

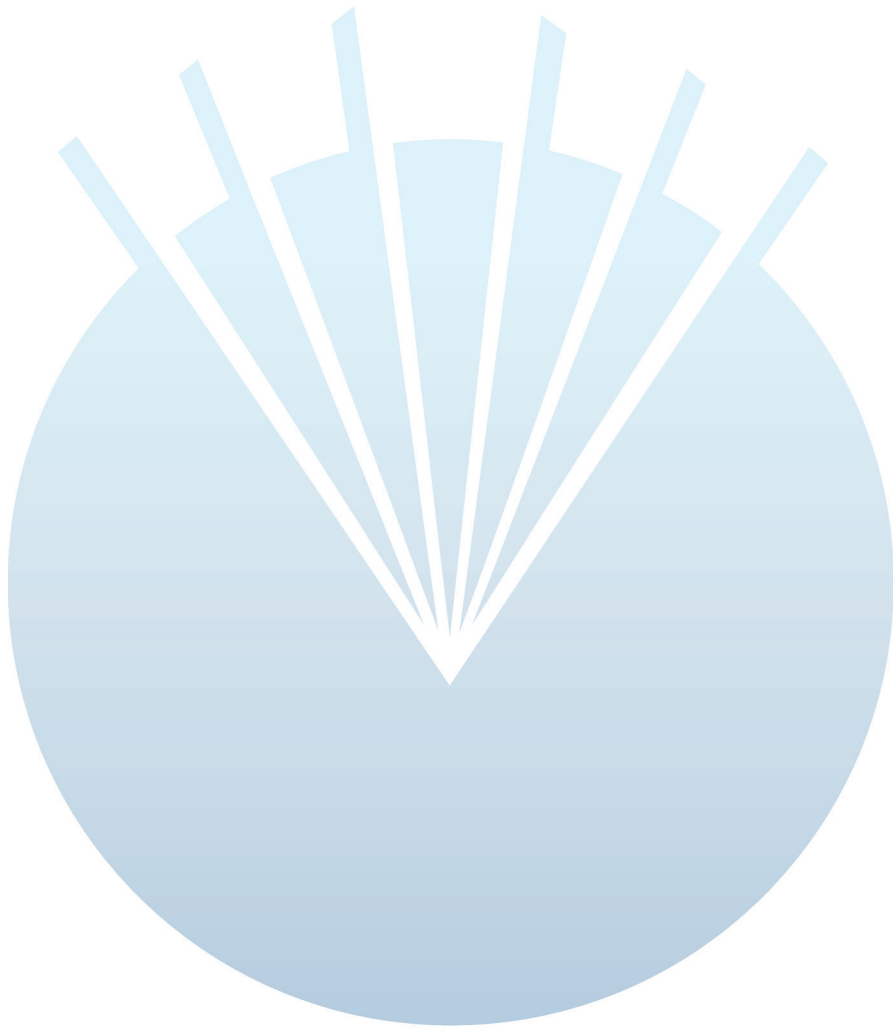
Focused Ultrasound

State of the Field

2016



FOCUSED
ULTRASOUND
FOUNDATION



Charts by subjects

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The information in this report was provided by manufacturers and the focused ultrasound research community to the Focused Ultrasound Foundation. The FUS Foundation aims to provide the most accurate information; if you have more current or updated information please send it to: engagement@fusfoundation.org.

Introduction

Breakthrough Treatment

Focused ultrasound is an early stage, non-invasive therapeutic technology with the potential to transform the treatment of many medical disorders by using ultrasonic energy to target tissue deep in the body without incisions or ionizing radiation. Focused ultrasound is the union of two innovative technologies:

- focused ultrasound—which provides the energy to treat tissue deep in the body precisely and noninvasively
- magnetic resonance or ultrasound imaging—which is used to identify and target the tissue to be treated, guide and control the treatment in real time, and confirm the effectiveness of the treatment.

The fundamental principle is analogous to using a magnifying glass to focus beams of sunlight on a single point to burn

a hole in a leaf. With focused ultrasound, an acoustic lens is used to concentrate multiple intersecting beams of ultrasound on a target deep in the body with extreme precision.

Where each individual beam passes through the tissue, there is no effect. But, at the focal point, the convergence of the multiple beams of focused ultrasound energy results in many biological effects, creating the possibility of treating a variety of disorders.

Focused ultrasound treatments can be performed on an outpatient basis, require no incisions, and can result in minimal discomfort and few complications, allowing for rapid recovery.

All indicators point toward the evolution of this platform technology into a robust medical field, with the pace of research and development, publications, patient treatments and the number of device manufacturers all increasing rapidly in the past few years.

Field Expanding Through Research, Development, and Commercialization

Even though focused ultrasound is currently in the early stages of development and adoption, it has the potential to transform the treatment of a variety of serious medical conditions, including neurological disorders, many cancers, cardiovascular disease and endocrine disorders.

All indicators point toward the evolution of this platform technology into a robust medical field, with the pace of research and development, publications, patient treatments and the number of device manufacturers all increasing rapidly in the past few years.

There are focused ultrasound systems currently approved in the U.S. to treat uterine fibroids, prostate tissue, and the pain from bone metastases. In addition, there are currently 19 applications of the technology approved for commercial use in other regions of the world. More uses are still undergoing research, with opportunities for patients to participate in clinical trials at leading medical research institutions. And even more potential uses of the technology are in the early stages of technical research.

Advancing the Technology Through Venture Philanthropy

The Focused Ultrasound Foundation was created to improve the lives of millions of people worldwide by accelerating the development and adoption of focused ultrasound therapies. The Foundation works to clear the path to global adoption by coordinating and funding research and educational activities, fostering collaboration and building awareness of the technology among patients and professionals. The Foundation is dedicated to ensuring that focused ultrasound finds its place as a mainstream therapy for a range of neurological disorders, cancer and other life-threatening conditions within years, not decades.

Since its establishment in 2006, the Foundation has become the largest non-governmental source of funding for focused ultrasound research.

Executive Summary

Patient Treatments on the Rise

Focused ultrasound saw many advances in 2015, most notably an increase in patient treatments by 30 percent over the previous year. More than 100,000 patients have been treated to date with focused ultrasound—upwards of 25,000 of them in 2015 alone. Most of the recent growth was driven by a 60 percent increase in uterine fibroid treatments around the world, particularly in China. Prostate cancer remains the leading use of the technology worldwide, expanding by a robust rate of 12 percent. As expected, emerging applications are expanding, including breast cancer (67%) and bone metastases (20%). The past year also included some important clinical research milestones, including the world's first patient treated for depression and the first clinical non-invasive opening of the blood-brain barrier.

New Regulatory Approvals in US and Beyond

Eight companies have developed focused ultrasound systems that are now approved to treat at least 19 medical conditions. The U. S. Food and Drug Administration (FDA) approved SonaCare's Sonablate and EDAP's Ablatherm for the ablation of prostate tissue in the fourth quarter, opening up the world's largest commercial market to the leading use of the technology. This approval has already doubled the number of commercial treatment centers in the U.S., and exponential growth is expected to continue in 2016. InSightec has filed with the FDA to obtain approval of their ExAblate Neuro system to treat essential tremor, which would become the first commercially approved neurological indication in the U.S.

The Korean Ministry of Food and Drug Safety approved the ExAblate Neuro for the treatment of movement, pain, and behavioral disorders including depression and obsessive-compulsive disorder. This marks the first regulatory approval of a focused ultrasound system for psychiatric disorders.

Expansion of Research and Treatment Sites

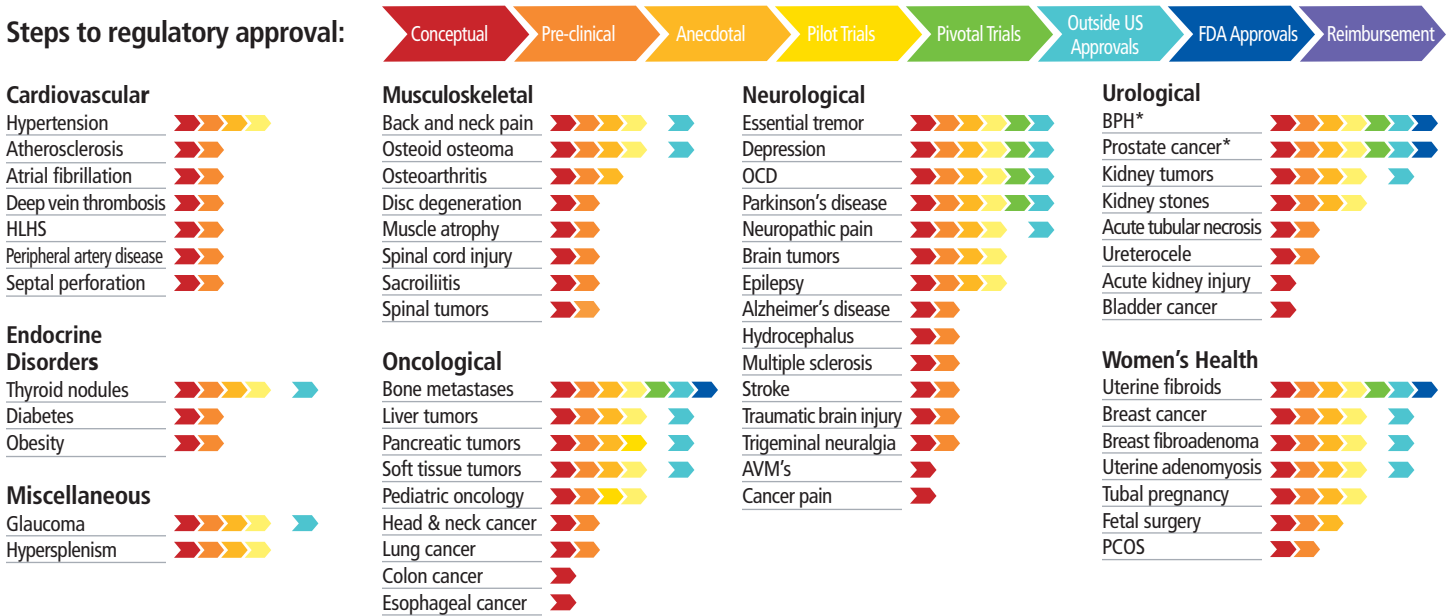
Focused ultrasound is now being studied or utilized to treat more than 50 medical conditions, including many cancers, neurological and cardiovascular conditions. This progress is being fueled by researchers and clinicians at luminary sites around the globe. The number of academic and clinical sites utilizing the technology continues to grow, with 274 research sites and 471 commercial treatment centers operating worldwide. In 2015, there was an increase of 26 clinical research sites (17% growth), 80 commercial sites (20% growth) and 19 technical research sites (25% growth).

Innovation Continues in New Companies

New companies continue to be created and expand the field of focused ultrasound. There are now 32 manufacturers involved in research and development of the technology—three companies joined the field last year. EpiSonica is a Taiwanese company that has created a supine MRI-guided focused ultrasound system for the treatment of uterine fibroids and other women's health issues. NaviFUS is another company from Taiwan that is in the early stages of development of a drug delivery system for the brain. And Promedica Bioelectronics, based in Italy, is primarily a diagnostic imaging and oncologic therapy device supplier that has created a bench-top focused ultrasound system for in vitro preclinical research.

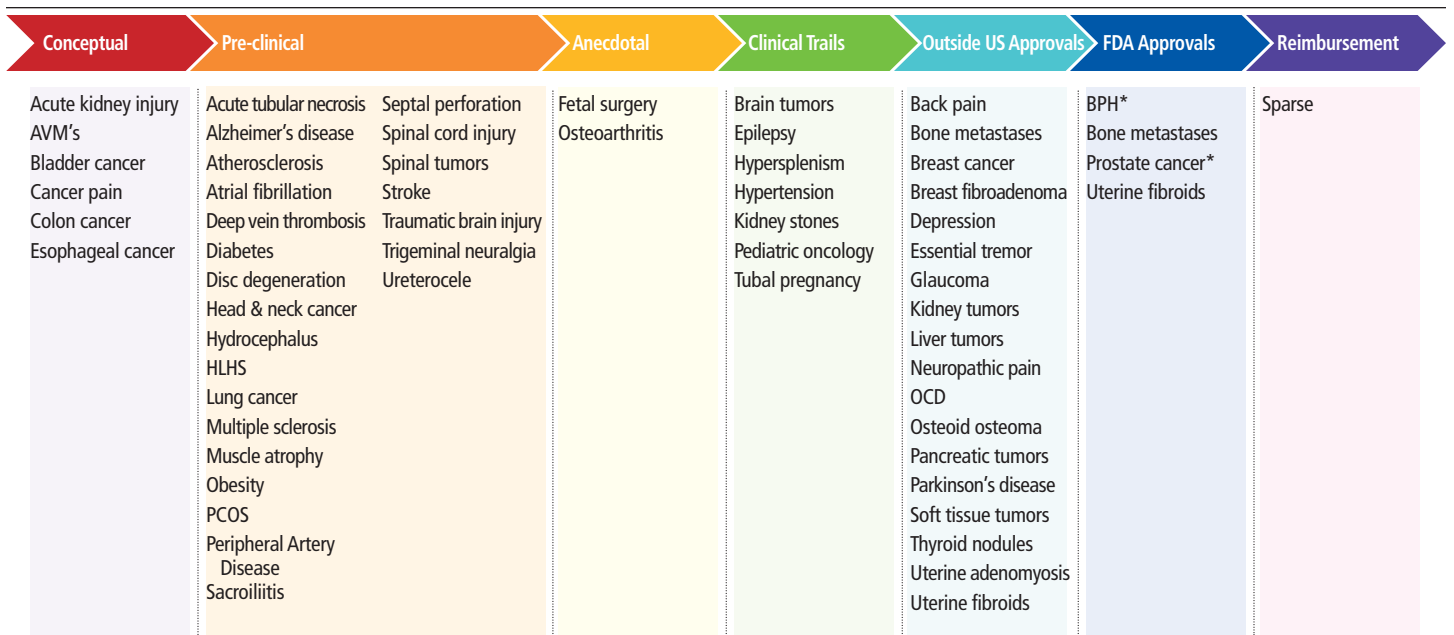
Executive Summary

State of Research and Regulatory Approval by Indications



* The FDA approved two focused ultrasound systems in 2015 that could be used to treat these prostate diseases.

State of Research and Regulatory Approval by Development Stage

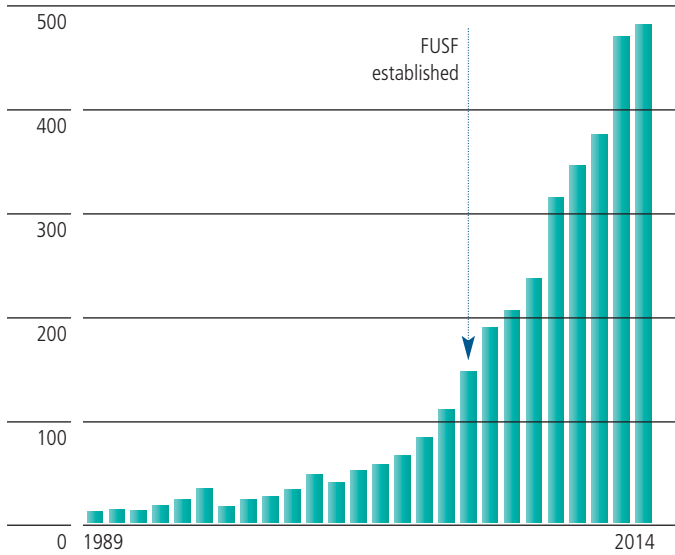


* The FDA approved two focused ultrasound systems in 2015 that could be used to treat these prostate diseases.

State of the Field

FUS Publications

Per year

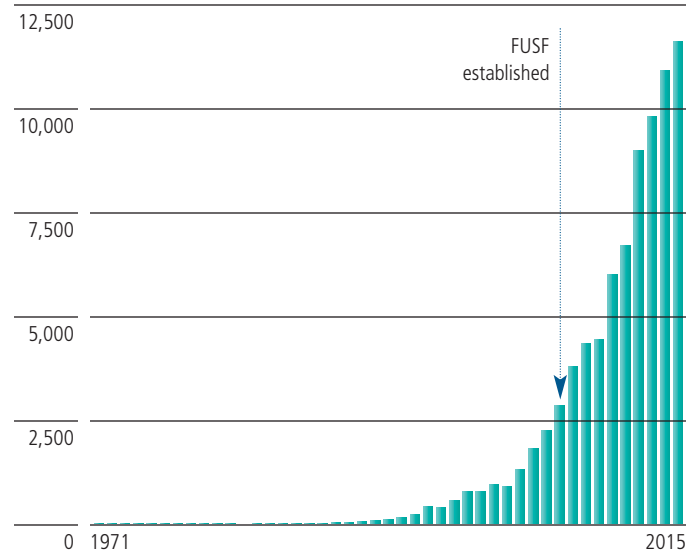


Source: Data from Medline as of February 2016.

Publications for 2015 are still being indexed by Medline and are not included in this graph.

FUS Citations

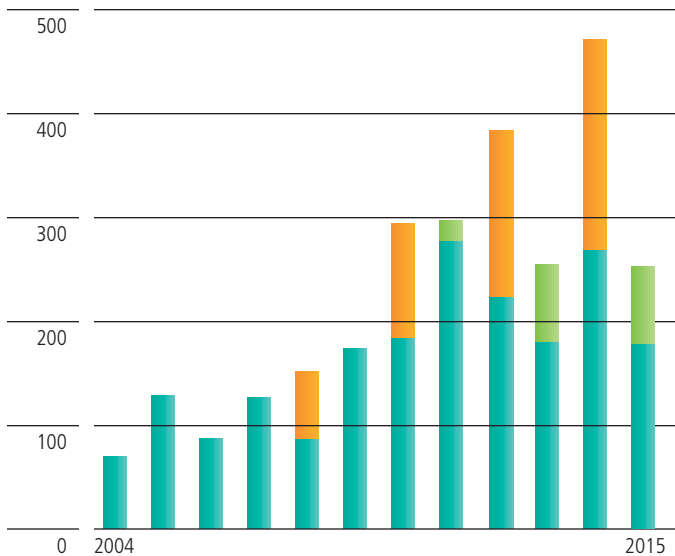
Per year



Source: Web of Science.

Abstracts Presented at FUS Symposia

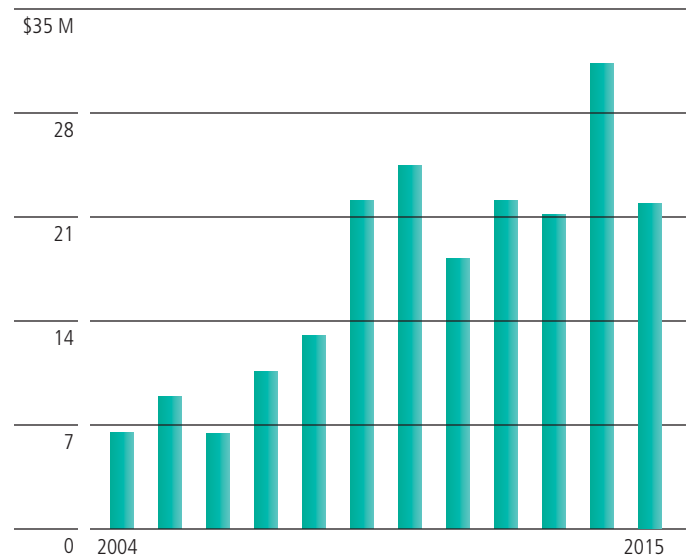
FUSF EUFUS ISTU



■ Focused Ultrasound Foundation Symposium
■ European Symposium on Focused Ultrasound Therapy
■ International Symposium on Therapeutic Ultrasound

Total Awards for All FUS NIH Research Grants

Dollars in millions

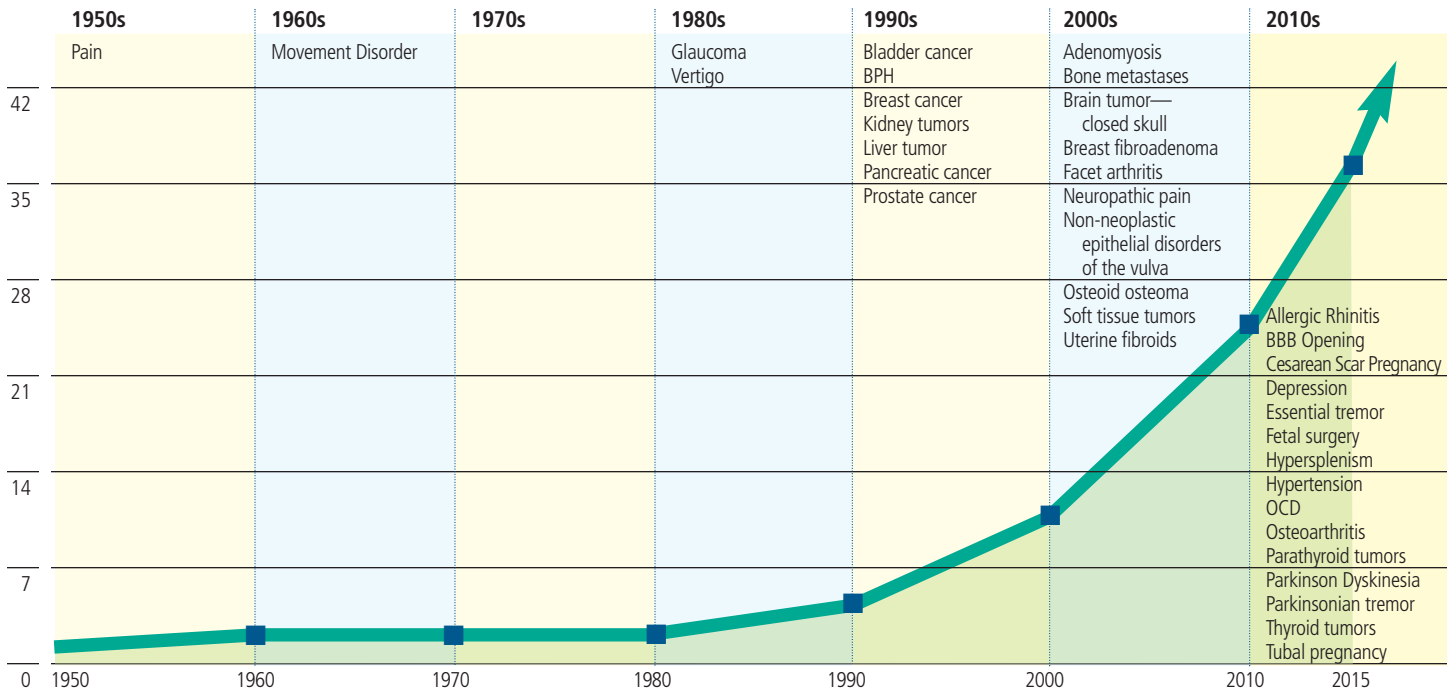


Source: NIH

State of the Field

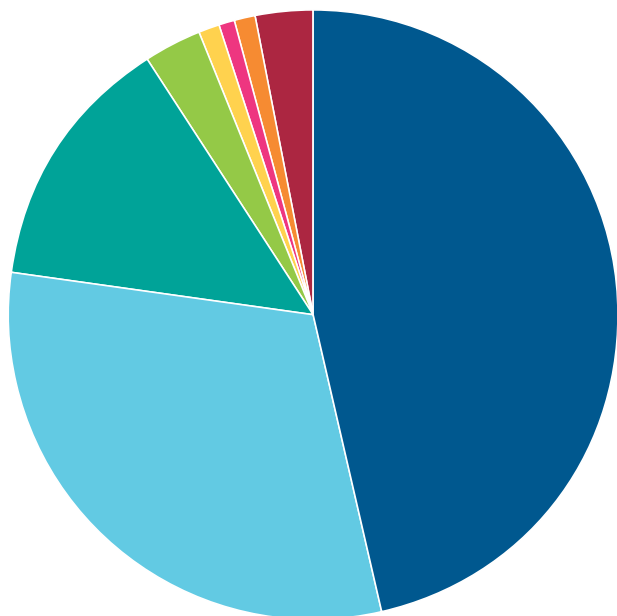
First in Human Treatments

Clinical trials or commercial treatments



Treatments by Indication

Up to 2015



116,042 Treatments

Prostate cancer	55,045	47%
Uterine fibroids	36,011	31%
Liver cancer	16,000	14%
Glaucoma	2,900	3%
Bone metastases	1,516	1%
Breast cancer	869	1%
BPH	725	1%
Others*	2,976	3%

*Brain, Brain tumor, Bone non-metastases, Breast fibroadenoma, Kidney, MSK, Pancreatic cancer, Parathyroid, Rectal carcinoma, Renal denervation, Soft tissue tumors, Thyroid, Vascular

Manufacturer supplied data

The number of patient treatments reported is lower than the actual number of procedures because of incomplete reporting from manufacturers and treatment sites.

