



Research Grant Awards  
2016-2017

# SCIENCE NOT FICTION.

**FIGHT  
FOR EVERY  
HEARTBEAT**

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# Introduction

## **In the year April 2016 to March 2017 the British Heart Foundation (BHF) awarded grants totalling £107.5 million\* for research into the causes, prevention, diagnosis and treatment of diseases of the heart and circulation.**

The BHF has 5 research grant committees which meet up to 4 times a year. The members of each committee are experts in various aspects of basic and clinical cardiovascular research. Applications are sent to independent reviewers before being assessed by the committee. Judgements are made on factors such as scientific merit, relevance to cardiovascular disease, timelines, relationship to other work in the field and value for money. Approximately one-third of applications are successful.

In 2016-2017 the Chairs and Programme Grants Committee awarded £59.7 million to Personal Chairs, Programme Grants, Infrastructure Grants and other major projects including Translational Awards until November 2016.

There were 30 chairholders (also referred to as BHF Professors) in post on 31 March and 2 that had been awarded but not yet commenced. Each chairholder is site-visited every 5 years to assess past research performance, future plans and proposed expenditure. The visiting team includes internationally renowned scientists.

The Translational Award scheme, launched in October 2014, supports the development of cardiovascular research through early pre-clinical milestones, with the aim of advancing the research to be attractive for larger follow-on investment. Awards were made by the Chairs and Programme Grants Committee until November 2016 when the Translational Awards Committee held its first meeting and awarded £0.5 million to 2 applications.

The Fellowships Committee awarded £27.1 million to 82 applications, and the Project Grants Committee awarded £20.6 million to 88 applications.

The pages that follow list BHF chairholders in post and awarded during the year and new awards made for Fellowships, Programme Grants, Project Grants and other awards.

Full details of all types of award offered by the BHF and the application process appear on the BHF website [bhf.org.uk/research](http://bhf.org.uk/research)

All of the figures above include supplements made to new and existing grants.

\*This figure includes only the expected payments to the next milestone for grants which are conditional upon the successful achievement of project milestones.

# BHF chairholders

Listed by town

## University of Birmingham

### The Chair of Cardiovascular Sciences and Cellular Pharmacology

Held by: **Professor S P Watson**  
BSc PhD FMedSci

*Major interest:* Cellular and molecular biology of blood platelets in haemostasis and thrombosis.

## University of Bristol

### The Chair of Cardiac Surgery

Held by: **Professor G D Angelini**  
MD MCh FRCS FETCS FMedSci

*Major interests:* Coronary artery bypass surgery, including off-pump techniques and methods to reduce restenosis; improving surgery for heart defects in infants.

## University of Bristol

### The Chair of Congenital Heart Surgery

Held by: **Professor M Caputo** MD MCh FRCS  
from 1 October 2017

*Major interests:* Cardiac surgical research, particularly in congenital heart disease.

## University of Bristol

### The Chair of Cardiovascular Science

Held by: **Professor C Emanuelli** BSc PhD

*Major interest:* Growth and repair of adult blood vessels: roles of stem cells and angiogenic factors.

## University of Bristol

### The Chair of Vascular Cell Biology

Held by: **Professor A C Newby** MA PhD  
to 30 September 2016

*Major interest:* Cellular and molecular biology of atherosclerosis and restenosis.

## University of Cambridge

### The Chair of Cardiovascular Sciences

Held by: **Professor M R Bennett** BSc MBChB  
PhD MA FRCP FAHA FMedSci

*Major interest:* Molecular mechanisms controlling smooth muscle cell proliferation, ageing and death in atherosclerosis.

## University of Cambridge

### The Chair of Epidemiology and Medicine

Held by: **Professor J N Danesh** MBChB MSc  
DPhil FMedSci

*Major interests:* Cardiovascular epidemiology; large-scale studies of genetic and biochemical factors.

## University of Cambridge

### The Chair of Cardiovascular Medicine

Held by: **Professor Z Mallat** MD PhD

*Major interest:* Cellular and molecular control of immune processes in atherosclerosis and vascular inflammation.

## University of Cambridge

### The Chair of Cardiopulmonary Medicine

Held by: **Professor N W Morrell** MBBS BSc  
MA MD FRCP FMedSci

*Major interest:* Molecular and genetic mechanisms of pulmonary arterial hypertension.

