrich-Loeffler-Institute Federal Research Institute for Animal Health Greifswald-Riems, the HIOH is dedicated to interdisciplinary research on the interrelationships between human, animal and environmental health.	https://www.helmholtz-hioh.de/en/
Helmholtz Institute for Pharmaceutical Research Saarland (HIPS) - research actor	The Helmholtz Institute for Pharmaceutical Research Saarland (HIPS) focuses on the development of novel anti-infectives by combining state-of-the-art medicinal chemistry and natural product based research with innovative drug delivery approaches. Research at HIPS is based on the following four research areas: Microbial Natural Products, Drug Design and Optimization, Biological Barriers and Delivery, and Drug Bioinformatics with close collaboration between these research areas	https://www.helmholtz-hips.de/en/
Helmholtz Institute for RNA-based Infection Research (HIRI) - research actor	The Helmholtz Institute for RNA-based Infection Research (HIRI) is the first institution of its kind worldwide to combine ribonucleic acid (RNA) research with infection biology. Based on novel findings from its strong basic research program, the institute's long-term goal is to develop innovative therapeutic approaches to better diagnose and treat human infections.	https://www.helmholtz-hiri.de/en
Helmholtz-Zentrum für Infektionsforschung (HZI) - research actor	Helmholtz Centre for Infection Research are distributed all over Germany. In addition to the main campus in Braunschweig, there are facilities in five other cities: Hamburg, Hanover, Saarbrücken, Würzburg and Greifswald.	https://www.helmholtz-hzi.de/en/
Interdisciplinary Commission for Pandemic Research - federal actor	The Interdisciplinary Commission for Pandemic Research was established by the DFG in June 2020 in response to the coronavirus pandemic. It has 21 members from all academic disciplines. The Chair of the Commission is Professor Dr. Katja Becker, President of the DFG. The aim is to contribute to pandemic preparedness and pandemic analysis from a scientific perspective	https://www.dfg.de/en/research_funding/corona_information/commission/index.html

Paul-Ehrlich-Institut (PEI) - research actor	Paul-Ehrlich-Institut (PEI), the Federal Institute for Vaccines and Biomedicines, is responsible for the research, assessment, and marketing authorisation of biomedicines for human use and immunological veterinary medicinal products. ZEPAI - Center for Pandemic Vaccines and Therapeutics https://www.pei.de/EN/institute/zepai/center-pandemic-vaccines-therapeutics-node.html	https://www.pei.de/EN/home/home-node.html
Robert Koch Institute (RKI) - research actor	RKI is the national public health institute for Germany. Public health refers to the health of the population. The most important areas of work of the Robert Koch Institute are the fight against infectious diseases and the analysis of long-term health trends in the population. With regard to the detection of new health risks, the RKI performs an "antenna function" in the sense of an early warning system. RKI is also WHO Collaborating Center for Global Outbreak Alert and Response - GOARN	https://www.rki.de/DE/Content/Institut/OrgEinheiten/orgeinheiten_node.html
Federal States (Länder)	<p>The 16 Länder play also a role in case of a crisis:</p> <ul style="list-style-type: none"> - Baden-Württemberg https://www.bundesbericht-forschung-innovation.de/en/Baden-Wuerttemberg-1731.html Ministry of Science, Research and Arts of Baden-Württemberg Ministry of Social Affairs, Health and Integration of Baden-Württemberg - Free State of Bavaria https://www.bundesbericht-forschung-innovation.de/en/Free-State-of-Bavaria-1732.html Bavarian Research Foundation https://forschungsstiftung.de/ - Berlin https://www.bundesbericht-forschung-innovation.de/en/Berlin-1758.html - Brandenburg https://www.bundesbericht-forschung-innovation.de/en/Brandenburg-1759.html - Free Hanseatic City of Bremen https://www.bundesbericht-forschung-innovation.de/en/Free-Hanseatic-City-of-Bremen-1760.html - Free and Hanseatic City of Hamburg https://www.bundesbericht-forschung-innovation.de/en/Free-and-Hanseatic-City-of-Hamburg-1761.html - Hesse https://www.bundesbericht-forschung-innovation.de/en/Hesse-1762.html - Mecklenburg-West Pomerania https://www.bundesbericht-forschung-innovation.de/en/Mecklenburg-West-Pomerania-1763.html - Lower Saxony https://www.bundesbericht-forschung-innovation.de/en/Lower-Saxony-1764.html - North Rhine-Westphalia https://www.bundesbericht-forschung-innovation.de/en/North-Rhine-Westphalia-1765.html - Rhineland-Palatinate https://www.bundesbericht-forschung-innovation.de/en/Rhineland-Palatinate-1766.html - Saarland https://www.bundesbericht-forschung-innovation.de/en/Saarland-1767.html - Free State of Saxony https://www.bundesbericht-forschung-innovation.de/en/Free-State-of-Saxony-1768.html Saxon State Ministry of Economic Affairs, Labour and Transport (SMWA) funds translational-applied, innovation industry research https://www.revosax.sachsen.de/vorschrift/19834-FRL-EFRE-JTFTechnologiefoerderung-2021-bis-2027 https://www.smwa.sachsen.de/ Saxon State Ministry of Science, Culture and Tourism (SMWK) funds basic, translational-applied, innovation research https://www.forschung.sachsen.de/forschungsfoerderung-3901.html as funding organisation has not established a special programme to needed purposes during the pandemic. https://www.smwk.sachsen.de/ - Saxony-Anhalt https://www.bundesbericht-forschung-innovation.de/en/Saxony-Anhalt-1769.html - Schleswig-Holstein https://www.bundesbericht-forschung-innovation.de/en/Saxony-Anhalt-1769.html - Free State of Thuringia https://www.bundesbericht-forschung-innovation.de/en/Free-State-of-Thuringia-1771.html 	

Version May 2025



BE READY is responding to the call: HORIZON-HLTH-2021-DISEASE-04-06 "Building a European partnership for pandemic preparedness" under grant agreement 101057795. Starting date: 01.06.2022. | End Date 31.05.2025

BE READY PLUS is responding to the call: HORIZON-HLTH-2024-DISEASE-17 "Pandemic preparedness and response: Maintaining and enhancing the preparatory work for a co-funded European partnership for pandemic" under grant agreement 101195079. Starting date: 01.01.2025. | End Date 31.12.2025

Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Union or the European Health and Digital Executive Agency (HADEA), under the powers delegated by the European Commission. Neither the European Union nor the granting authority can be held responsible for them.

This country profile is based on input received via https://ec.europa.eu/eusurvey/runner/BEREADY_Questionnaire_Observatory and desktop research and does not contain any private information