State of the Field

FUS Approvals by Region and Manufacturer

Medical Condition	North America		Europe		Asia				S.America	
	US FDA	Canada Health Canada	Europe CE Mark	Russia Roszdravnadzor	China CFDA	India CDSCO	Japan MHLW	Korea MFDS	Mid East	
Back pain & neck pain			★							
Bone metastases	★	★	★	★	★	★	★	★	★	★
Breast cancer			★	★	★			★		★
Breast fibroadenoma			★							
Depression								★		
Essential tremor			★	★				★	★	
Glaucoma			★							
Kidney tumors			★	★	★			★		★
Liver tumors			★	★	★			★		★
Neuropathic pain			★	★				★	★	
OCD								★		
Osteoid osteoma			★	★	★			★		★
Pancreatic tumors			★		★			★		★
Parkinsonian tremor			★	★				★	★	
Prostate diseases	★	★	★	★		★		★		★
Soft tissue tumors			★	★	★			★		★
Thyroid nodules			★							
Uterine adenomyosis			★	★	★			★		★
Uterine fibroids	★	★	★	★	★	★	★	★	★	★

Manufacturers

- ★ Alpinion Medical Systems, Seoul, Korea
- ★ Chongqing Haifu (HIFU) Medical Technology Co., LTD, Chongqing, China
- ★ EDAP TMS S.A., Vaulx-en-Velin, France
- ★ EyeTechCare, Rillieux-la-Pape, France
- ★ InSightec LTD, Tirat Carmel, Israel
- ★ Philips Healthcare, Eindhoven, The Netherlands
- ★ SonaCare Medical, LLC, Charlotte, North Carolina
- ★ Theraction, Malakoff, France

Manufacturers

Manufacturers by Region

■ US guidance ■ MR guidance ■ MR & US guidance ■ Transducers ■ Other

10

North America

- BrainSonix
Sherman Oaks, California
- FUS Instruments Inc.
Toronto, Canada
- Histosonics, Inc.
Ann Arbor, Michigan
- International Cardio Corporation, LLC
Minnetonka, Minnesota
- Kona Medical
Bellevue, Washington
- Mirabilis Medica
Bothell, Washington
- Profound Medical Inc.
Toronto, Canada
- SonaCare Medical, LLC
Charlotte, North Carolina
- Sonic Concepts
Bothell, Washington
- Verasonics
Redmond, Washington

12

Europe

- Acublate
London, UK
- CarThera
Paris, France
- EDAP TMS S.A.
Vaulx-en-Velin, France
- EyeTechCare
Rillieux-la-Pape, France
- Image Guided Therapy (IGT)
Pessac, France
- Imasonic
Voray-sur-l'Ognon, France
- InSightec LTD
Tirat Carmel, Israel
- Medsonic LTD
Limassol, Cyprus
- Philips Healthcare
Eindhoven, The Netherlands
- Promedica Bioelectronics
Rome, Italy
- Supersonic Imagine
Aix-en-Provence, France
- Theraclion
Malakoff, France

10

Asia

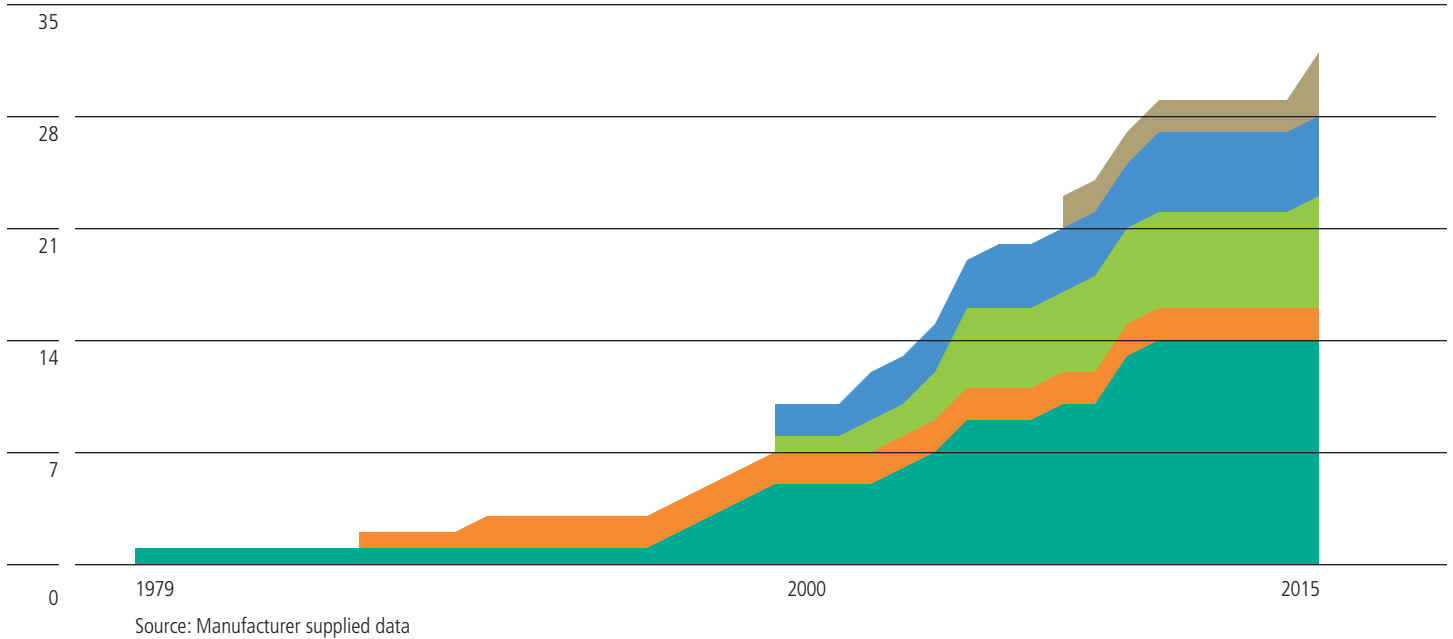
- Alpinion Medical Systems
Seoul, Korea
- Changjiangyuan Technology Development Co., LTD
Shenyang, China
- Chongqing Haifu (HIFU) Medical Technology Co., LTD
Chongqing, China
- EpiSonica
Hsichu City, Taiwan
- Mianyang Sonic (SUONIKE) Electronic
Mianyang, China
- NaviFUS
New Taipei City, Taiwan
- Shanghai A&S Co., LTD
Shanghai, China
- Shenzhen PRO-HIFU Medical Tech. Co., LTD
Shenzhen, China
- Shenzhen Wikkon
Shenzhen, China
- Sumo Corporations
Shanghai, China

Manufacturer Criteria: Ultrasound technology must be 1) therapeutic 2) non-invasive 3) focused 4) image-guided

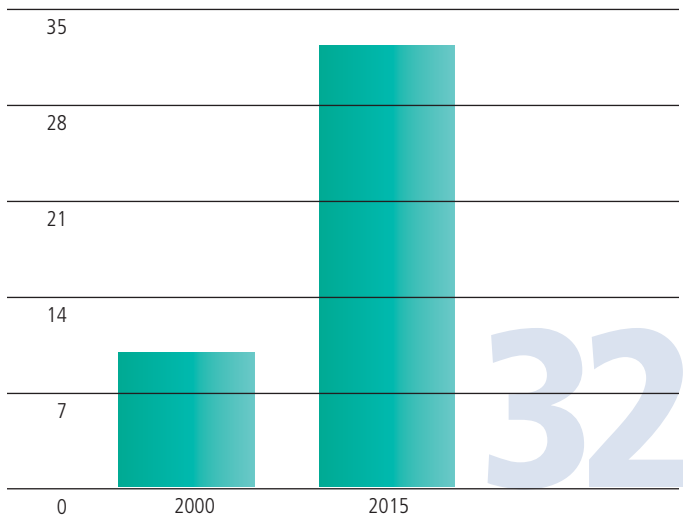
Manufacturers

Growth of FUS Manufacturers

■ US guidance
 ■ MR guidance
 ■ MR & US guidance
 ■ Transducers
 ■ Other



Number of Manufacturers



US guidance

- 1979 EDAP FUS
- 1995 Sumo Corporations
- 1996 Shenzhen Wikkon
- 1997 SonaCare
- 1998 Mianyang Sonic
- 2002 Verasonics
- 2003 Shenzhen PRO-HIFU
- 2004 Mirabilis Theraclion
- 2007 Alpinion
- 2009 Histosonic International Cardio Corp. Kona Medical
- 2010 Acublate

MR guidance

- 1999 Insightec
- 2001 Image Guided Therapy
- 2003 BrainSonix
- 2005 Medsonic Philips FUS
- 2008 Profound
- 2015 EpiSonica

MR & US guidance

- 1999 Changjiangyuan Tech Chongqing HAIFU
- 2001 Shanghai A&S
- 2005 Supersonic
- 2009 FUS Instruments

Transducers

- 1986 Sonic Concepts
- 1989 Imasonic

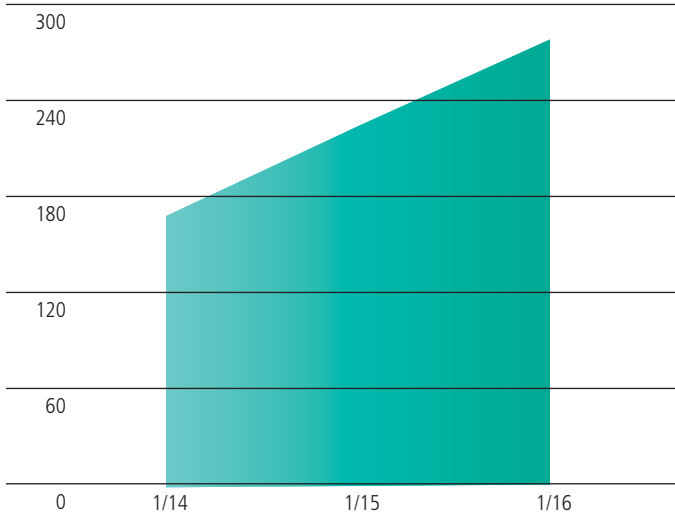
Other

- 2008 CarThera EyeTechCare
- 2015 NaviFUS Promedica Bioelectronics

Research Trends

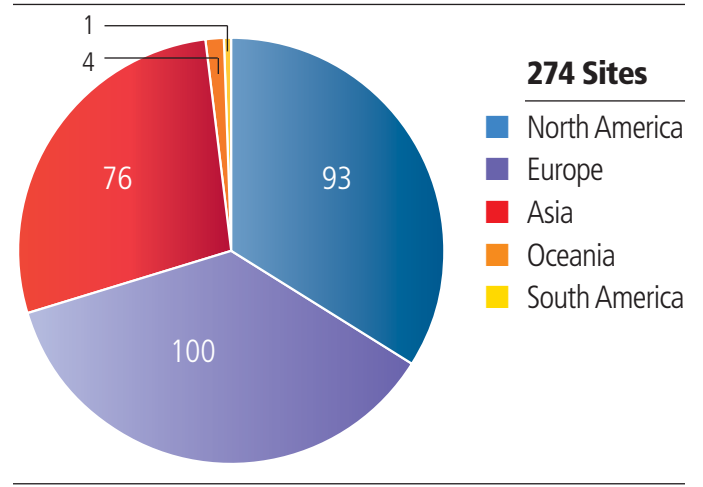
Total Research Sites Growth

January 2014 to January 2016



Total Research Sites by Region

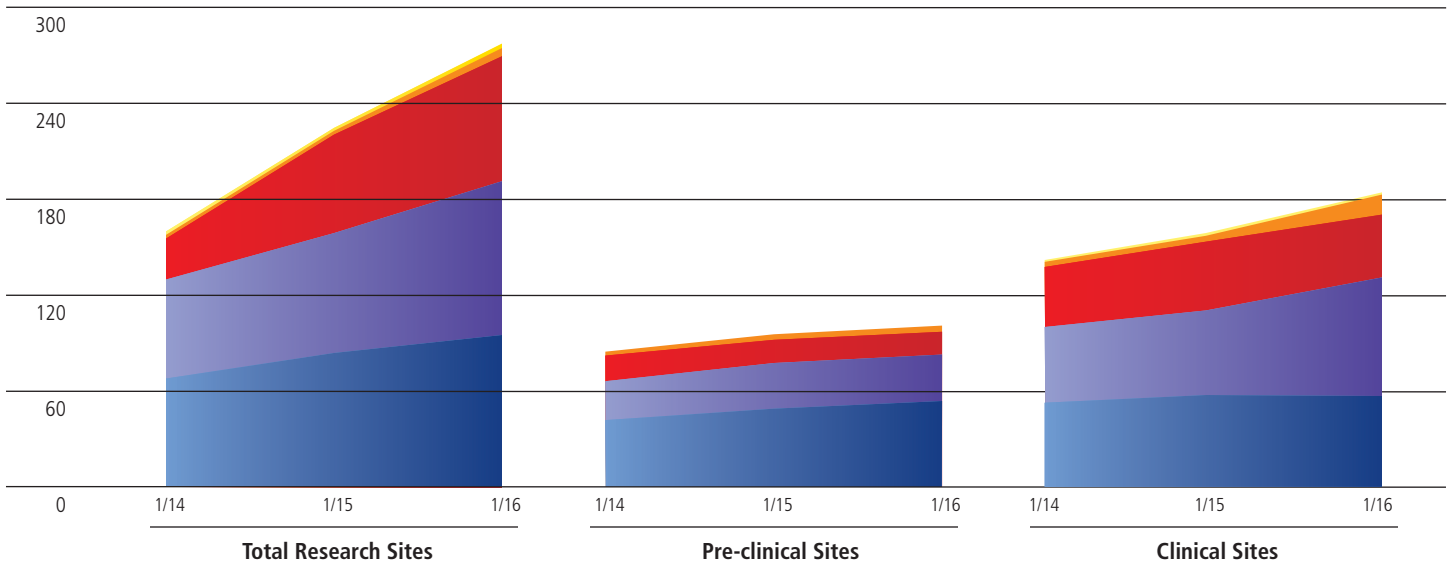
January 2016



Research Sites Growth by Region

January 2014 to January 2016

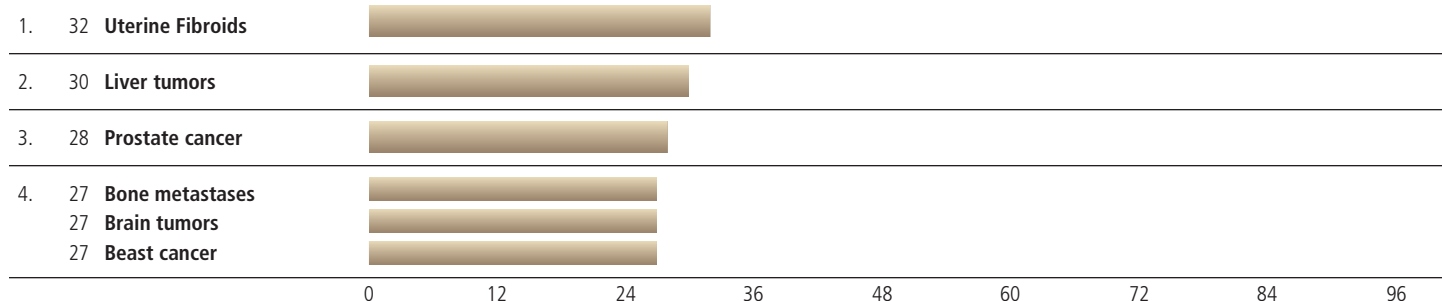
North America Europe Asia Oceania South America



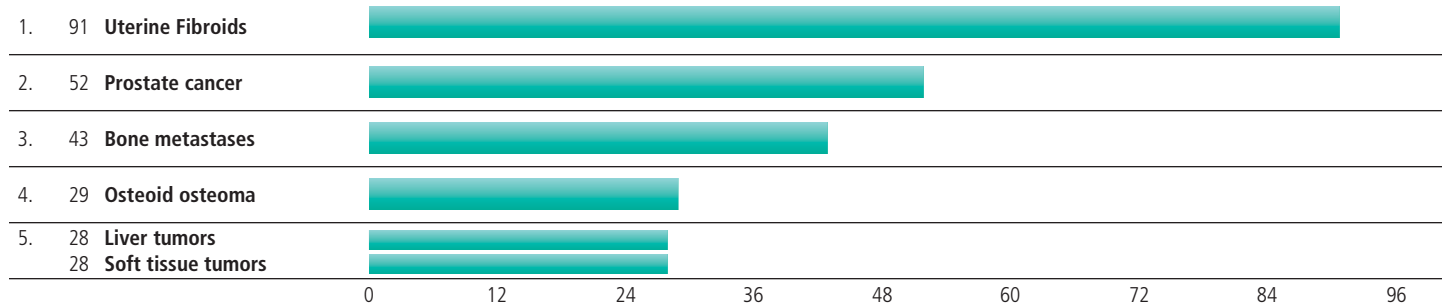
Research Trends

Leading Indications by Number of Sites

Pre-clinical

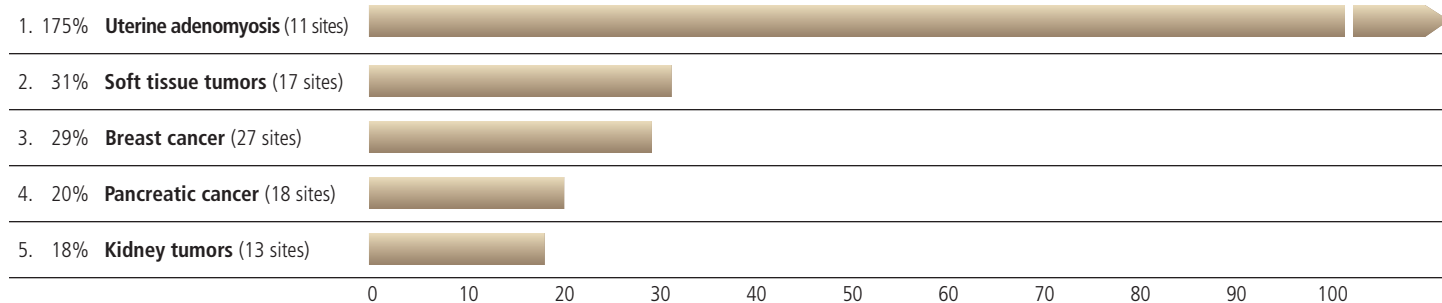


Clinical

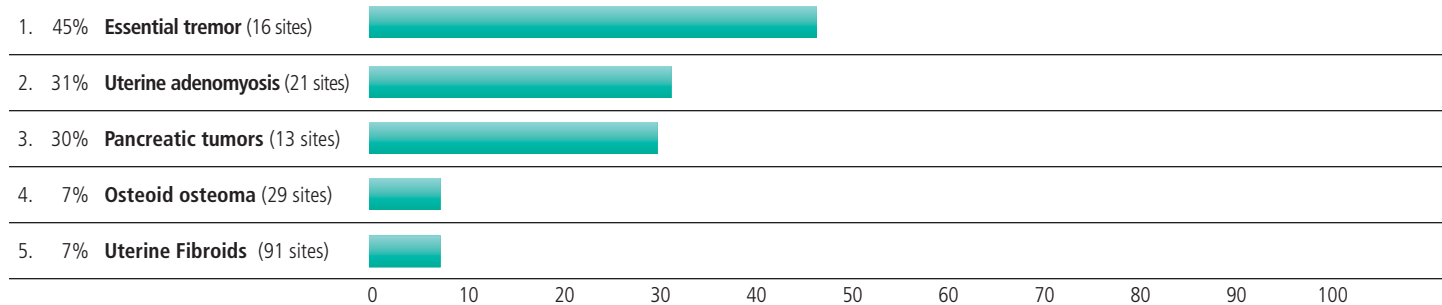


Emerging Research Indications by Growth in Number of Sites

Pre-clinical, % change over 1 year ending January 2016 (at least 10 sites)