## University of Edinburgh

### The Chair of Translational Cardiovascular Sciences

Held by: **Professor A H Baker** BSc PhD FMedSci

*Major interest:* Gene- and cell-based therapies to combat vascular disease.

## University of Edinburgh

### The Chair of Cardiology

Held by: **Professor D E Newby** BA BSc PhD  
BM DM DSc FRSE FESC FACC FMedSci

*Major interest:* Experimental cardiovascular medicine, including studies of air pollution as a risk factor for cardiovascular disease.

## University of Glasgow

### The Chair of Cardiovascular Medicine

Held by: **Professor R M Touyz** BSc MBChB  
MSc PhD FMedSci

*Major interest:* Vascular mechanisms of hypertension, particularly the role of reactive oxygen species.

### **University of Leeds**

#### **The Chair of Cardiovascular and Diabetes Research**

Held by: **Professor M T Kearney** MB ChB FRCP DM

*Major interest:* Mechanisms by which insulin resistance and diabetes exacerbate atherosclerosis.

### **University of Leeds**

#### **The Chair of Cardiovascular Imaging**

Held by: **Professor S Plein** MRCP MD PhD

*Major interest:* Innovative cardiac magnetic resonance imaging for patient diagnosis and assessment.

### **University of Leicester**

#### **The Chair of Cardiac Surgery**

Held by: **Professor G J Murphy** BSc MBChB MD FRCS

*Major interest:* Strategies to reduce distal organ injury occurring during cardiac surgery.

### **University of Leicester**

#### **The Chair of Cardiology**

Held by: **Professor Sir Nilesh J Samani** DL MD FRCP FACC FMedSci to 31 July 2016

*Major interests:* Genetics of hypertension and coronary heart disease; cell ageing mechanisms and premature cardiovascular disease.

### **Imperial College London**

#### **The Sir John McMichael Chair of Cardiovascular Medicine**

Held by: **Professor D O Haskard** DM FRCP FMedSci to 30 September 2016

*Major interests:* Cellular and molecular control of inflammatory and immune processes in atherosclerosis.

### **Imperial College London**

#### **The Simon Marks Chair of Regenerative Cardiology**

Held by: **Professor M D Schneider** MD FMedSci

*Major interests:* Molecular control of cardiac myocyte growth and death; strategies for regenerative cardiac medicine.

### **King's College London**

#### **The Chair of Molecular Cardiology**

Held by: **Professor M Gautel** MD PhD FMedSci

*Major interest:* Cellular and molecular biology of the contractile proteins in heart muscle.

### **King's College London**

#### **The Chair of Cardiology**

Held by: **Professor K Otsu** MD PhD FAHA FMedSci

*Major interest:* Inflammatory mechanisms in heart failure.

### **King's College London**

#### **The Chair of Cardiology**

Held by: **Professor A M Shah** MD FRCP FESC FMedSci

*Major interest:* Cellular and molecular biology of production of reactive oxygen species in the cardiovascular system and their roles in atherosclerosis, cardiac hypertrophy and heart failure.

### **King's College London**

#### **The John Parker Chair of Cardiovascular Sciences**

Held by: **Professor Q Xu** MBBS MD PhD

*Major interest:* Cellular and molecular biology of stem cells and their importance in modulating atherosclerosis and restenosis.

### **King's College London**

#### **The Chair of Cardiovascular Proteomics**

Held by: **Professor M Mayr** MD PhD from 1 May 2017

*Major interest:* Novel methods to detect and measure biomarkers of cardiovascular risk.

### **Queen Mary, University of London**

#### **The Chair of Cardiovascular Immunology**

Held by: **Professor F M Marelli-Berg** MD PhD

*Major interest:* Control of T lymphocyte homing to the heart in rejection, autoimmunity and inflammation.

**University College London**  
**The Vandervell Chair of**  
**Congenital Heart Disease**

Held by: **Professor J E Deanfield** BA BChir  
MB FRCP FMedSci

*Major interest:* Evaluating the risk factors for atherosclerosis and quantifying the progression of vascular disease in children and young adults.