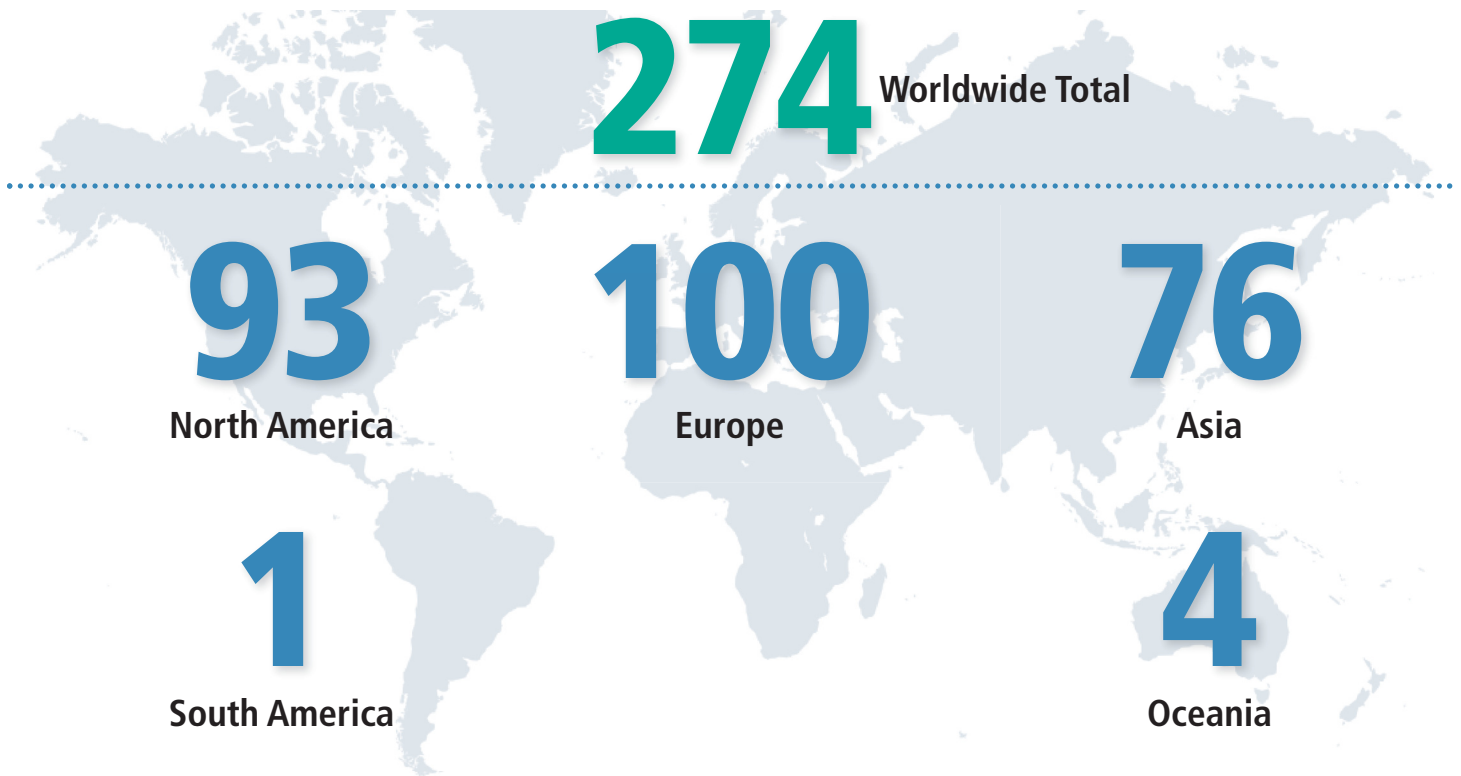


Clinical, % change over 1 year ending January 2016 (at least 10 sites)



Research Sites

All Research Sites by Region



Any FUS research site conducting technical, pre-clinical, or clinical FUS research.

Research Sites

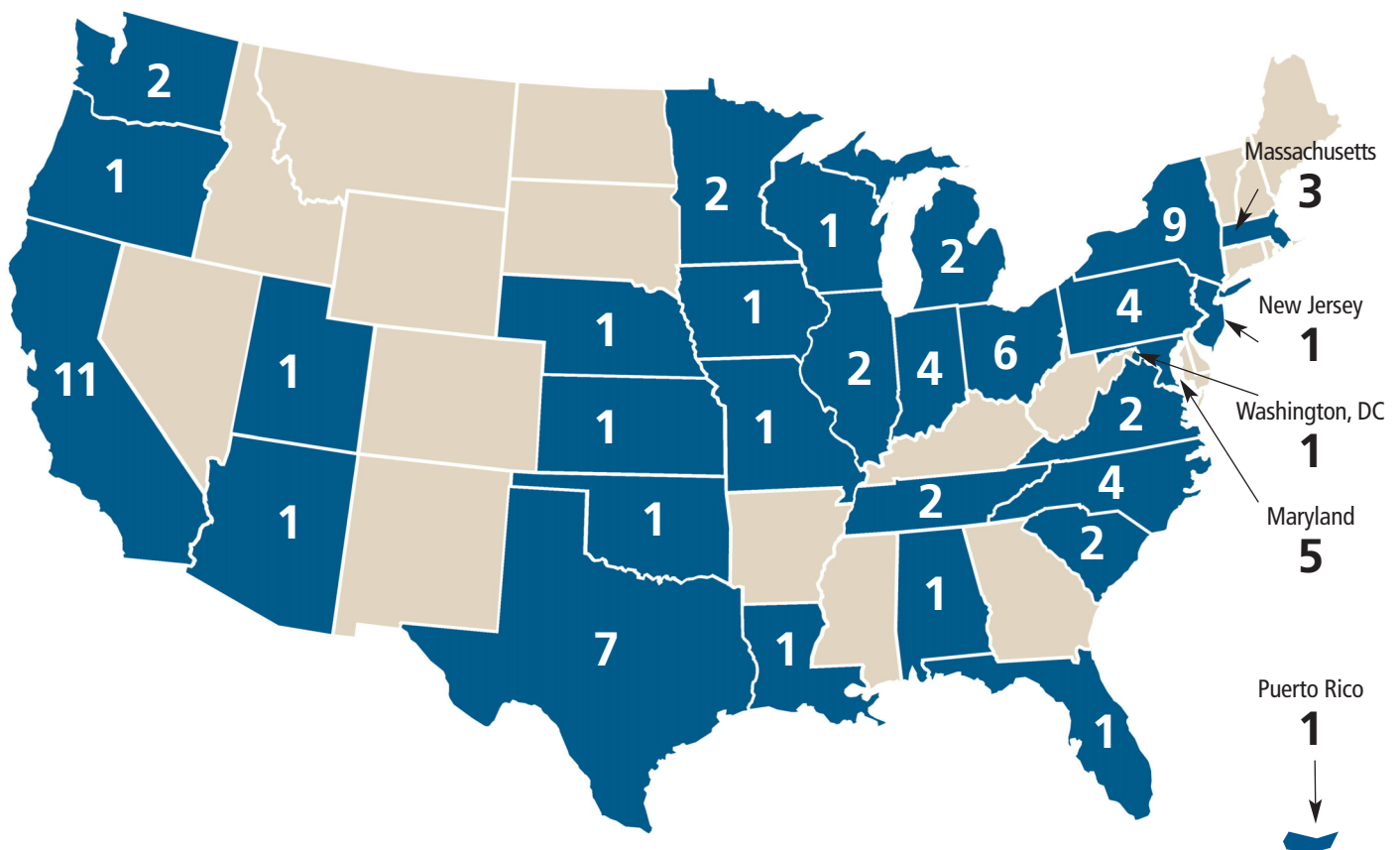
North American and South America

82

United States

29

States + Wash.,DC + PR



93

North America



1

South America



Research Sites

11
Canada

Ontario

Lawson Health Research Institute
 London Health Sciences Centre
 Princess Margaret Hospital
 Ryerson University
 Sunnybrook Health Sciences Centre
 The Hospital for Sick Children (SickKids)
 Thunder Bay Regional Research Institute
 Toronto General Hospital
 Toronto Western Hospital
 University of Western Ontario

Québec

Jewish General Hospital

82
United States

Alabama

Urology Centers of Alabama

Arizona

Arizona State University

California

BURL Concepts Inc.
 California Institute of Technology
 City of Hope
 Long Beach Eye Care Associates
 San Diego State University
 Stanford University School of Medicine
 University of California Davis
 University of California Irvine
 University of California Los Angeles
 University of California San Diego Thornton Hospital
 University of California San Francisco

Washington, DC

Children’s National Hospital

Florida

University MRI & Diagnostic Imaging Centers–South

Iowa

Iowa State University

Illinois

University of Chicago
 University of Illinois at Urbana-Champaign

Indiana

Indiana University Health, University Hospital
 Indiana University School of Medicine
 Metropolitan Urology
 Purdue University–West Lafayette

Kansas

University of Kansas–KU Bioengineering Research Center
 Mechanical Engineering

Louisiana

Tulane University

Massachusetts

Boston University
 Brigham and Women’s Hospital
 Worcester Polytechnic Institute

Maryland

Food and Drug Administration
 Johns Hopkins University School of Medicine
 National Institutes of Health
 University of Maryland School of Medicine
 Walter Reed National Military Medical Center

Michigan

University of Michigan
 William Beaumont Health Systems

Minnesota

Mayo Clinic–Minnesota
 University of Minnesota

Any FUS research site conducting technical, biological effects, pre-clinical, or clinical FUS research.

Research Sites

Missouri

Washington University in St. Louis

Nebraska

University of Nebraska Medical Center

New Jersey

Artann Laboratories

New York

City College of New York
 Columbia University
 Memorial Sloan–Kettering Cancer Center
 Montefiore Medical Center
 New York University–Langone Medical Center
 Roswell Park Cancer Institute
 SUNY Upstate Medical University
 Weill Cornell Medical Center
 Winthrop University Hospital

North Carolina

Duke University
 North Carolina State University
 University of North Carolina
 Wake Forest University Baptist Medical Center

Ohio

Cincinnati Children’s Hospital Medical Center
 Cleveland Clinic
 Ohio State University
 ProMedica Toledo Hospital
 University Hospitals of Cleveland Case Medical Center
 University of Cincinnati

Oklahoma

Oklahoma State University

Oregon

Oregon Health and Science University

Pennsylvania

Drexel University
 Fox Chase Cancer Center
 University of Pittsburgh Medical Center
 Urologic Consultants of Southeastern Pennsylvania

Puerto Rico

University of Puerto Rico

South Carolina

Grand Strand Urology
 Medical University of South Carolina

Tennessee

Southeast Urology Network
 Vanderbilt University

Texas

CHI St. Luke’s Health
 The Methodist Hospital
 University of Houston
 University of Texas at Austin
 University of Texas MD Anderson Cancer Center
 University of Texas Southwestern Medical Center
 Urology of San Antonio

Utah

University of Utah

Virginia

University of Virginia Health System
 Virginia Tech Carilion Research Institute

Washington

Swedish Neurosciences Institute
 University of Washington

Wisconsin

University of Wisconsin Carbone Cancer Center

1

South America

Brazil

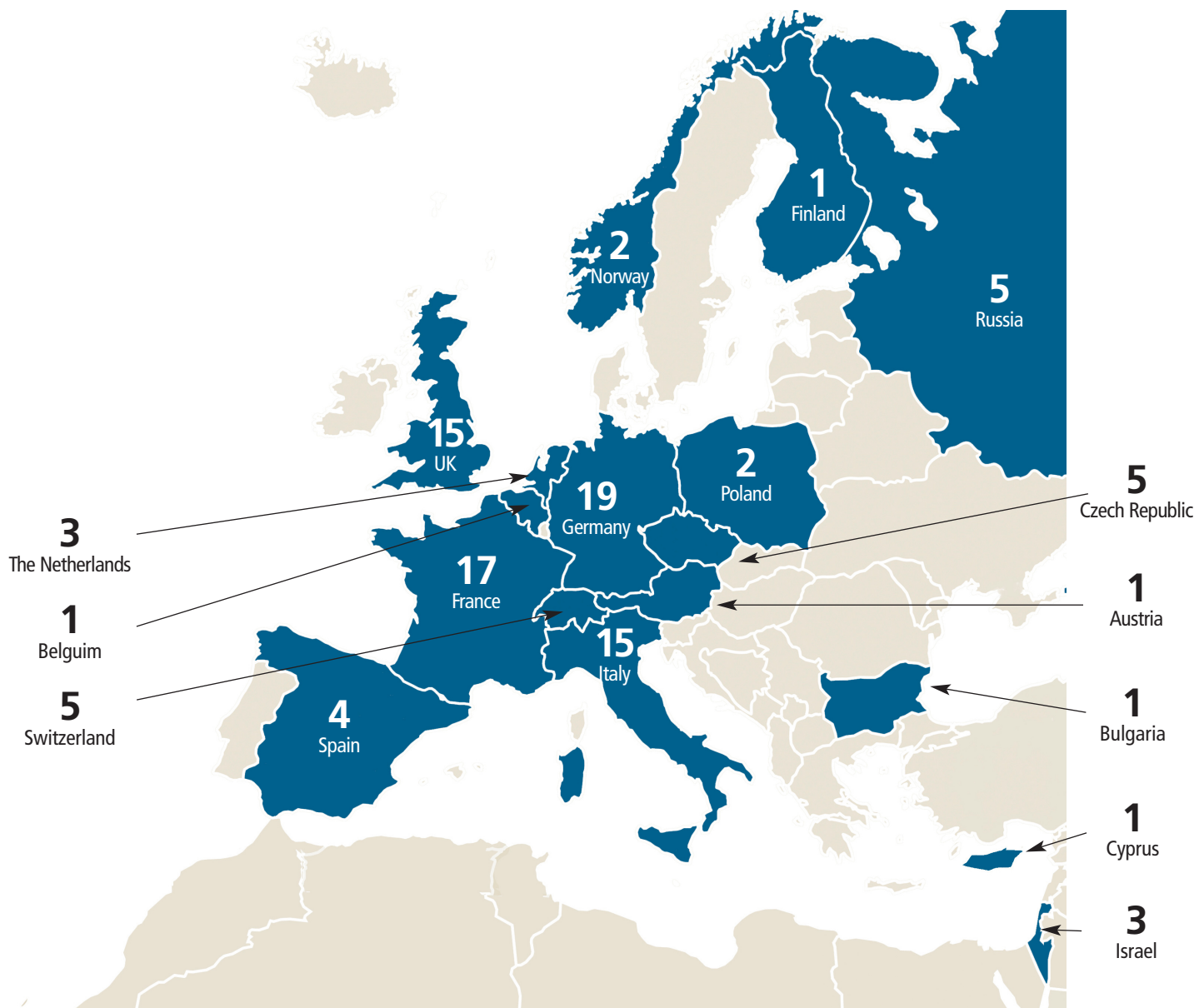
Instituto do Cancer do Estado de Sao Paulo

Any FUS research site conducting technical, biological effects, pre-clinical, or clinical FUS research.

Research Sites

Europe

100
Sites



Research Sites

By Region

100
Europe

Austria

Medical University of Vienna

Belgium

Institut Jules Bordet

Bulgaria

University Hospital of Endocrinology

Cyprus

Cyprus University of Technology

Czech Republic

Mestska Nemocnice Ostrava

Na Homolce Hospital

St. Anne's Hospital

Thomayer University Hospital

University Hospital – Brno

Finland

VTT Technical Research Centre of Finland

France

Centre Léon Bérard

CHU de Bordeaux - Hôpital du Tondu

CHU de Bordeaux - Hôpital Saint-André

CHU de Lille - Hôpital Huriez

CHU de Toulouse - Hôpital Rangueil

CHU de Tours - Hôpital Bretonneau

Hôpital Cochin

Hôpital A. Michallon

Hôpital Pitié-Salpêtrière

Hospices Civils de Lyon

Inserm Lyon

Institut Gustave Roussy

Institut Langevin - ESPCI

Institut Mutualiste Montsouris

University of Franche-Comte

University of Nice Sophia Antipolis

University of Strasbourg

Germany

Amper Klinik

Brustzentrum Marienhospital Bottrop

Charité Universitätsmedizin Berlin

Clemenshospital GmbH

Fraunhofer Institut IBMT

German Cancer Research Center Heidelberg

German Heart Centre - Munich

Klinikum Fürth

Sana CardioMed Nord

SRH Waldklinikum Gera

Universitaeres Herzzentrum Hamburg GmbH

Universitaetsklinikum Erlangen

University Hospital Bonn

University Hospital of Cologne

University Hospital of Leipzig

University Hospital Schleswig-Holstein

University of Heidelberg

University of Munich

Urologische Universitätsklinik Magdeburg

Israel

Chaim Sheba Medical Center

Rambam Medical Center

Technion-Israel Institute of Technology

Italy

Azienda Ospedaliera San Paolo

Careggi General Hospital

Cisanello Hospital of University of Pisa

Clinica oculistica Università-Ospedale oftalmico

European Institute of Oncology

Istituto Ortopedico Rizzoli

Laboratorio di Tecnologie Oncologiche HSR Giglio-

Fondazione Istituto San Raffaele G. Giglio di Cefalù

Niguarda Hospital

Ospedale Generale Regionale "Francis Miulli"

Scuola Superiore Sant'Anna

Università degli Studi di Parma

University of L'Aquila

University of Perugia

University of Rome-La Sapienza

University of Turin

The Netherlands

Eindhoven University of Technology

Radboud University Nijmegen Medical Centre

University Medical Center Utrecht

Norway

Norwegian University of Science and Technology

The Intervention Centre, Oslo University Hospital Rikshospitalet

Poland

Institute of Fundamental Technological Research-

Polish Academy of Sciences

Szpital Pro-Familia

Russia

Medical Center of Central Bank of Russian Federation

N. N. Petrov Research Institute of Oncology

National Medical Surgery Center

Research Center for Obstetrics, Gynecology and Perinatology

of Russian Ministry of Health and Social Development

Rostov Scientific Research Institute of Oncology

Spain

CINAC HM Puerta del Sur

Hospital Clínico San Carlos

Hospital Universitari Mutua Terrassa

Instituto Cartuja de Técnicas Avanzadas en Medicina

Switzerland

FUS-Center, University of Zurich, Children's Hospital

Geneva University Hospital

Kantonsspital Aarau

Kantonsspital Winterthur

University of Geneva

United Kingdom

Basingstoke and North Hampshire Hospital

Birmingham Heartlands Hospital

Churchill Hospital

Imperial College London

Institute for Medical Science and Technology

Southampton University Hospital

St. Bartholomew's Hospital

St. Mary's Hospital

The Institute of Cancer Research

University College London

University Hospital of Wales

University of Dundee

University of Glasgow

University of Hull

University of Oxford

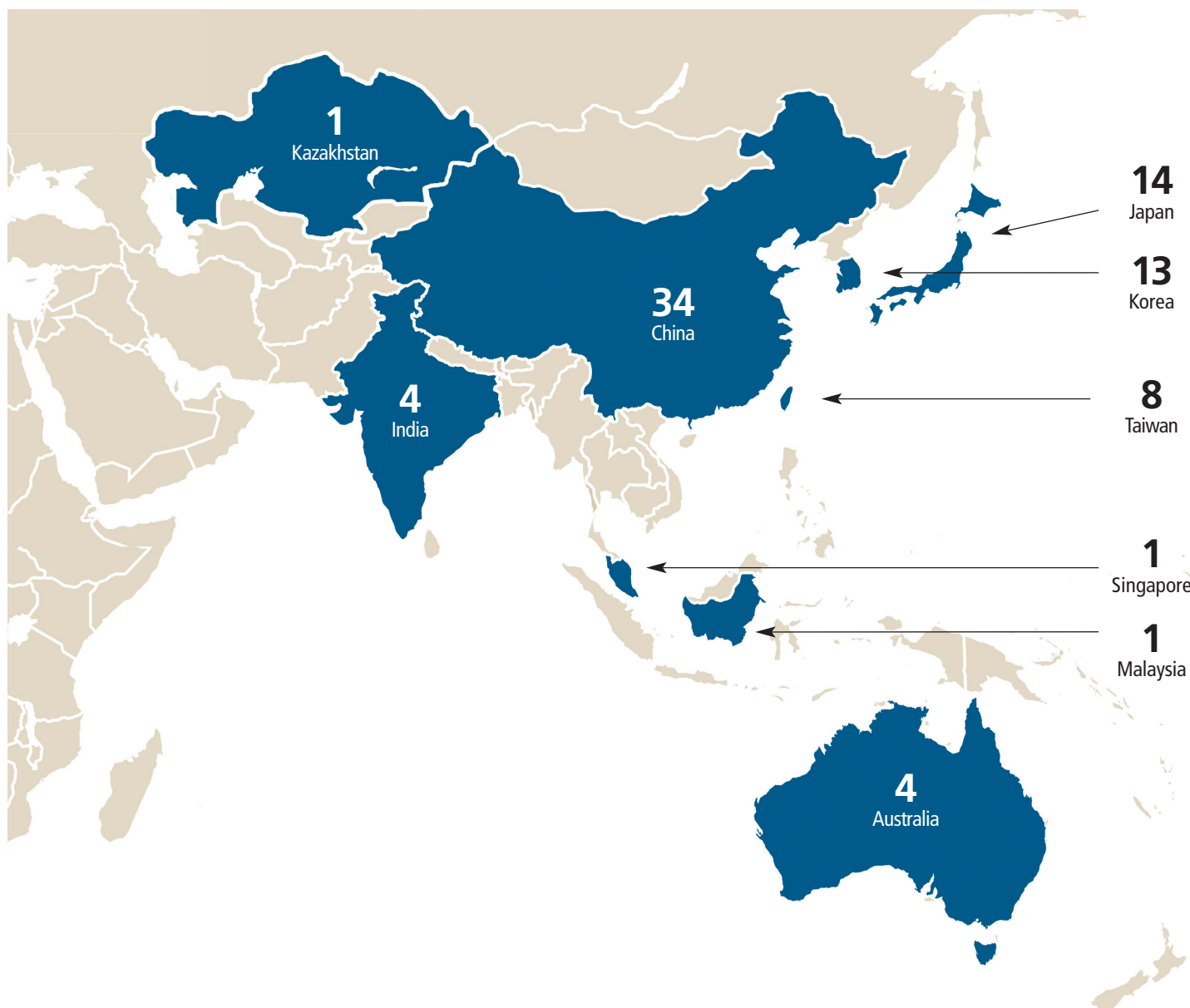
Any FUS research site conducting technical, biological effects, pre-clinical, or clinical FUS research.

Research Sites

Asia and Oceania

76
Sites in Asia

4
Sites in Oceania



Research Sites

By Region

76

Asia

China

307 Hospital of PLA
 Central Hospital of Shanghai Xuhui District
 Children's Hospital of Chongqing Medical University
 Chinese University of Hong Kong
 Chongqing Medical University
 First Affiliated Hospital of Medical College of Xi'an Jiaotong University
 First Affiliated Hospital of Nanjing Medical University
 First Affiliated Hospital of Zunyi Medical College
 First Maternal and Child Health Hospital of Shanghai
 Fundan University Huashan Hospital
 Fundan University Shanghai Cancer Center
 HAIFU Hospital
 Henan University Huaihe Hospital
 Institute of Ultrasonic Engineering in Medicine and Clinical Centre for Tumour Therapy
 Peking Union Hospital, Chinese Academy of Medical Sciences
 Peking University First Hospital
 PLA 301 Hospital (General Hospital of the People's Liberation Army)
 Queen Mary Hospital of the University of Hong Kong
 Shanghai Jiaotong University
 Shenzhen Institutes of Advanced Technology-Chinese Academy of Science
 Shenzhen University
 Southern Medical University
 Suining Central Hospital
 The First Affiliated Hospital of Chongqing Medical University
 The First People's Hospital of Shijiazhuang
 The Second Affiliated Hospital of Zhejiang University
 The Second Artillery General Hospital of Chinese PLA
 The Third Xiangya Hospital of Central South University
 The University of Hong Kong
 Third Military Medical University
 Tianjin Medical University
 Wenzhou Medical University
 Wuhan University
 Xi'an Jiaotong University

India

Apollo Specialty Hospital, Chennai
 GSI Medical College
 Jaslok Hospital and Research Centre
 Supercomputer Education and Research Centre

Japan

Breastopia Namba Hospital
 Hokkaido University

Hokuto Hospital
 Kochi University Hospital
 National Center of Neurology and Psychiatry
 Shinsuma General Hospital
 Takanobashi Central Hospital
 Teikyo University
 Tohoku University
 Tokai University
 Tokyo Medical University
 Tokyo University of Pharmacy and Life Sciences
 Tokyo Women's Medical Hospital
 Washokai Sadamoto Hospital

Kazakhstan

National Medical Research Center

Korea

Asan Medical Center
 CHA Bundang Medical Center
 Chaum Hospital
 Chonnam National University
 Ewha Womans University Medical Center
 Jeju National University
 Korea Institute of Science and Technology
 Samsung Medical Center
 The Catholic University of Korea
 Seoul National University Hospital
 Sogang University
 The Catholic University of Korea
 YUMC Gangnam Severance Hospital
 YUMC Severance Hospital

Malaysia

University of Malaya

Singapore

Nanyang Technological University

Taiwan

Chang Gung University
 I-Shou University
 National Chiao Tung University
 National Health Research Institutes
 National Taiwan University
 National Tsing Hua University
 National Yang-Ming University
 Taipei Medical University Hospital

4

Oceania

Australia

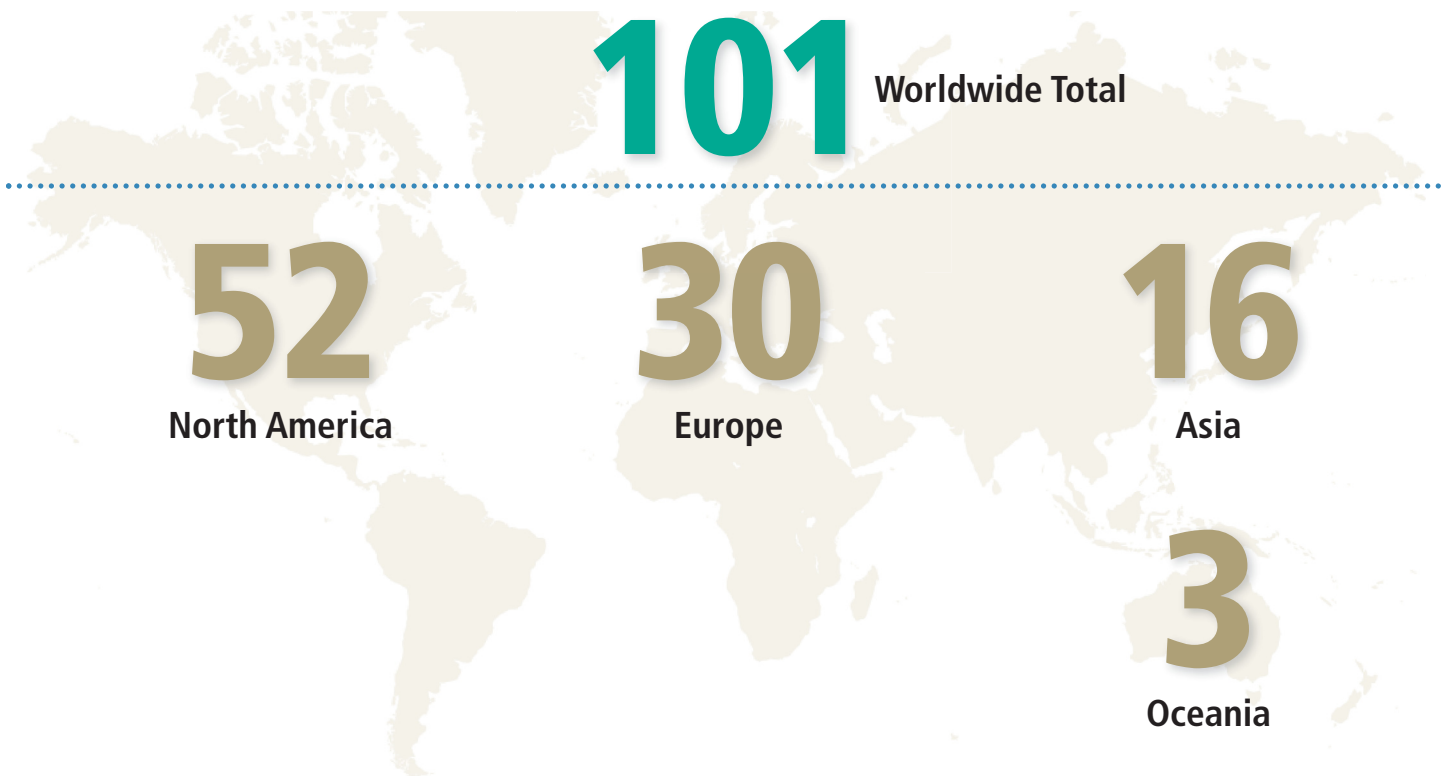
Future Medical Imaging Group
 Royal Women's Hospital Melbourne
 University of Queensland

New Zealand

Mercy Angiography

Pre-Clinical

Research Sites

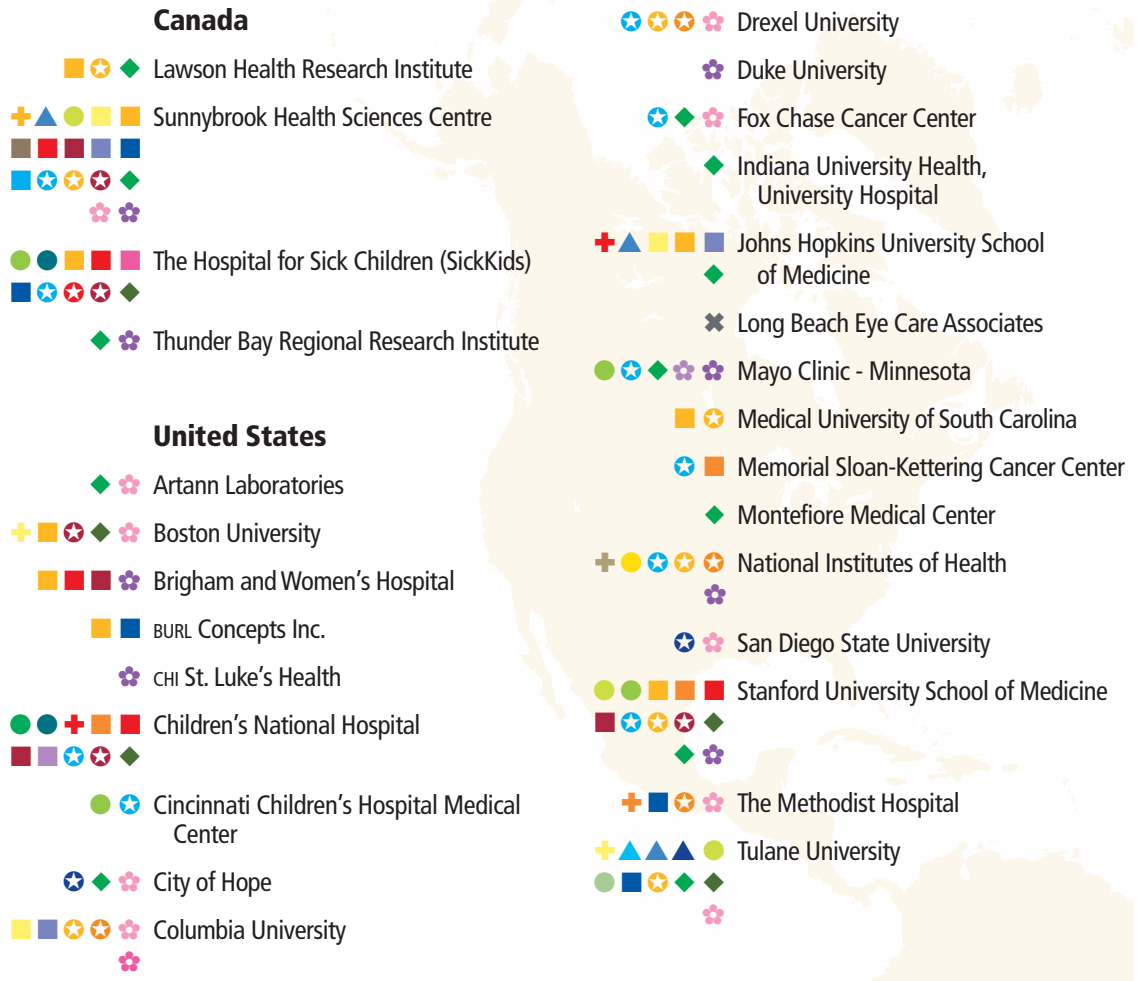


Any FUS research site conducting animal research.

Pre-Clinical

Sites by Region

52
North America

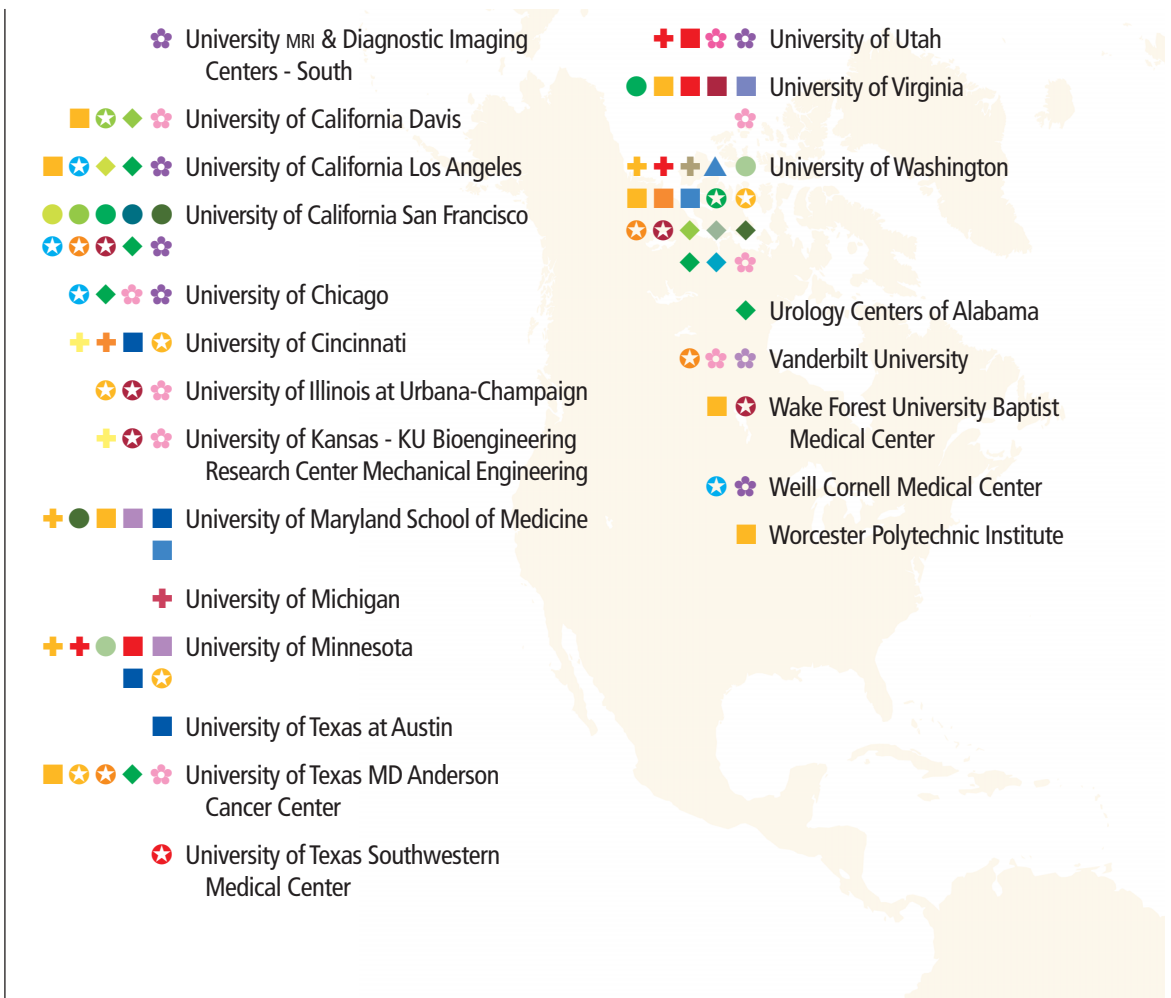


<p>Cardiovascular</p> <ul style="list-style-type: none"> Atherosclerosis Atrial fibrillation Deep vein thrombosis Hypertension Peripheral arterial disease Septal perforation <p>Endocrine Disorders</p> <ul style="list-style-type: none"> Diabetes* Obesity Thyroid and parathyroid tumors Thyroid nodule 	<p>Miscellaneous</p> <ul style="list-style-type: none"> Glaucoma <p>Musculoskeletal</p> <ul style="list-style-type: none"> Back and neck pain Bone cancer Muscular dystrophy Osteoarthritis Osteoid osteoma Spinal cord injury Spinal tumors 	<p>Neurological</p> <ul style="list-style-type: none"> Alzheimer's disease Brain tumors Cancer pain Depression Epilepsy Essential tremor Hydrocephalus Neuropathic pain Parkinson's disease Stroke Traumatic brain injury Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> Bone metastases Colon cancer Esophageal cancer Head & Neck Cancer Liver tumors Lung cancer* Pancreatic tumors Pediatric oncology Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> Benign prostatic hyperplasia Bladder tumors Kidney stones Kidney tumors Prostate cancer Ureterocele <p>Women's Health</p> <ul style="list-style-type: none"> Breast cancer Breast fibroadenoma Uterine adenomyosis Uterine fibroids
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* Not in this region

Any FUS research site conducting animal research.

Pre-Clinical



<p>Cardiovascular</p> <ul style="list-style-type: none"> + Atherosclerosis + Atrial fibrillation + Deep vein thrombosis + Hypertension + Peripheral arterial disease + Septal perforation <p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Diabetes* ▲ Obesity ▲ Thyroid and parathyroid tumors ▲ Thyroid nodules 	<p>Miscellaneous</p> <ul style="list-style-type: none"> ✕ Glaucoma <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Back and neck pain ● Bone cancer ● Muscular dystrophy ● Osteoarthritis ● Osteoid osteoma ● Spinal cord injury ● Spinal tumors 	<p>Neurological</p> <ul style="list-style-type: none"> ■ Alzheimer's disease ■ Brain tumors ■ Cancer pain ■ Depression ■ Epilepsy ■ Essential tremor ■ Hydrocephalus ■ Neuropathic pain ■ Parkinson's disease ■ Stroke ■ Traumatic brain injury ■ Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Colon cancer ★ Esophageal cancer ★ Head & Neck Cancer ★ Liver tumors ★ Lung cancer* ★ Pancreatic tumors ★ Pediatric oncology ★ Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia ◆ Bladder tumors ◆ Kidney stones ◆ Kidney tumors ◆ Prostate cancer ◆ Ureterocele <p>Women's Health</p> <ul style="list-style-type: none"> ✿ Breast cancer ✿ Breast fibroadenoma ✿ Uterine adenomyosis ✿ Uterine fibroids <p>* Not in this region</p>
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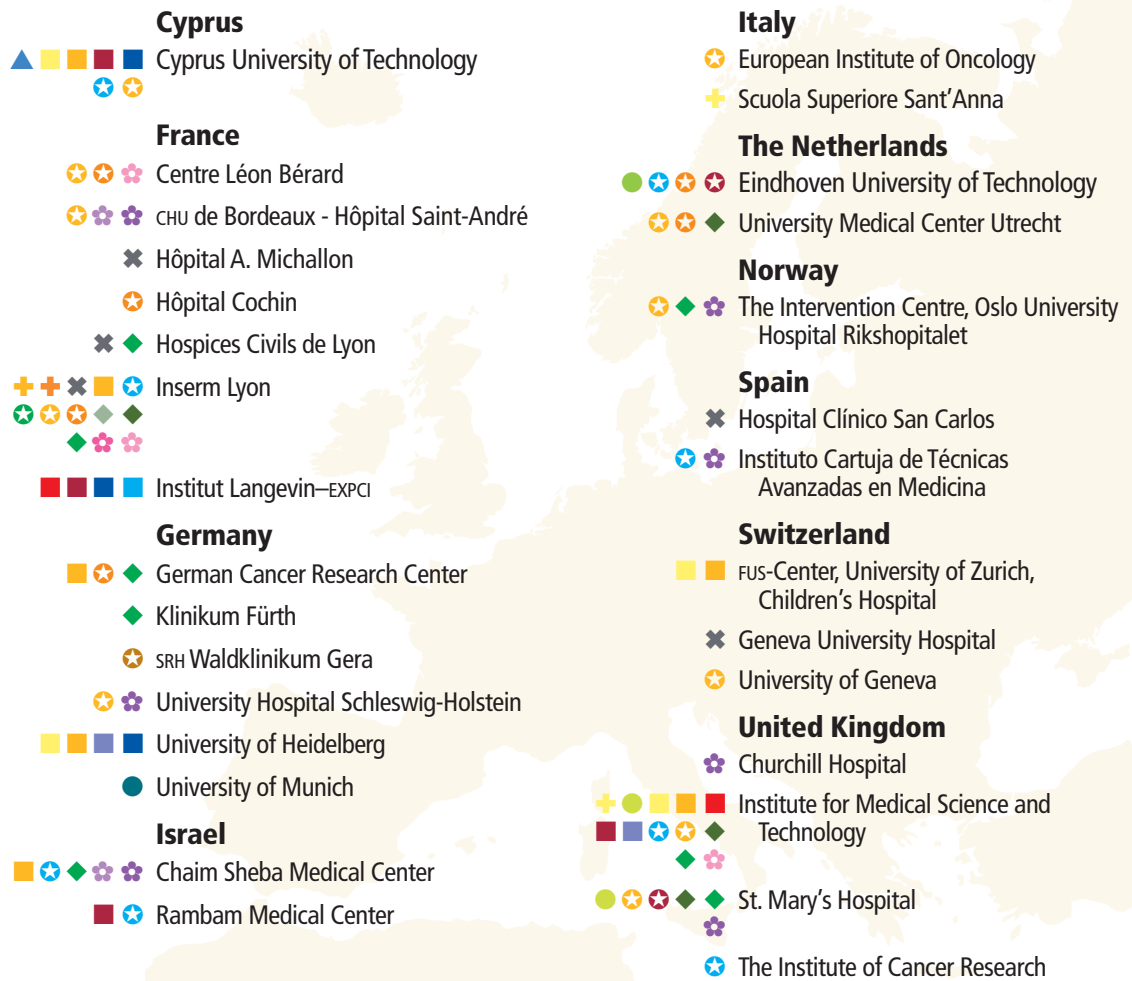
Any FUS research site conducting animal research.