**University College London**  
**The Chair of Psychology**

Held by: **Professor A P A Steptoe** MA DPhil  
DSc FBPSS AcSS FMedSci to 30 September 2016

*Major interest:* Psychological stress and cardiovascular disease.

**University of Manchester**  
**The Chair of Cardiac Physiology**

Held by: **Professor D A Eisner** MA DPhil FMedSci

*Major interest:* Cellular and molecular physiology of the role of calcium in control of heart rhythm.

**University of Manchester**  
**The Chair of Cardiology**

Held by: **Professor B D Keavney** BSc BM BCh  
MRCP DM FRCP

*Major interest:* Genetics of heart disease.

**University of Oxford**  
**The Chair of Cardiovascular Medicine**

Held by: **Professor S Bhattacharya** MBBS  
MD MRCP MSc FESC FMedSci

*Major interests:* Developmental biology of the heart; cardiovascular drug target discovery.

**University of Oxford**  
**The Chair of Cardiovascular Medicine**

Held by: **Professor B Casadei** MD DPhil  
FRCP FESC FMedSci

*Major interest:* Redox signalling in cardiovascular disease, particularly atrial fibrillation.

**University of Oxford**  
**The Field Marshal Earl Alexander**  
**Chair of Cardiovascular Medicine**

Held by: **Professor K M Channon** MD FRCP  
FMedSci

*Major interests:* Redox signalling in atherosclerosis; using genetics and genomics to discover novel molecular pathways in atherosclerosis.

**University of Oxford**  
**The Chair of Medicine and Epidemiology**

Held by: **Professor Sir Rory Collins** MSc MBBS  
LMSSA FRCP FMedSci FRS

*Major interests:* Meta-analysis and large-scale trials in cardiovascular disease; large-scale epidemiological studies of risk factors and biomarkers.

**University of Oxford**  
**The Chair of Regenerative Medicine**

Held by: **Professor P R Riley** BSc PhD FMedSci

*Major interests:* Developmental biology of the heart and its applications to cardiac regenerative medicine.

**University of Oxford**  
**The Chair of Cardiovascular Medicine**

Held by: **Professor H C Watkins** MD PhD  
FRCP FMedSci FRS

*Major interests:* Genetics and underlying molecular mechanisms in hypertrophic cardiomyopathy; genetics of coronary artery disease.

**University of Southampton**  
**The Chair of Cardiovascular Science**

Held by: **Professor M A Hanson** MA DPhil  
CertEd FRCOG

*Major interest:* Molecular mechanisms for developmental and neonatal origins of adult cardiovascular disease.

**University of Swansea**  
**The Sir Thomas Lewis Chair of**  
**Cardiovascular Science**

Held by: **Professor A J Williams** BA PhD  
(Moved from Cardiff University 1 January 2017)

*Major interests:* Molecular biology of calcium flux through the ryanodine receptor in cardiac myocytes and its disturbance in arrhythmia.

# Awards made during the year

## 1 April 2016 – 31 March 2017

### Personal Chairs

Reference number	Name	Institution	Grant title	Total
CH/16/3/32406	<b>Prof M Mayr</b> MD PhD	King's College London	The BHF Chair of Cardiovascular Proteomics. 5 years	£838,445
CH/17/1/32804	<b>Prof M Caputo</b> MD MCh FRCS	University of Bristol	The BHF Chair of Congenital Heart Surgery. 5 years	£972,897
CH/16/2/32089	<b>Prof S Plein</b> MRCP MD PhD	University of Leeds	The BHF Chair of Cardiovascular Imaging. 5 years	£1,027,392