Pre-Clinical

Pre-clinical Research Sites by Region

30

Europe



<p>Cardiovascular</p> <ul style="list-style-type: none"> + Atherosclerosis + Atrial fibrillation + Deep vein thrombosis + Hypertension* + Peripheral arterial disease* + Septal perforation* <p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Diabetes* ▲ Obesity* ▲ Thyroid and parathyroid tumors ▲ Thyroid nodules* 	<p>Miscellaneous</p> <ul style="list-style-type: none"> ✕ Glaucoma <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Back and neck pain ● Bone cancer ● Muscular dystrophy* ● Osteoarthritis* ● Osteoid osteoma ● Spinal cord injury* ● Spinal tumors* 	<p>Neurological</p> <ul style="list-style-type: none"> ■ Alzheimer’s disease ■ Brain tumors ■ Cancer pain* ■ Depression* ■ Epilepsy ■ Essential tremor ■ Hydrocephalus* ■ Neuropathic pain* ■ Parkinson’s disease ■ Stroke ■ Traumatic brain injury* ■ Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Colon cancer* ★ Esophageal cancer ★ Head & Neck Cancer* ★ Liver tumors ★ Lung cancer ★ Pancreatic tumors ★ Pediatric oncology* ★ Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia* ◆ Bladder tumors* ◆ Kidney stones ◆ Kidney tumors ◆ Prostate cancer ◆ Ureterocele* <p>Women’s Health</p> <ul style="list-style-type: none"> ★ Breast cancer ★ Breast fibroadenoma ★ Uterine adenomyosis ★ Uterine fibroids
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* Not in this region

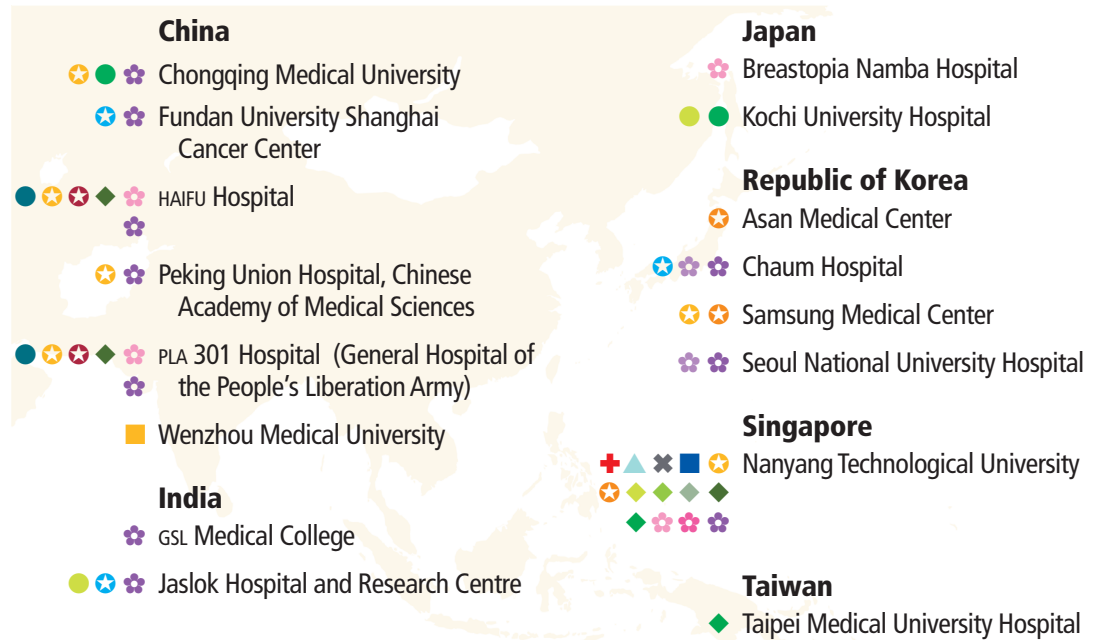
Any FUS research site conducting animal research.

Pre-Clinical

Pre-clinical Research Sites by Region

16

Asia



3

Oceania



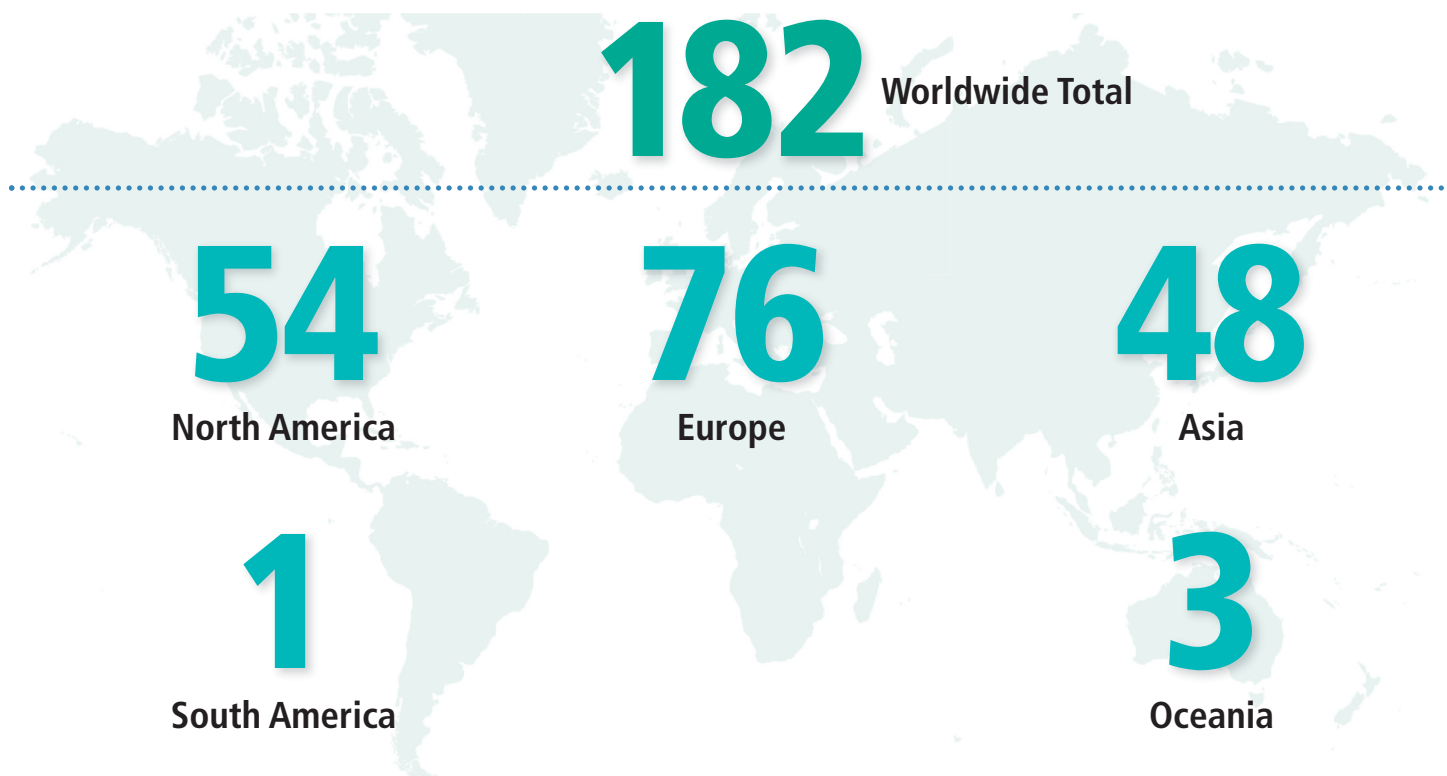
<p>Cardiovascular</p> <ul style="list-style-type: none"> Atherosclerosis* Atrial fibrillation* Deep vein thrombosis* Peripheral arterial disease* Hypertension Septal perforation* <p>Endocrine Disorders</p> <ul style="list-style-type: none"> Diabetes Obesity* Thyroid and parathyroid tumors* Thyroid nodules* 	<p>Miscellaneous</p> <ul style="list-style-type: none"> Glaucoma <p>Musculoskeletal</p> <ul style="list-style-type: none"> Back and neck pain Bone cancer* Muscular dystrophy* Osteoarthritis Osteoid osteoma Spinal cord injury* Spinal tumors* 	<p>Neurological</p> <ul style="list-style-type: none"> Alzheimer's disease Brain tumors Cancer pain* Depression* Epilepsy* Essential tremor* Hydrocephalus* Neuropathic pain* Parkinson's disease* Stroke Traumatic brain injury* Trigeminal neuralgia* 	<p>Oncological</p> <ul style="list-style-type: none"> Bone metastases Colon cancer* Esophageal cancer* Head & Neck Cancer* Liver tumors Lung cancer* Pancreatic tumors Pediatric oncology* Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> Benign prostatic hyperplasia Bladder tumors Kidney stones Kidney tumors Prostate cancer Ureterocele* <p>Women's Health</p> <ul style="list-style-type: none"> Breast cancer Breast fibroadenoma Uterine adenomyosis Uterine fibroids
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* Not in this region

Any FUS research site conducting animal research.

Clinical

Clinical Research Sites by Region



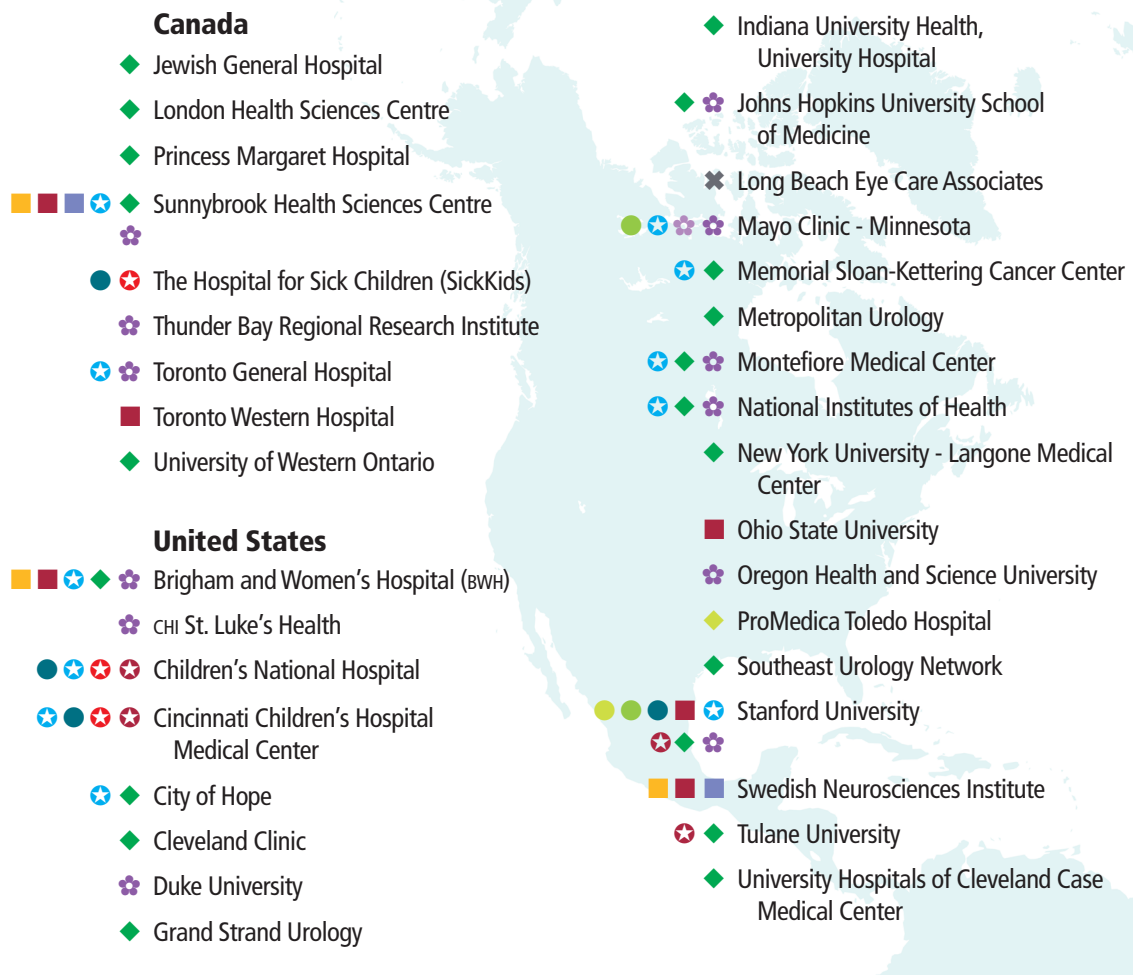
Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region

54

North America

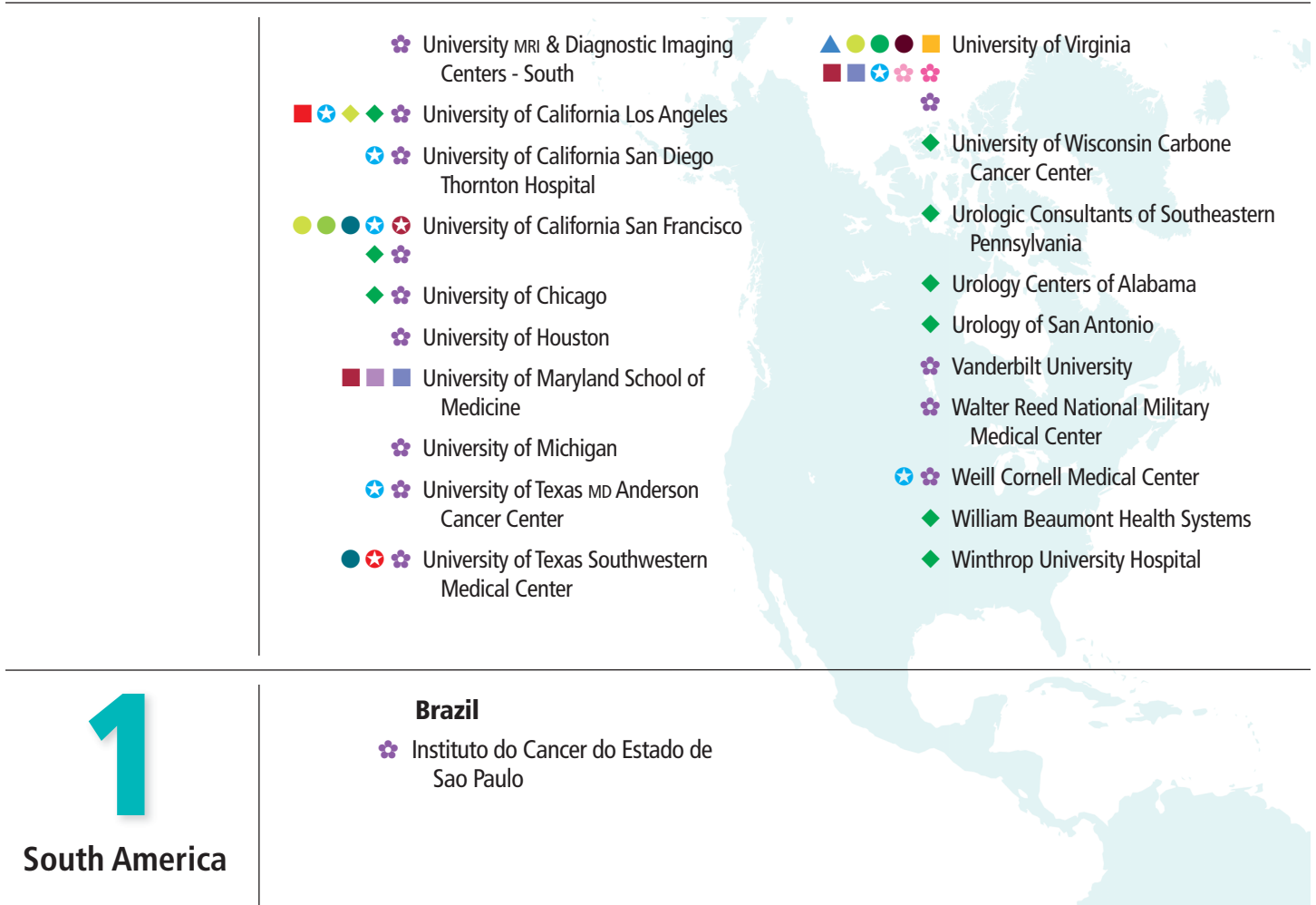


<p>Cardiovascular</p> <p>✚ Hypertension*</p> <p>Endocrine Disorders</p> <p>▲ Diabetes*</p> <p>▲ Obesity*</p> <p>▲ Thyroid and parathyroid tumors</p> <p>▲ Thyroid nodules*</p>	<p>Miscellaneous</p> <p>✕ Glaucoma</p> <p>✕ Hypersplenism*</p> <p>Musculoskeletal</p> <p>● Back and neck pain</p> <p>● Bone cancer</p> <p>● Osteoarthritis</p> <p>● Osteoid osteoma</p> <p>● Sacroiliitis</p>	<p>Neurological</p> <p>■ Brain tumors</p> <p>■ Cancer pain*</p> <p>■ Depression*</p> <p>■ Epilepsy</p> <p>■ Essential tremor</p> <p>■ Neuropathic pain</p> <p>■ Obsessive-compulsive disorder*</p> <p>■ Parkinson's disease</p> <p>■ Stroke*</p> <p>■ Trigeminal neuralgia*</p>	<p>Oncological</p> <p>★ Bone metastases</p> <p>★ Colon cancer*</p> <p>★ Esophageal cancer*</p> <p>★ Liver tumors*</p> <p>★ Pancreatic tumors*</p> <p>★ Pediatric oncology</p> <p>★ Soft tissue tumors</p>	<p>Urological</p> <p>◆ Benign prostatic hyperplasia</p> <p>◆ Kidney stones*</p> <p>◆ Kidney tumors*</p> <p>◆ Prostate cancer</p> <p>Women's Health</p> <p>◆ Breast cancer</p> <p>◆ Breast fibroadenoma</p> <p>◆ Uterine adenomyosis</p> <p>◆ Uterine fibroids</p> <p>* Not in this region</p>
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Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region



<p>Cardiovascular</p> <p>✚ Hypertension*</p> <p>Endocrine Disorders</p> <p>▲ Diabetes*</p> <p>▲ Obesity*</p> <p>▲ Thyroid and parathyroid tumors</p> <p>▲ Thyroid nodules*</p>	<p>Miscellaneous</p> <p>✕ Glaucoma</p> <p>✕ Hypersplenism*</p> <p>Musculoskeletal</p> <p>● Back and neck pain</p> <p>● Bone cancer</p> <p>● Osteoarthritis</p> <p>● Osteoid osteoma</p> <p>● Sacroiliitis</p>	<p>Neurological</p> <p>■ Brain tumors</p> <p>■ Cancer pain*</p> <p>■ Depression*</p> <p>■ Epilepsy</p> <p>■ Essential tremor</p> <p>■ Neuropathic pain</p> <p>■ Obsessive-compulsive disorder*</p> <p>■ Parkinson's disease</p> <p>■ Stroke*</p> <p>■ Trigeminal neuralgia*</p>	<p>Oncological</p> <p>★ Bone metastases</p> <p>★ Colon cancer*</p> <p>★ Esophageal cancer*</p> <p>★ Liver tumors*</p> <p>★ Pancreatic tumors*</p> <p>★ Pediatric oncology</p> <p>★ Soft tissue tumors</p>	<p>Urological</p> <p>◆ Benign prostatic hyperplasia</p> <p>◆ Kidney stones*</p> <p>◆ Kidney tumors*</p> <p>◆ Prostate cancer</p> <p>Women's Health</p> <p>✿ Breast cancer</p> <p>✿ Breast fibroadenoma</p> <p>✿ Uterine adenomyosis</p> <p>✿ Uterine fibroids</p> <p>* Not in this region</p>
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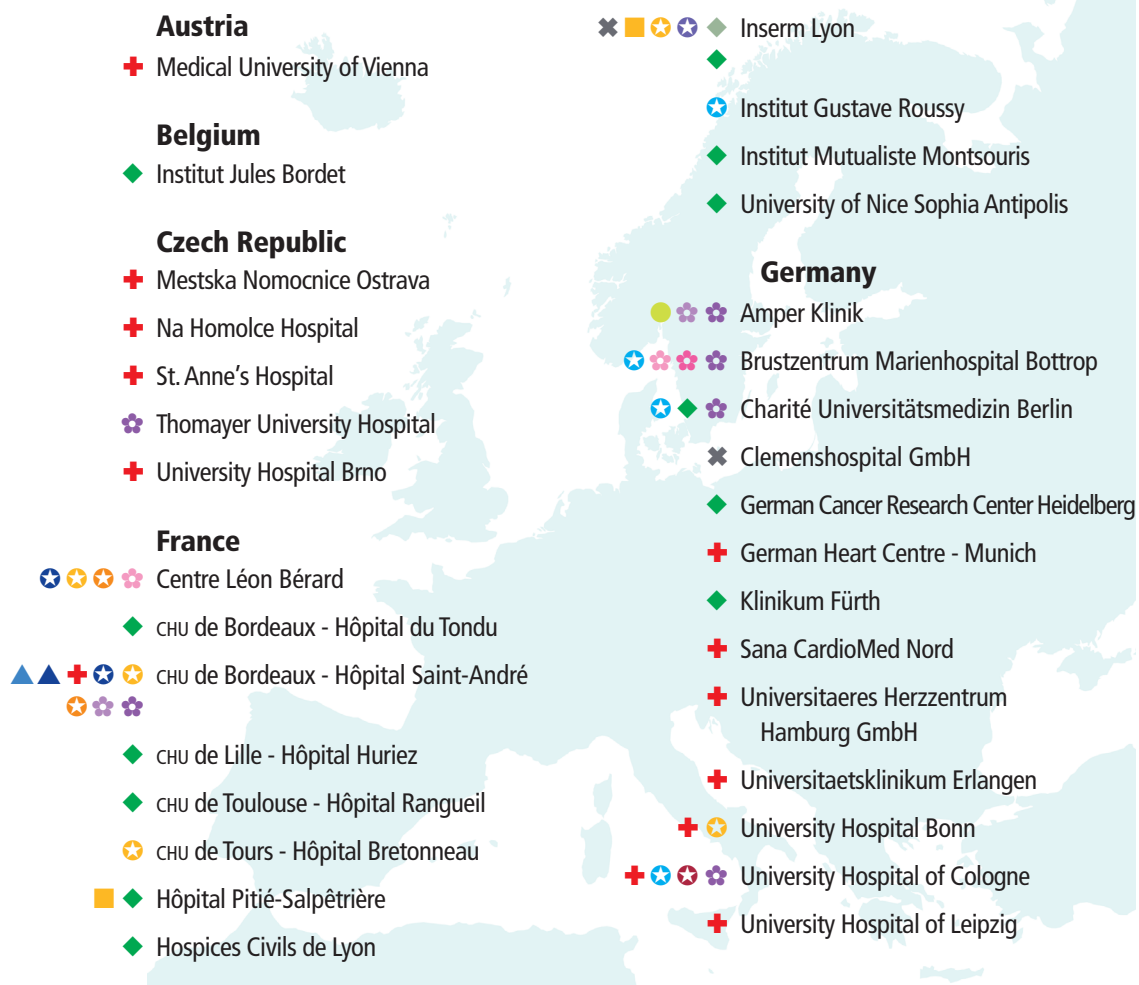
Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region