### Fellowships

Listed alphabetically by Institute

#### Non-clinical Fellowships

##### Intermediate Basic Science Research Fellowships

Reference number	Name	Institution	Grant title	Total
FS/16/22/32045	<b>Dr C Raimondi</b> PhD	Imperial College London	Role of neuropilin-1 in controlling endothelial cell senescence and TGF-beta signalling in atherosclerosis and peripheral arterial disease. 4 years	£401,226
FS/17/3/32604	<b>Dr E Brunello</b> PhD	King's College London	Dual-filament regulation optimises the performance of heart muscle. 5 years	£674,641
FS/16/21/31860	<b>Dr S Eminaga</b> BSc MSc MPhil PhD	King's College London	The BHF / Clive Brooks Intermediate Basic Science Research Fellowship: Investigating the role of cardiac non-myocyte microRNAs in myocardial fibrosis and hypertrophy in hypertrophic cardiomyopathy. 4 years	£543,499
FS/16/35/31952	<b>Dr J Winter</b> BSc PhD	King's College London	Autonomic modulation of torsades de pointes in acquired long QT syndrome. 4 years	£469,298
FS/17/1/32528	<b>Dr S Nadkarni</b> BSc PhD	Queen Mary University of London	Neutrophil-induced pro-angiogenic T-cells: differentiation, function and therapeutic potential in cardiovascular diseases. 5 years	£625,729
FS/16/36/32205	<b>Dr N Halbesma</b> PhD	University of Edinburgh	Cardiovascular risk and risk prediction for all stages of chronic kidney disease: a British-Dutch collaboration. 5 years	£261,938
FS/17/2/32559	<b>Dr J Shi</b> BSc PhD	University of Leeds	Regulation and cross-talk of Piezo1 channels in the endothelium. 5 years	£660,495
FS/17/22/32644	<b>Dr A Bueno Orovio</b> PhD	University of Oxford	<i>In-silico</i> investigation of structural and electrophysiological substrates for sudden cardiac death in human hypertrophic cardiomyopathy. 5 years	£542,521
FS/16/37/32347	<b>Dr E Noel</b> BSc PhD	University of Sheffield	Cytoskeleton remodelling at the heart of cardiac morphogenesis and disease. 5 years	£667,864



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**Immediate Postdoctoral Basic Science Research Fellowships**

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<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/17/23/32718	<b>Dr A Plein</b> PhD MA (Cantab) BA	University College London	Defining the role of erythro-myeloid progenitors in developmental and pathological angiogenesis. <i>4 years</i>	£304,473
FS/17/4/32436	<b>Dr K Wilson</b> PhD MSc MRes BSc	University of Glasgow	Investigating the role of IL-33/ST2 signalling in the cardiac and vascular remodelling associated with pulmonary arterial hypertension. <i>4 years</i>	£255,148

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**4-year PhD Studentships**

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<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/16/56/32732	<b>Prof S Harding</b> BSc PhD	Imperial College London	Imperial 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Lauren Boland; Mr Luke Cave; Ms Elisa Ferraro; Ms Oisín King. <i>4 years</i>	£638,824
FS/16/57/32733	<b>Prof M Mayr</b> MD PhD	King's College London	KCL 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Caraugh Albany; Ms Hiba Chaudhry; Ms Sarah Kendall; Ms Amy Pearce. <i>4 years</i>	£630,136
FS/16/60/32739	<b>Prof T Warner</b> BSc PhD	Queen Mary University of London	QMUL 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Nicola Joseph; Ms Anitha Nair; Mr Maurizio Parker; Ms Madeeha Sheikh. <i>4 years</i>	£619,788
FS/16/61/32740	<b>Prof P Scambler</b> BSc MBChB MD FRCPath	University College London	UCL 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Michelle Cheung; Ms Roshni Joshi; Mr Christopher Pope; Ms Rajuel Sarna. <i>4 years</i>	£635,084
FS/16/53/32729	<b>Prof M Bennett</b> BSc MBChB PhD MA FRCP FAHA FMedSci	University of Cambridge	Cambridge 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Mr Christian Doreth; Mr Ivelin Ivanov; Ms Noor Teulings; Ms Josca Schoonejans. <i>4 years</i>	£642,188
FS/16/54/32730	<b>Dr M Bailey</b> BSc PhD	University of Edinburgh	Edinburgh 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Mr David Craig; Mr Matthew Sinton; Ms Hannah Costello; Mr Emmanouil Solominidis. <i>4 years</i>	£587,208
FS/16/55/32731	<b>Prof R Touyz</b> BSc MBChB MSc PhD FMedSci	University of Glasgow	Glasgow 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Daria Boyd; Ms Eline Huethorst; Ms Anna Koester; Ms Lucy McShane. <i>4 years</i>	£578,148
FS/16/58/32734	<b>Dr E Cartwright</b> BSc MSc PhD	University of Manchester	Manchester 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Ms Stephanie Baross; Ms Shona Borland; Mr Luke Stuart; Ms Lauren Toms. <i>4 years</i>	£578,644
FS/16/59/32735	<b>Prof D Greaves</b> BSc PhD	University of Oxford	Oxford 4th intake 2016 – 4-year PhD Studentship (3rd) Scheme: Mr Richard (Snapper) Magor-Elliott; Ms Lisa Simpson; Mr Kyung Chan Park; Ms Abigail Wilson. <i>4 years</i>	£628,760