76

Europe

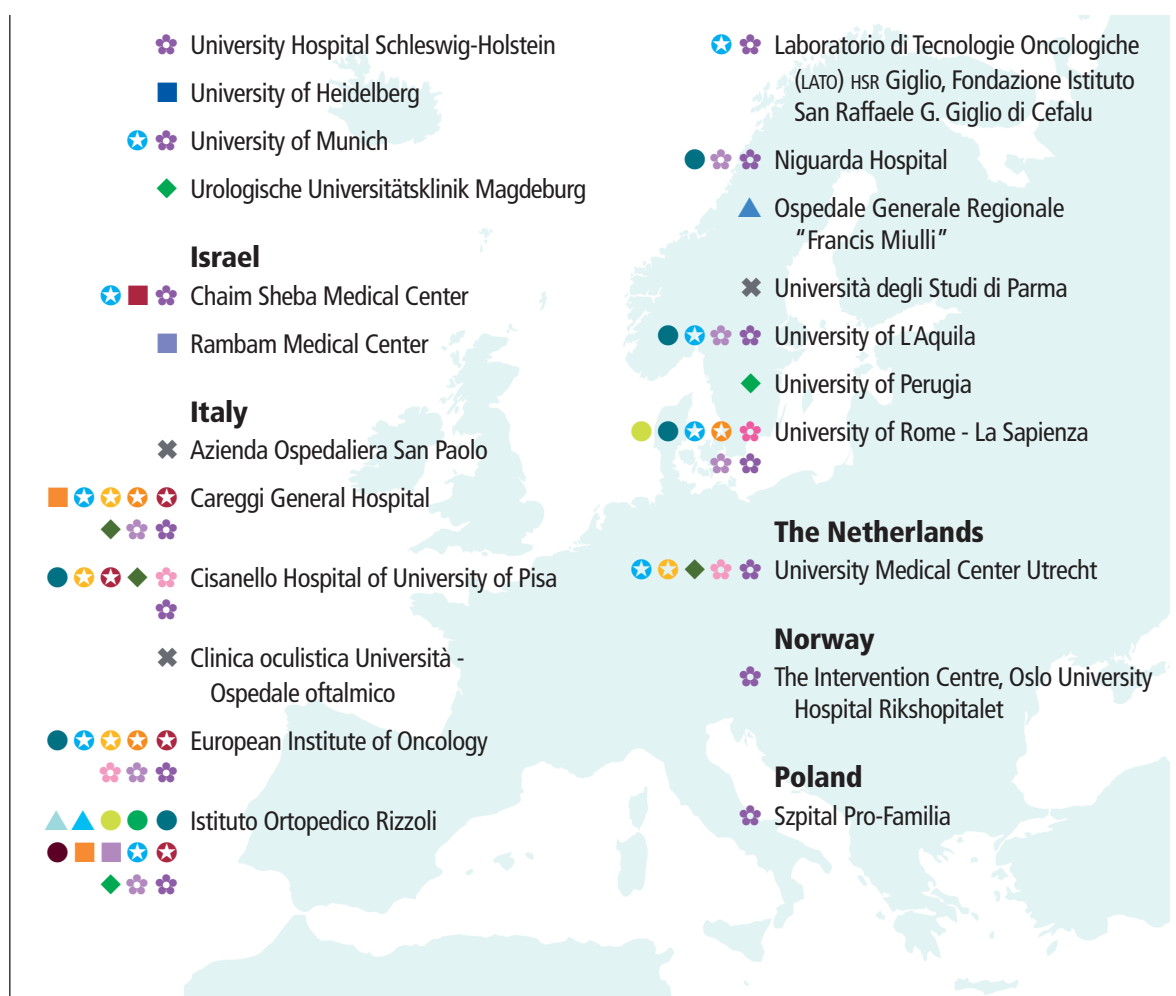


<p>Cardiovascular</p> <ul style="list-style-type: none"> Hypertension <p>Endocrine Disorders</p> <ul style="list-style-type: none"> Diabetes Obesity Thyroid and parathyroid tumors Thyroid nodules 	<p>Miscellaneous</p> <ul style="list-style-type: none"> Glaucoma Hypersplenism* <p>Musculoskeletal</p> <ul style="list-style-type: none"> Back and neck pain Bone cancer* Osteoarthritis Osteoid osteoma Sacroiliitis 	<p>Neurological</p> <ul style="list-style-type: none"> Brain tumors Cancer pain Depression* Epilepsy* Essential tremor Neuropathic pain Obsessive-compulsive disorder* Parkinson's disease Stroke Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> Bone metastases Colon cancer Esophageal cancer Liver tumors Pancreatic tumors Pediatric oncology* Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> Benign prostatic hyperplasia* Kidney stones Kidney tumors Prostate cancer <p>Women's Health</p> <ul style="list-style-type: none"> Breast cancer Breast fibroadenoma Uterine adenomyosis Uterine fibroids <p>* Not in this region</p>
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Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region

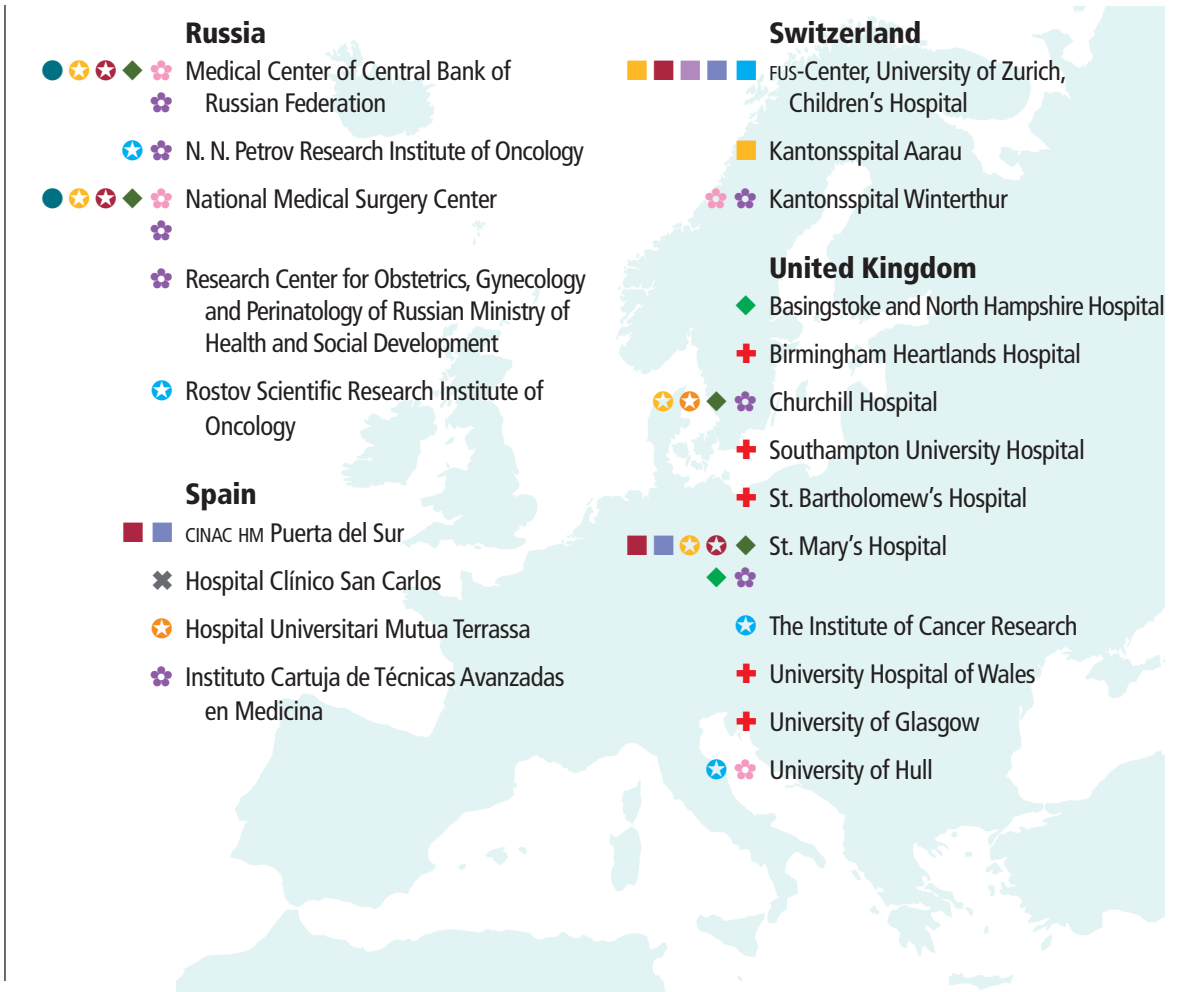


<p>Cardiovascular</p> <ul style="list-style-type: none"> Hypertension <p>Endocrine Disorders</p> <ul style="list-style-type: none"> Diabetes Obesity Thyroid and parathyroid tumors Thyroid nodules 	<p>Miscellaneous</p> <ul style="list-style-type: none"> Glaucoma Hypersplenism* <p>Musculoskeletal</p> <ul style="list-style-type: none"> Back and neck pain Bone cancer* Osteoarthritis Osteoid osteoma Sacroiliitis 	<p>Neurological</p> <ul style="list-style-type: none"> Brain tumors Cancer pain Depression* Epilepsy* Essential tremor Neuropathic pain Obsessive-compulsive disorder* Parkinson's disease Stroke Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> Bone metastases Colon cancer Esophageal cancer Liver tumors Pancreatic tumors Pediatric oncology* Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> Benign prostatic hyperplasia* Kidney stones* Kidney tumors Prostate cancer <p>Women's Health</p> <ul style="list-style-type: none"> Breast cancer Breast fibroadenoma Uterine adenomyosis Uterine fibroids <p>* Not in this region</p>
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Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region



<p>Cardiovascular</p> <ul style="list-style-type: none"> ✕ Hypertension <p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Diabetes ▲ Obesity ▲ Thyroid and parathyroid tumors ▲ Thyroid nodules 	<p>Miscellaneous</p> <ul style="list-style-type: none"> ✕ Glaucoma ✕ Hypersplenism* <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Back and neck pain ● Bone cancer* ● Osteoarthritis ● Osteoid osteoma ● Sacroiliitis 	<p>Neurological</p> <ul style="list-style-type: none"> ■ Brain tumors ■ Cancer pain ■ Depression* ■ Epilepsy* ■ Essential tremor ■ Neuropathic pain ■ Obsessive-compulsive disorder* ■ Parkinson's disease ■ Stroke ■ Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Colon cancer ★ Esophageal cancer ★ Liver tumors ★ Pancreatic tumors ★ Pediatric oncology* ★ Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia* ◆ Kidney stones ◆ Kidney tumors ◆ Prostate cancer <p>Women's Health</p> <ul style="list-style-type: none"> ☆ Breast cancer ☆ Breast fibroadenoma ☆ Uterine adenomyosis ☆ Uterine fibroids <p>* Not in this region</p>
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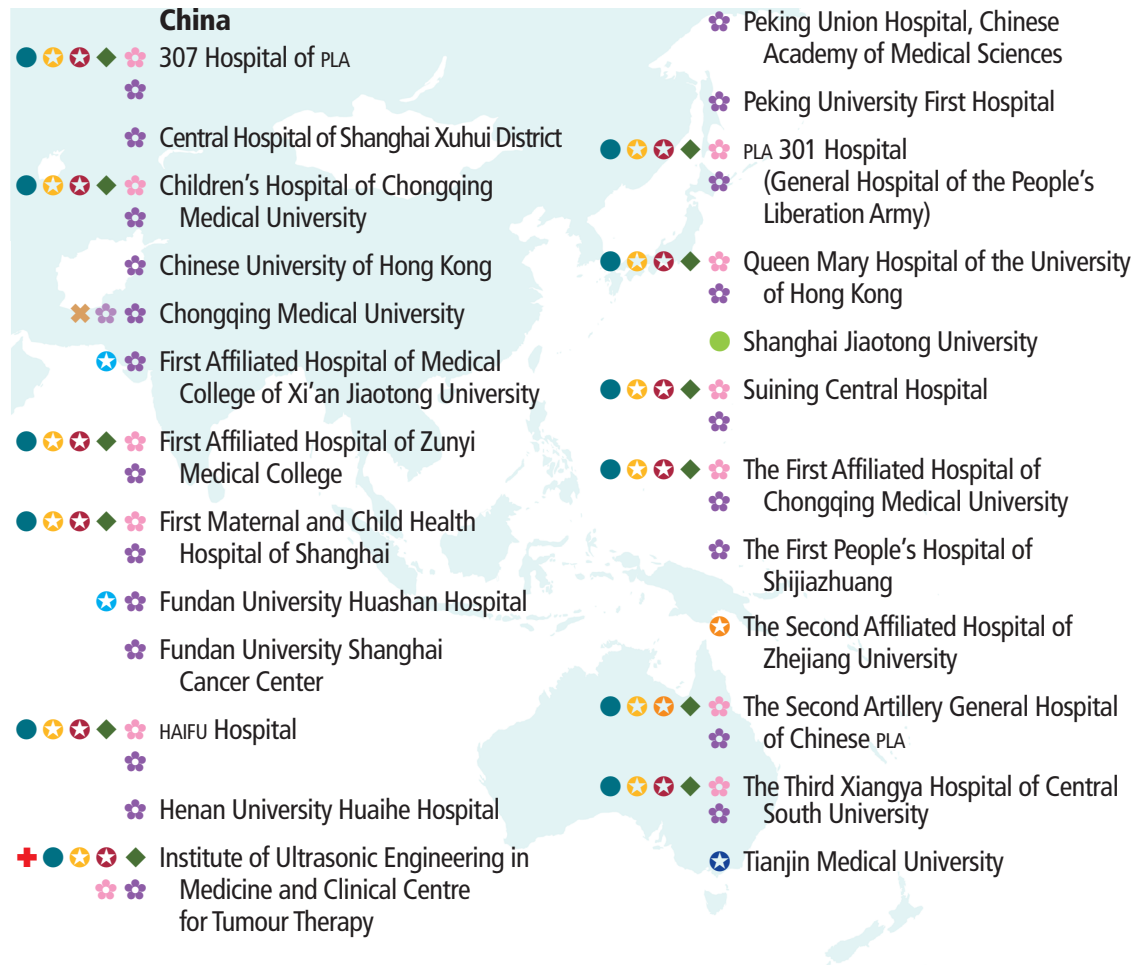
Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region

48

Asia

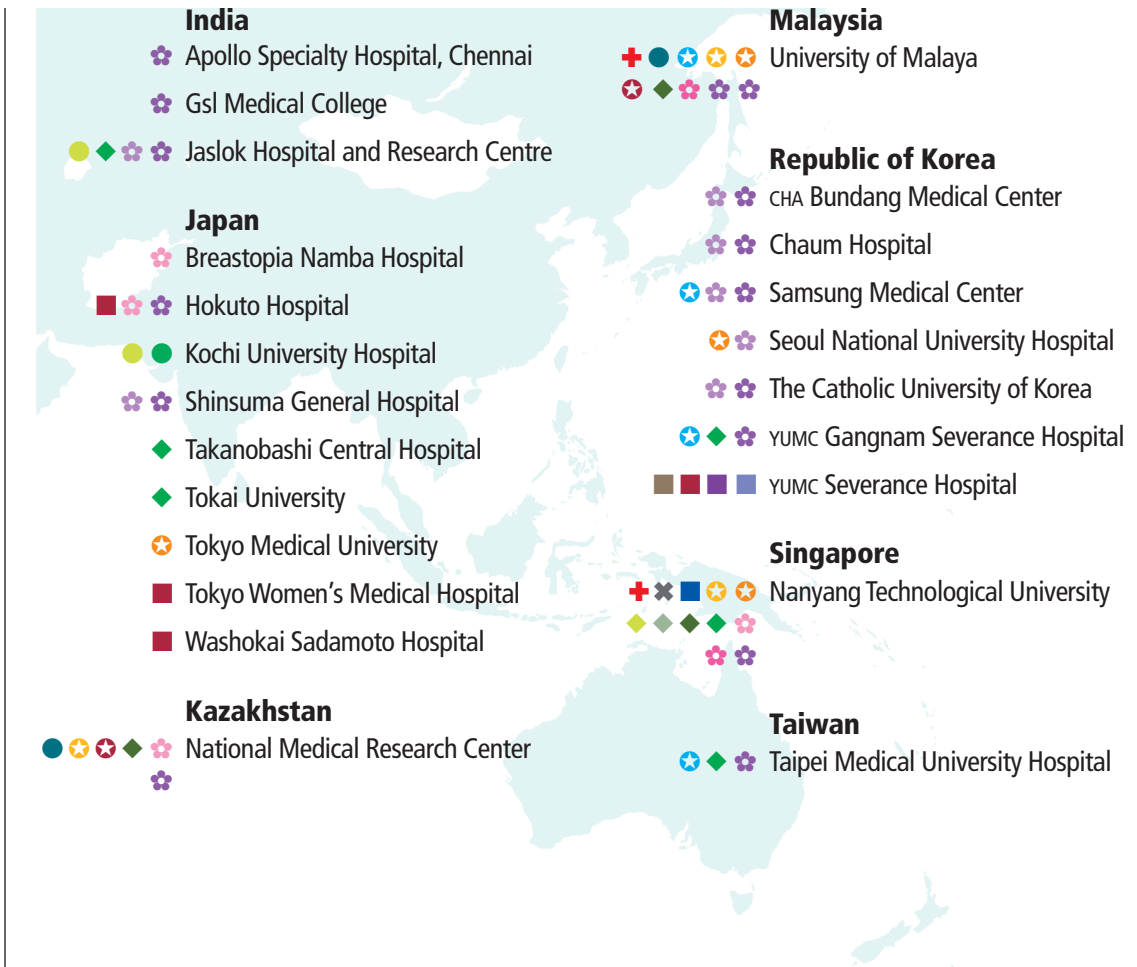


<p>Cardiovascular</p> <p>✚ Hypertension</p> <p>Endocrine Disorders</p> <p>▲ Diabetes*</p> <p>▲ Obesity*</p> <p>▲ Thyroid and parathyroid tumors*</p> <p>▲ Thyroid nodules*</p>	<p>Miscellaneous</p> <p>✕ Glaucoma</p> <p>✕ Hypersplenism</p> <p>Musculoskeletal</p> <p>● Back and neck pain</p> <p>● Bone cancer</p> <p>● Osteoarthritis</p> <p>● Osteoid osteoma</p> <p>● Sacroiliitis*</p>	<p>Neurological</p> <p>■ Brain tumors*</p> <p>■ Cancer pain</p> <p>■ Depression</p> <p>■ Epilepsy*</p> <p>■ Essential tremor</p> <p>■ Neuropathic pain*</p> <p>■ Obsessive-compulsive disorder</p> <p>■ Parkinson's disease</p> <p>■ Stroke</p> <p>■ Trigeminal neuralgia*</p>	<p>Oncological</p> <p>★ Bone metastases</p> <p>★ Colon cancer</p> <p>★ Esophageal cancer*</p> <p>★ Liver tumors</p> <p>★ Pancreatic tumors</p> <p>★ Pediatric oncology*</p> <p>★ Soft tissue tumors</p>	<p>Urological</p> <p>◆ Benign prostatic hyperplasia</p> <p>◆ Kidney stones</p> <p>◆ Kidney tumors</p> <p>◆ Prostate cancer</p> <p>Women's Health</p> <p>☆ Breast cancer</p> <p>☆ Breast fibroadenoma</p> <p>☆ Uterine adenomyosis</p> <p>☆ Uterine fibroids</p> <p>* Not in this region</p>
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Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region



<p>Cardiovascular</p> <ul style="list-style-type: none"> ⊕ Hypertension <p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Diabetes* ▲ Obesity* ▲ Thyroid and parathyroid tumors* ▲ Thyroid nodules* 	<p>Miscellaneous</p> <ul style="list-style-type: none"> ⊗ Glaucoma ⊗ Hypersplenism <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Back and neck pain ● Bone cancer ● Osteoarthritis ● Osteoid osteoma ● Sacroiliitis* 	<p>Neurological</p> <ul style="list-style-type: none"> ■ Brain tumors* ■ Cancer pain ■ Depression ■ Epilepsy* ■ Essential tremor ■ Neuropathic pain* ■ Obsessive-compulsive disorder ■ Parkinson's disease ■ Stroke ■ Trigeminal neuralgia* 	<p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Colon cancer ★ Esophageal cancer* ★ Liver tumors ★ Pancreatic tumors ★ Pediatric oncology* ★ Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia ◆ Kidney stones ◆ Kidney tumors ◆ Prostate cancer <p>Women's Health</p> <ul style="list-style-type: none"> ✿ Breast cancer ✿ Breast fibroadenoma ✿ Uterine adenomyosis ✿ Uterine fibroids <p>* Not in this region</p>
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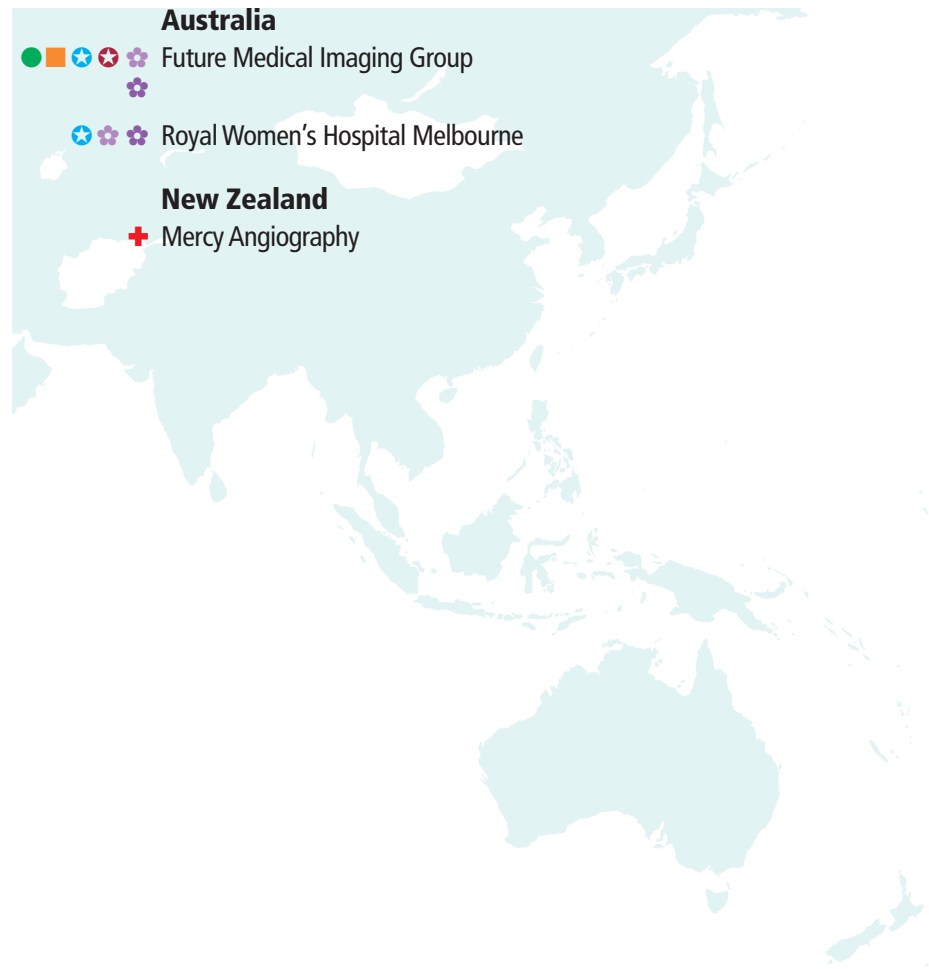
Any FUS research site treating patients as part of a clinical study.

Clinical

Clinical Research Sites by Region

3

Oceania



- | | | | | |
|--|--|---|--|---|
| <p>Cardiovascular</p> <ul style="list-style-type: none"> ⊕ Hypertension <p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Diabetes* ▲ Obesity* ▲ Thyroid and parathyroid tumors* ▲ Thyroid nodules* | <p>Miscellaneous</p> <ul style="list-style-type: none"> ✕ Glaucoma* ✕ Hypersplenism* <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Back and neck pain* ● Bone cancer* ● Osteoarthritis ● Osteoid osteoma* ● Sacroiliitis* | <p>Neurological</p> <ul style="list-style-type: none"> ■ Brain tumors* ■ Cancer pain ■ Depression* ■ Epilepsy* ■ Essential tremor* ■ Neuropathic pain* ■ Obsessive-compulsive disorder* ■ Parkinson's disease* ■ Stroke* ■ Trigeminal neuralgia* | <p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Colon cancer* ★ Esophageal cancer* ★ Liver tumors* ★ Pancreatic tumors* ★ Pediatric oncology* ★ Soft tissue tumors | <p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia* ◆ Kidney stones* ◆ Kidney tumors* ◆ Prostate cancer* <p>Women's Health</p> <ul style="list-style-type: none"> ✿ Breast cancer* ✿ Breast fibroadenoma* ✿ Uterine adenomyosis ✿ Uterine fibroids <p>* Not in this region</p> |
|--|--|---|--|---|

Any FUS research site treating patients as part of a clinical study.

Commercial Treatment

Commercial Treatment Sites by Indications and Regions

North America

- ◆ 18 Benign prostatic hyperplasia
- ★ 6 Bone metastases
- ✿ 1 Breast cancer
- ◆ 1 Kidney tumors
- ★ 1 Liver tumors
- 2 Osteoid osteoma
- ◆ 29 Prostate cancer
- ★ 1 Soft tissue tumors
- ✿ 15 Uterine fibroids

Europe

- ◆ 5 Benign prostatic hyperplasia
- ★ 15 Bone metastases
- ✿ 13 Breast cancer
- ✿ 15 Breast fibroadenoma
- 4 Essential tremor
- ✕ 15 Glaucoma
- ◆ 12 Kidney tumors
- ★ 12 Liver tumors
- 2 Neuropathic pain
- 12 Osteoid osteoma
- ★ 1 Pancreatic tumors
- 4 Parkinson's tremor
- ◆ 160 Prostate cancer
- ★ 12 Soft tissue tumors
- ▲ 11 Thyroid nodules
- 1 Trigeminal neuralgia
- ✿ 1 Uterine adenomyosis
- ✿ 46 Uterine fibroids

Asia

- ◆ 28 Benign prostatic hyperplasia
- ★ 3 Bone metastases
- ✿ 90 Breast cancer
- ✿ 2 Breast fibroadenoma
- 1 Depression
- 1 Essential tremor
- ◆ 89 Kidney tumors
- ★ 90 Liver tumors
- 1 OCD
- 89 Osteoid osteoma
- ★ 2 Pancreatic tumors
- 1 Parkinson's tremor
- ◆ 29 Prostate cancer
- ★ 91 Soft tissue tumors
- ▲ 3 Thyroid nodules
- ✿ 1 Uterine adenomyosis
- ✿ 122 Uterine fibroids

South America

- ◆ 1 Benign prostatic hyperplasia
- ◆ 8 Prostate cancer
- ✿ 1 Uterine fibroids

Africa

- ✿ 1 Breast fibroadenoma
- ◆ 1 Prostate cancer
- ▲ 1 Thyroid nodules

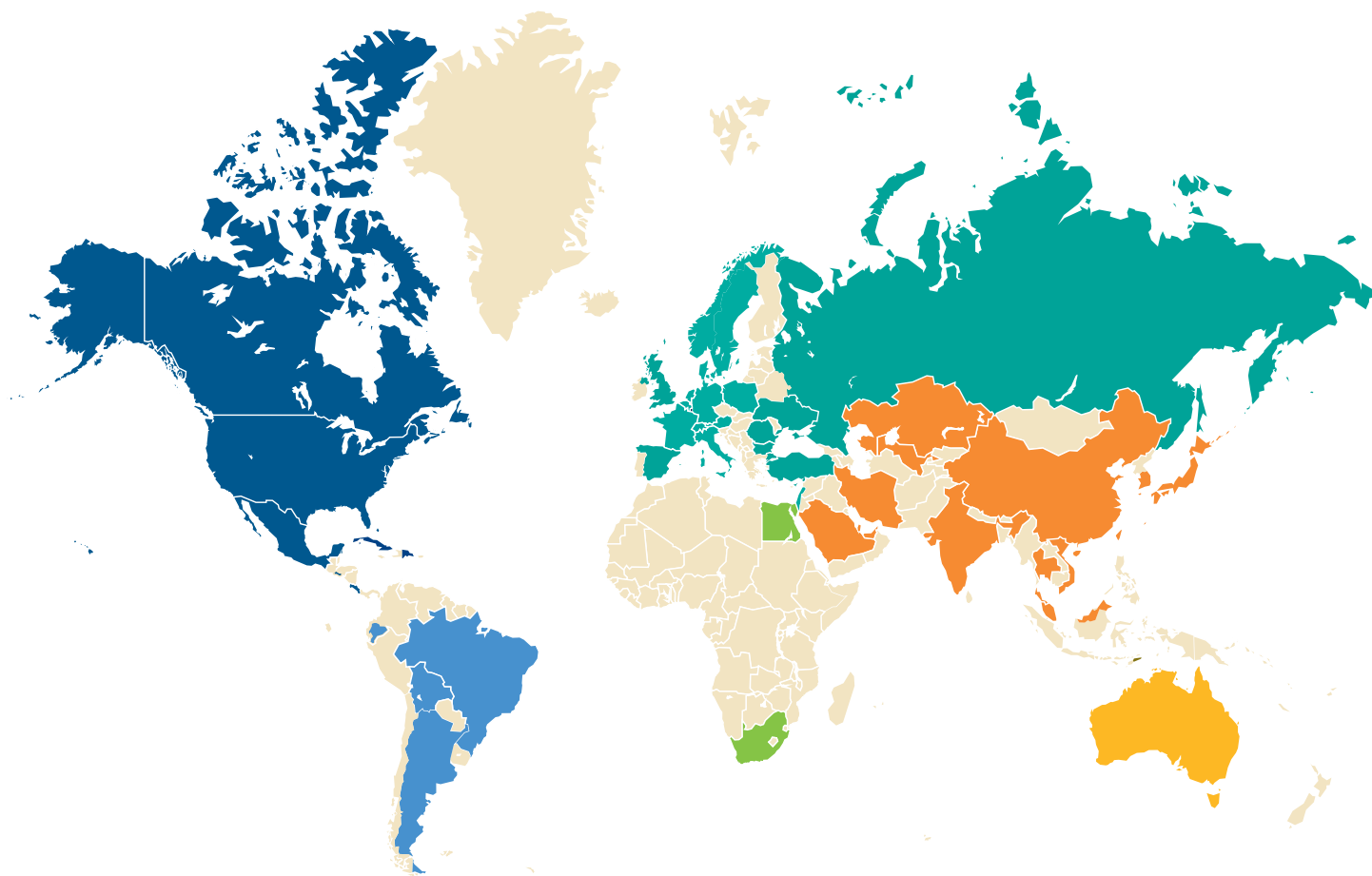
Oceania

- ✿ 2 Uterine fibroids

Any site with a focused ultrasound system and regulatory approval from the respective country and currently providing treatments.

Commercial Treatment

Commercial Treatment Sites by Country



Any site with a focused ultrasound system and regulatory approval from the respective country and currently providing treatments.

North America

- 1 Bahamas
- 9 Canada
- 1 Costa Rica
- 1 Cuba
- 1 Dominican Republic
- 1 Grand Cayman
- 4 Mexico
- 1 Trinidad and Tobago
- 27 United States

South America

- 1 Argentina
- 1 Bolivia
- 4 Brazil
- 3 Ecuador

Europe

- 5 Austria
- 2 Belgium
- 1 Bulgaria
- 1 Denmark
- 50 France
- 54 Germany
- 4 Israel
- 34 Italy
- 1 Monaco
- 4 The Netherlands
- 1 Norway
- 3 Poland
- 2 Romania
- 28 Russia

- 8 Spain
- 2 Sweden
- 12 Switzerland
- 1 Turkey
- 1 Ukraine
- 26 United Kingdom

Asia

- 83 China
- 7 India
- 1 Iran
- 36 Japan
- 1 Kazakhstan
- 2 Kingdom of Saudi Arabia
- 1 Lebanon

- 1 Malaysia
- 1 Qatar
- 15 Republic of Korea
- 1 Singapore
- 17 Taiwan
- 2 Thailand
- 1 United Arab Emirates
- 1 Uzbekistan
- 2 Vietnam

Oceania

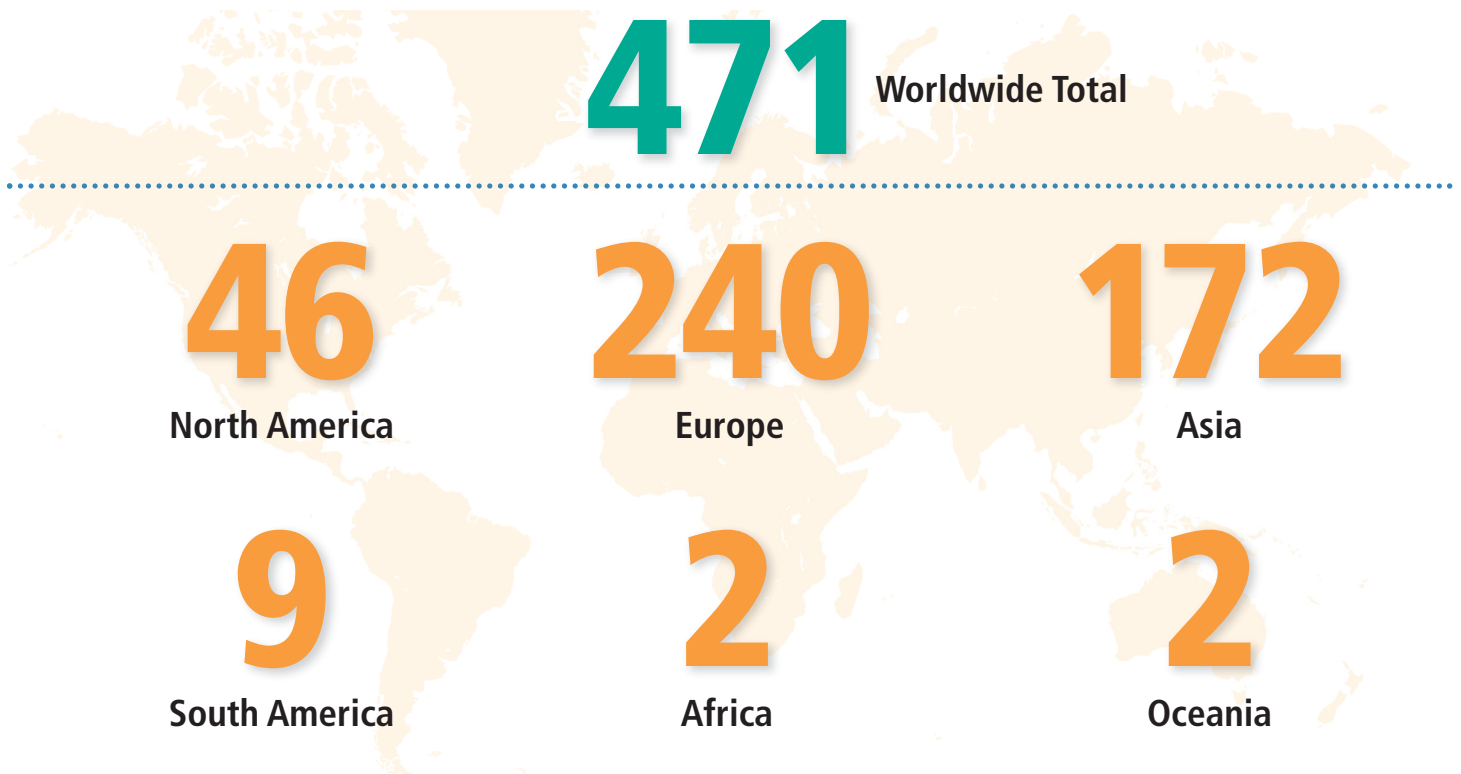
- 2 Australia

Africa

- 1 Egypt
- 1 South Africa

Commercial Treatment

Commercial Treatment Sites by Region



Any site with a focused ultrasound system and regulatory approval from the respective country and currently providing treatments.

Commercial Treatment

Commercial Treatment Sites by Region

46

North America



Endocrine Disorders	Neurological	Oncological	Urological	Women's Health
▲ Thyroid nodules*	■ Depression*	◆ Bone metastases	◆ Benign prostatic hyperplasia	◆ Breast cancer
■ Musculoskeletal	■ Essential tremor*	◆ Liver tumors	◆ Kidney tumors	◆ Breast fibroadenoma*
● Osteoid osteoma	■ Neuropathic pain*	◆ Pancreatic tumors*	◆ Prostate cancer	◆ Uterine adenomyosis*
■ Miscellaneous	■ OCD*	◆ Soft tissue tumors		◆ Uterine fibroids
✕ Glaucoma*	■ Parkinson's disease*			
	■ Trigeminal neuralgia*			

* Not in this region

Any site with a focused ultrasound system and regulatory approval from the respective country and currently providing treatments.

Commercial Treatment

Commercial Treatment Sites by Region

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South America



Argentina

- ◆ Centro de Urologia

Bolivia

- ◆ Centro de urología avanzada de la Clínica Incor

Brazil

- ◆ Centro de Prostata San Paulo
- ◆ Hospital AC Camargo de São Paulo
- ◆ Hospital Nossa Senhora das Gracias
- ✿ Instituto do Cancer do Estado de Sao Paulo (ICESP)

Ecuador

- ◆ Hospital Carlos Andrade Marín
- ◆ Hospital IESS
- ◆ Hospital Policia Nacional Guayaqui

Endocrine Disorders

- ▲ Thyroid nodules*

Musculoskeletal

- Osteoid osteoma*

Miscellaneous

- ✕ Glaucoma*

Neurological

- Depression*
- Essential tremor*
- Neuropathic pain*
- OCD*
- Parkinson's disease*
- Trigeminal neuralgia*

Oncological

- ★ Bone metastases*
- ★ Liver tumors*
- ★ Pancreatic tumors*
- ★ Soft tissue tumors*

Urological

- ◆ Benign prostatic hyperplasia
- ◆ Kidney tumors*
- ◆ Prostate cancer

Women's Health

- ✿ Breast cancer*
- ✿ Breast fibroadenoma*
- ✿ Uterine adenomyosis*
- ✿ Uterine fibroids

* Not in this region

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Commercial Treatment

Commercial Treatment Sites by Region

240
Europe



<p>Endocrine Disorders</p> <ul style="list-style-type: none"> ▲ Thyroid nodules <p>Musculoskeletal</p> <ul style="list-style-type: none"> ● Osteoid osteoma <p>Miscellaneous</p> <ul style="list-style-type: none"> ✕ Glaucoma 	<p>Neurological</p> <ul style="list-style-type: none"> ■ Depression* ■ Essential tremor ■ Neuropathic pain ■ OCD* ■ Parkinson's disease ■ Trigeminal neuralgia 	<p>Oncological</p> <ul style="list-style-type: none"> ★ Bone metastases ★ Liver tumors ★ Pancreatic tumors ★ Soft tissue tumors 	<p>Urological</p> <ul style="list-style-type: none"> ◆ Benign prostatic hyperplasia ◆ Kidney tumors ◆ Prostate cancer 	<p>Women's Health</p> <ul style="list-style-type: none"> ✿ Breast cancer ✿ Breast fibroadenoma ✿ Uterine adenomyosis ✿ Uterine fibroids
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Commercial Treatment