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**MBPhD Studentship**

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<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/16/52/32259	<b>Prof S Harding</b> BSc PhD	Imperial College London	MicroRNA modulation of $\beta$ 2-adrenoceptor signalling in Takotsubo Syndrome. 2 years	£90,271
FS/16/76/32409	<b>Prof C Terracciano</b> MD PhD	Imperial College London	Regulation of cardiac excitation-contraction coupling by human cardiac fibroblasts in health and disease. 3 years	£124,297

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**PhD Studentships**

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<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/16/63/32408	<b>Mr A Voisey</b> BSc MRes	Cardiff University	Pharmacokinetics of vascular responses to dietary amines and amphetamines via trace amine-associated receptors. 3 years	£106,861
FS/17/12/32703	<b>Ms U Luchowska</b> MPharm	Heriot Watt University, Edinburgh	Novel EPAC1 inhibitors to enhance insulin sensitivity in vascular endothelial cells. 3 years	£107,122
FS/17/10/32677	<b>Miss L Gruscheski</b> BSc	Imperial College London	Phosphorylation of the carboxterminal domain (CTD) as a modulatory input to regulate the function of the Popeye domain containing proteins. 3 years	£120,172
FS/16/40/32167	<b>Student to be appointed</b>	Imperial College London	Development of cardiac MRI for assessing right ventricular diffuse myocardial fibrosis in congenital heart disease. 3 years	£112,345
FS/16/67/32548	<b>Ms G Warpsinski</b> BSc	King's College London	Nrf2-regulated redox signalling in brain endothelial cells adapted to physiological O <sub>2</sub> levels: consequences for ischaemia-reperfusion injury and protection by sulforaphane. 3 years	£119,365
FS/16/26/32193	<b>Dr J Chang</b> MSc	University College London	Pinocytosis (fluid-phase transcytosis) and vascular leakage. 3 years	£117,282
FS/16/23/32071	<b>Ms E Lynam</b> BSc	University College London	ZONAB controls endothelial actin cytoskeleton and genes important for angiogenesis and inflammation. 3 years	£117,466
FS/16/69/32741	<b>Mr C Smith</b> BSc MSc	University College London	Joint BHF / CRUK Lynn MacFadyen PhD Studentship in Tobacco Control: E-cigarettes for harm reduction in people with mental illness. 3 years	£39,137
FS/16/41/32235	<b>Miss L Wisniewski</b> BSc MSc	University College London	Global imaging and spatiotemporal analysis of angiogenesis and cell signalling events in live adult zebrafish. 3 years	£115,516
FS/17/8/32664	<b>Ms V Yogendran</b> BSc MSc	University College London	Studying a novel regulator of collagen expression in VSMC and links to hypertension. 3 years	£123,820
FS/16/39/32174	<b>Ms N Godsman</b> BSc	University of Aberdeen	Early metabolic intervention in acute stress-induced (Takotsubo) cardiomyopathy. 3 years	£106,121

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**PhD Studentships (continued)**


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FS/16/25/32136	<b>Ms P Verschoor</b> BSc	University of Aberdeen	The regulation of phosphoprotein enriched in astrocytes-15 in vascular smooth muscle cells: a potential target in restenosis. 3 years	£107,259
FS/17/13/32699	<b>Mr R Harris</b>	University of Bath	Towards a novel anti-inflammatory, vasculo-protective agent: inhibition of P-selectin and disruption of platelet-leukocyte interaction by <i>Staphylococcus aureus</i> extracellular fibrinogen binding protein. 3 years	£107,709
FS/17/7/32651	<b>Miss L Cao</b> BMedSc MRes	University of Birmingham	Developing new, fluorescence-based techniques to study sympathetic nerve function within blood vessels and the heart. 3 years	£101,516
FS/16/68/32511	<b>Mr W Vecchiato</b>	University of Birmingham	Determining the role of Protocadherin 1 in angiogenesis. 3 years	£111,569
FS/16/64/32480	<b>Miss V Alvino</b>	University of Bristol	Derivation of swine pericytes to enable fit-for-purpose clinical translation. 3 years	£107,481
FS/16/66/32520	<b>Miss K Lewis</b> BSc	University of Bristol	Role of the mitochondrial kinase PINK1 in platelet procoagulant function and thrombosis. 3 years	£122,386
FS/16/27/32213	<b>Ms K Sledz</b> BSc MSc	University of Bristol	Sirolimus-mediated inhibition of procoagulant platelet activity: underlying mechanisms and repurposing drug potential. 3 years	£129,901
FS/17/5/32531	<b>Ms M Baldrighi</b> MSc	University of Cambridge	Development of a NLRP3 pathway inhibitor and investigation of its inhibitory mechanism in an experimental model of atherogenesis. 3 years	£117,623
FS/17/14/32773	<b>Student to be appointed</b>	University of Dundee	Palmitoylation and the regulation of the 'funny' current HCN4 channel. 3 years	£109,301
FS/17/15/32932	<b>Student to be appointed</b>	University of Edinburgh	Joint NC3Rs / BHF PhD Studentship: Investigation of key inflammatory cells and mediators in zebrafish larval tailfin and heart repair / regeneration following resolution of inflammation. 3 years	£90,000
FS/16/62/32220	<b>Miss M Kinnon</b>	University of Hull	ThrombiGlow: 'smart' multimodal platelet specific 'theranostic' drug delivery imaging agents. 3 years	£107,147
FS/16/44/32356	<b>Ms E Evans</b> BSc	University of Leeds	Exploring the function of mechanosensitive ion channel protein Piezo1 in cardiac myocytes. 3 years	£117,585
FS/16/24/32133	<b>Miss J Mitchell</b> BSc	University of Leeds	Targeting VEGFR1 and endothelial function using synthetic proteins called Adhiron. 3 years	£107,359
FS/16/42/32308	<b>Ms E Woodhouse</b>	University of Leeds	Carbon monoxide modulation of T-type calcium channels: a novel signalling pathway to exploit for the treatment of pulmonary hypertension. 3 years	£115,991

<b>PhD Studentships (continued)</b>				
FS/17/6/32616	<b>Miss H Thurgur</b> BSc	University of Manchester	The role of extracellular matrix laminin-10 in vascular inflammation, blood-brain barrier repair and angiogenesis after cerebrovascular disease. <i>3 years</i>	£112,002
FS/16/43/32343	<b>Mr J Lacombe</b> MSc DPhil	University of Oxford	Physical activity and coronary heart disease: a contemporary analysis of lifestyle risk factors in a large population-based cohort. <i>3 years</i>	£88,063
FS/16/65/32489	<b>Mr T Vallance</b>	University of Reading	Impact of Toll-like Receptor 4 (TLR4)-mediated signalling in the modulation of platelet activation, thrombosis and haemostasis. <i>3 years</i>	£107,299
FS/17/9/32676	<b>Student to be appointed</b>	University of St Andrews	Zinc unmasks a new player in ischaemic heart failure. <i>3 years</i>	£107,668
FS/17/11/32688	<b>Student to be appointed</b>	University of York	Structure and function of SesC and SesE: conserved biofilm-forming proteins of <i>Staphylococcus epidermidis</i> . <i>3 years</i>	£107,157

#### **Travel Fellowships**

<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/16/28/32327	<b>Dr M Quail</b> MBChB (Hons) MSc PhD MRCPCH	University College London	Joint Fulbright – BHF Scholar Award: Multi-level biomarkers in cardiovascular disease: a multimodality imaging study. <i>1 year</i>	£91,629
FS/16/71/32487	<b>Dr R Martin</b> BA BMBCh MRCP (UK) MD	University of Newcastle upon Tyne	Ultra-high-density mapping of ventricular tachycardia: an assessment of the Orion Catheter and Rhythmia mapping system. <i>1 year</i>	£62,871
FS/17/25/33025	<b>Dr A Thompson</b> BMedSci MBChB MRCP (UK) PhD	University of Sheffield	Joint Fulbright – BHF Scholar Award: Regulation of pulmonary vascular remodelling by endogenous double-stranded RNA. <i>1 year</i>	£78,100