Commercial Treatment Sites by Region



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Commercial Treatment

Commercial Treatment Sites by Region

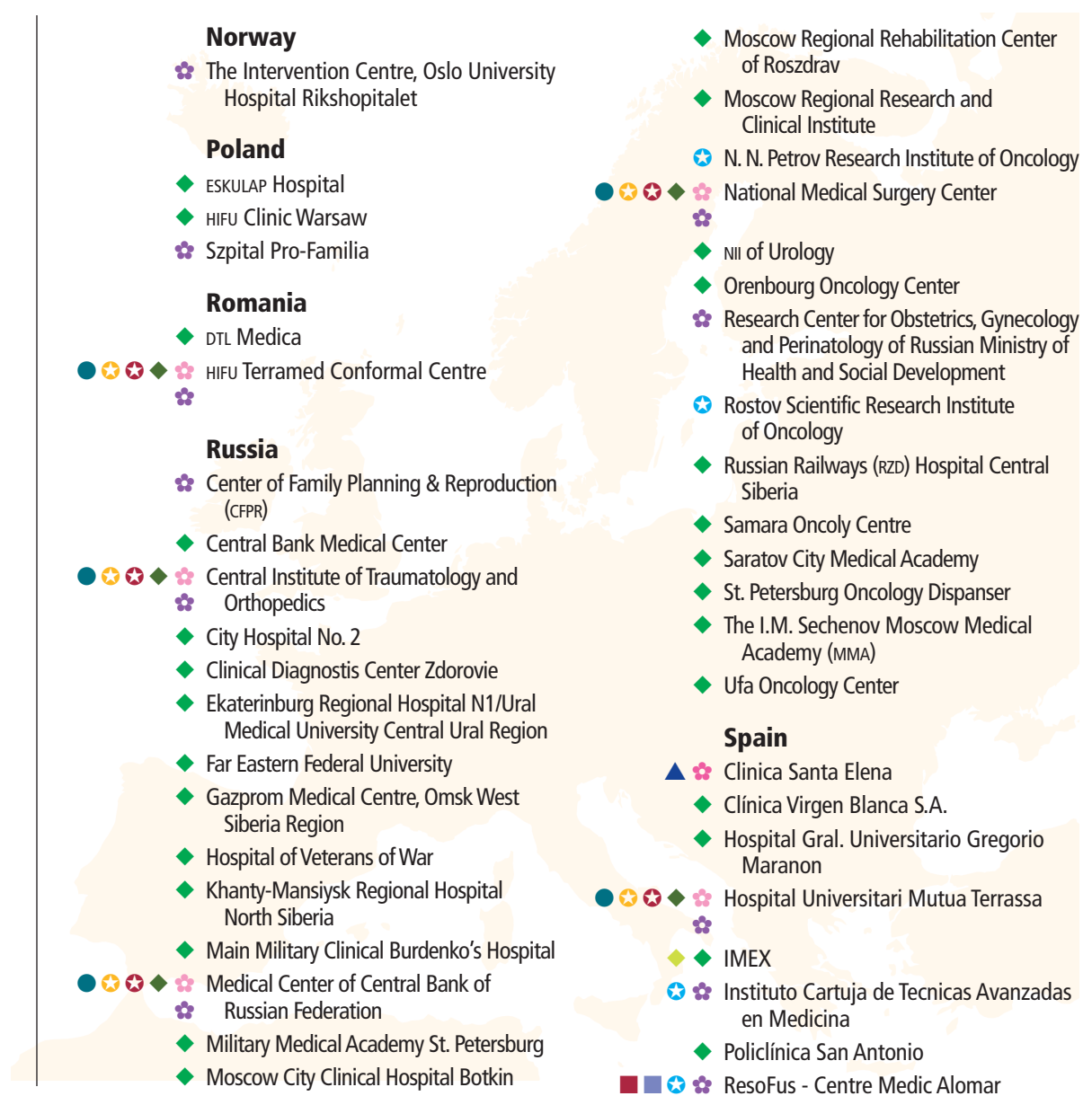


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Commercial Treatment

Commercial Treatment Sites by Region

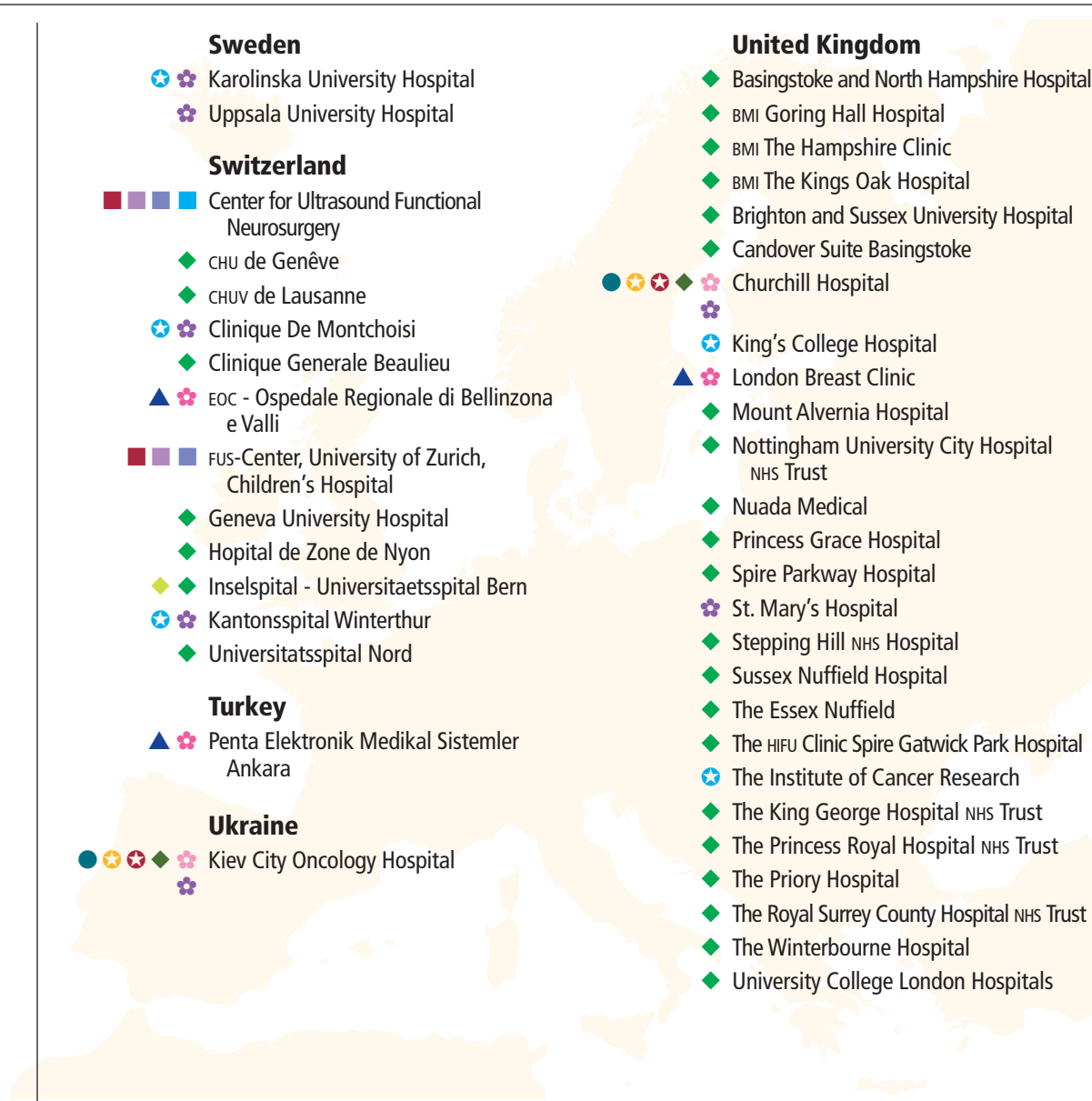


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● Osteoid osteoma	■ Neuropathic pain	★ Pancreatic tumors	◆ Prostate cancer	✿ Uterine adenomyosis
Miscellaneous	■ OCD*	★ Soft tissue tumors		✿ Uterine fibroids
✕ Glaucoma	■ Parkinson's disease			
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Commercial Treatment

Commercial Treatment Sites by Region



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✕ Glaucoma	■ Parkinson's disease			
	■ Trigeminal neuralgia			

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Commercial Treatment

Commercial Treatment Sites by Region

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Asia

China

●★◆◇✿✿ Commercial treatment centers for six indications

307 Hospital of PLA
 Affiliated Hospital of Armed Police's Medical College
 Affiliated Hospital of Chuanbei Medical College
 Affiliated Hospital of Qinghai Medical College
 Affiliated Hospital of Xinxiang Medical College
 Baoji Maternal and Child Health Hospital
 Beijing Cancer Hospital
 Beijing Hospital
 Chengdu Shuangnan Hospital
 Children's Hospital of Chongqing Medical University
 Chongqing Three Gorges Central Hospital
 City Hospital of Bincheng District in Binzhou City
 Dalian Friendship Hospital
 Daxian People's Hospital
 Dengfeng People's Hospital
 Fifth People's Hospital of Nanchong City
 First Affiliated Hospital of Guangxi Medical University
 First Affiliated Hospital of Kunming Medical University
 First Affiliated Hospital of Zunyi Medical College
 First Maternal and Child Health Hospital of Shanghai
 Fujian Provincial Hospital
 Fuling Center Hospital of Chongqing
 Fundan University Shanghai Cancer Center
 Guangzhou First Municipal People's Hospital
 Guantao People's Hospital of Hebei
 HAIFU Hospital
 Haifu Hospital of Tangshan Transportation Group Co. Ltd
 Haikou Municipal Hospital

Huabei Oil Field General Hospital Group
 Huainan Eastern Hospital
 Huanggang Center Hospital
 Hubei Maternal and Child Health Hospital
 Institute of Ultrasonic Engineering in Medicine and Clinical Centre for Tumour Therapy
 Jiangmen Wuyi Traditional Chinese Medicine Hospital
 Jiangsu Armed Police Corps Hospital
 Jiangsu Cancer Hospital
 Jilin Center Hospital
 Jiugang Hospital
 Jiujiang Maternal and Child Health Hospital
 Jixi People's Hospital
 Kaixian People's Hospital
 Lianyungang Orient Hospital
 Liaoning Fushun Cancer Hospital
 Luoyang Center Hospital
 Maternal and Child Health Hospital of Yubei District
 Nanshi Hospital
 No. 91 Central Hospital of the Liberation Army
 Nong Ken Hospital
 Obstetric Hospital of Changchun
 People's Hospital of Hunan Province
 People's Hospital of Nanchuan District
 People's Hospital of Xingtai
 PLA 301 Hospital (General Hospital of the People's Liberation Army)
 Shaanxi Maternal and Child Health Hospital
 Shandong Cancer Hospital
 Shandong Guangrao Traditional Chinese Medicine Hospital
 Shandong Qianfoshan Hospital
 Shanxi Traditional Chinese Medicine Hospital

Endocrine Disorders

▲ Thyroid nodules

Musculoskeletal

● Osteoid osteoma

Miscellaneous

✕ Glaucoma*

Neurological

■ Depression
 ■ Essential tremor
 ■ Neuropathic pain*
 ■ OCD
 ■ Parkinson's disease
 ■ Trigeminal neuralgia*

Oncological

★ Bone metastases
 ★ Liver tumors
 ★ Pancreatic tumors
 ★ Soft tissue tumors

Urological

◆ Benign prostatic hyperplasia
 ◆ Kidney tumors
 ◆ Prostate cancer

Women's Health

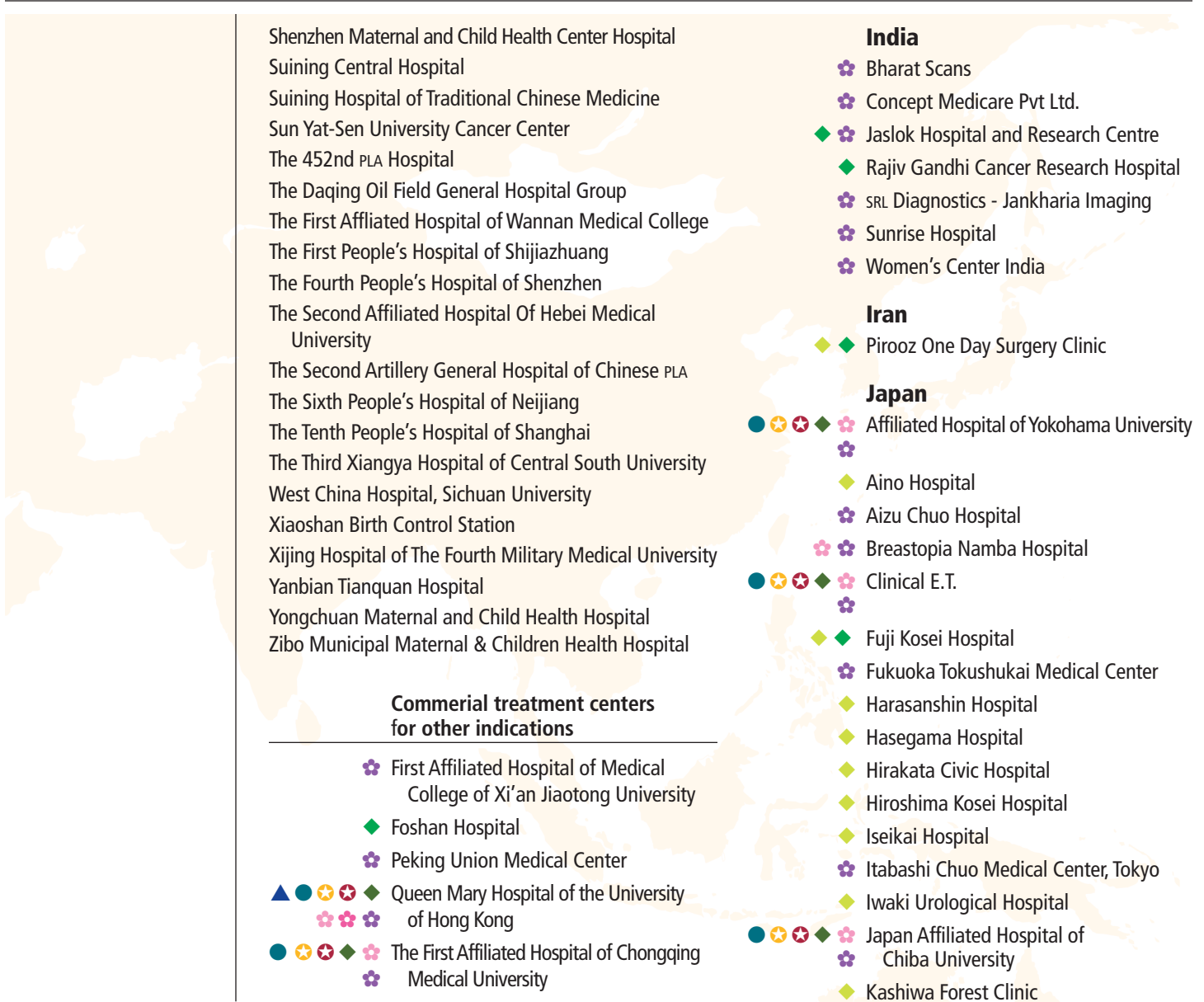
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Commercial Treatment

Commercial Treatment Sites by Region



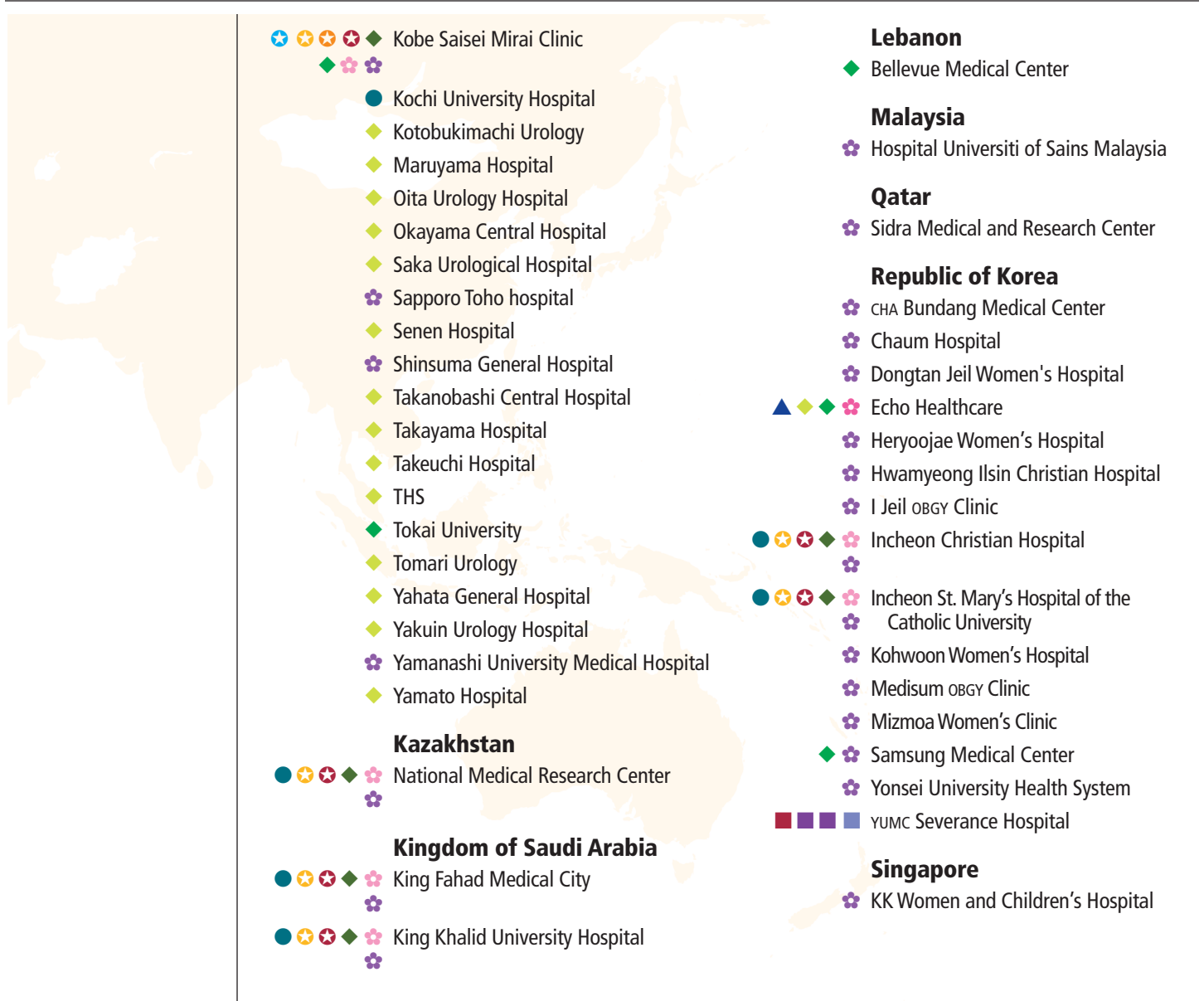
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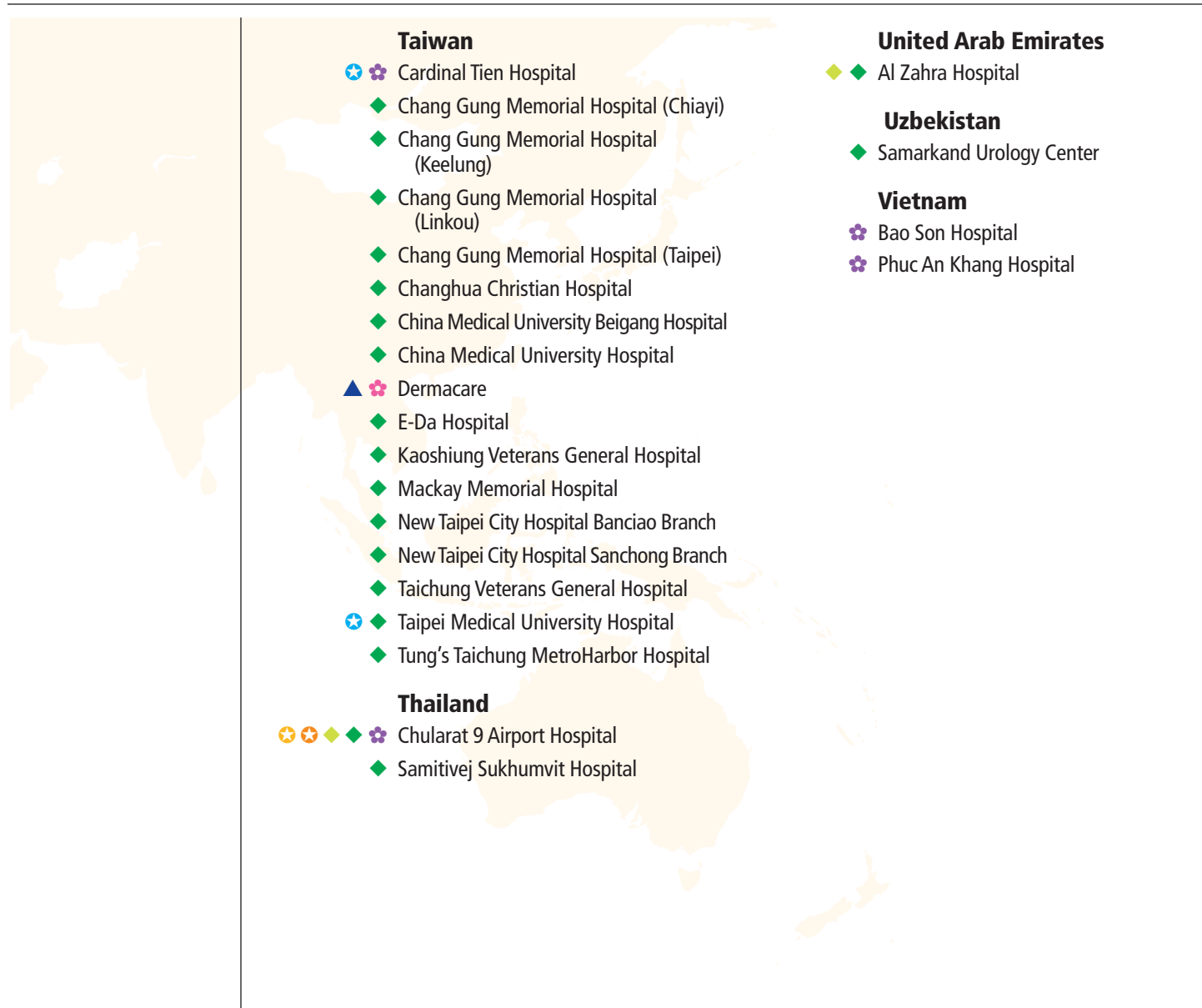


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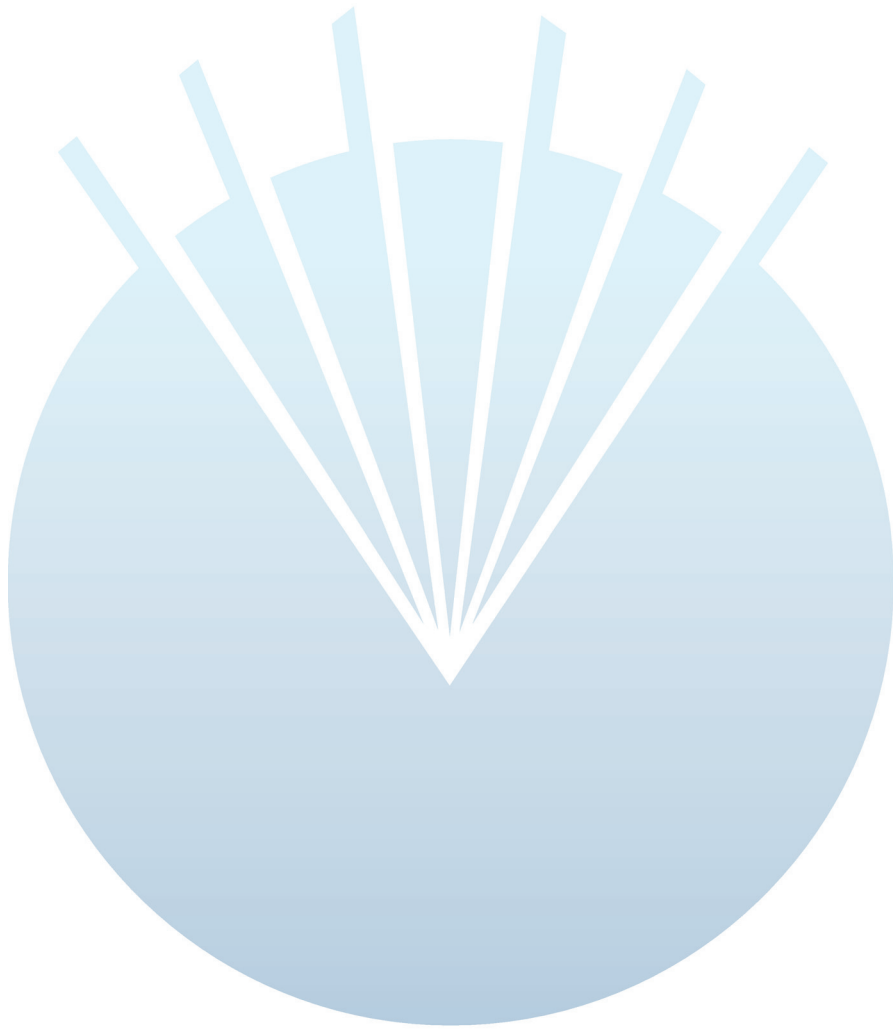
Commercial Treatment

Commercial Treatment Sites by Region



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FOCUSED
ULTRASOUND
FOUNDATION

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engagement@fusfoundation.org EMAIL

The information in this report was provided by manufacturers and the focused ultrasound research community to the Focused Ultrasound Foundation.

The FUS Foundation aims to provide the most accurate information; if you have more current or updated information please send it to: engagement@fusfoundation.org.