#### **Career Re-entry Research Fellowship**

<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
FS/16/38/32351	<b>Dr T Mitic</b> PhD	University of Edinburgh	Epigenetics and lncRNA control of angiogenesis. <i>4 years</i>	£285,150

## Clinical Fellowships

### Senior Clinical Research Fellowships

Reference number	Name	Institution	Grant title	Total
FS/17/24/32596	<b>Mr B Modarai</b> BSc MBBS MRCS (Ed&Eng) PhD FRCS	King's College London	Enhancing the arteriogenic activity of monocyte / macrophages and assessing the functional significance of collaterals in the ischaemic limb. 5 years	£1,206,202

### Intermediate Clinical Research Fellowships

Reference number	Name	Institution	Grant title	Total
FS/17/16/32560	<b>Dr R Khamis</b> MBChB MRCP DIC PhD FESC	Imperial College London	The molecular imaging of oxidised LDL in atherosclerosis. 5 years	£1,008,853
FS/16/45/32359	<b>Dr C Christodoulides</b> BSc MBChB PhD MRCP	University of Oxford	Dissecting the role of Wnt signalling in the regulation of fat distribution and susceptibility to cardiometabolic disease. 4 years	£751,953
FS/16/70/32157	<b>Dr O Rider</b> BA BMBCh MRCP DPhil	University of Oxford	Comparing the effects of different bariatric surgeries on the cardiovascular system. 4 years	£789,056

### Clinical Research Training Fellowships

Reference number	Name	Institution	Grant title	Total
FS/17/21/32712	<b>Dr A Lota</b> BM BCh BA MRCP	Imperial College London	Diagnosis and risk stratification in acute myocarditis using cardiac MRI, novel biomarkers and next generation sequencing – a personalised approach. 2 years	£138,286
FS/16/50/32337	<b>Mr M Albayati</b> BSc MBBS MRCS	King's College London	Computational fluid dynamics for haemodynamic assessment of the vasculature in patients with limb ischaemia. 2 years	£131,445
FS/16/32/32184	<b>Dr A Joshi</b> BA (Hons) BMBCh	King's College London	Platelet heterogeneity in cardiovascular disease: a proteomic approach. 3 years	£237,450
FS/16/51/32365	<b>Dr H McConkey</b> MBBS MRCP MA	King's College London	Investigating the haemodynamic and physiological principles underlying paradoxical low-flow, low-gradient aortic stenosis versus normal-flow, high-gradient aortic stenosis. 3 years	£280,933
FS/16/49/32320	<b>Dr H Rahman</b> MA (Cantab) BMBCh (Oxon) MRCP (UK)	King's College London	Coronary and systemic vascular responses to exercise and vasodilators in patients with angina due to microvascular dysfunction. 3 years	£205,613
FS/16/30/32162	<b>Dr V Rathod</b> BSc MB BS MRCP	Queen Mary University of London	Adrenergic regulation of I <sub>Ks</sub> and impairment in the hereditary long QT syndrome. 3 years	£211,155
FS/16/46/32187	<b>Dr A Bhuvu</b> MA (Cantab) MSc MBBS MRCP	University College London	Assessment of physiological and pathological left ventricular remodelling using novel computational analysis of regional geometry. 3 years	£197,515

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**Clinical Research Training Fellowships (continued)**


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FS/16/72/32270	<b>Dr G Norrish</b> BM BCh BA MRCPCH	University College London	Childhood hypertrophic cardiomyopathy: developing a novel risk stratification model. <i>3 years</i>	£175,614
FS/16/31/32185	<b>Dr P Scully</b> MBBS MRes MRCP	University College London	The role of occult amyloid in the elderly with aortic stenosis. <i>3 years</i>	£233,914
FS/17/20/32738	<b>Dr P Nicolson</b> MA MB BChir (Cantab)	University of Birmingham	Selectively targeting the platelet CLEC-2 signalling pathway in venous thrombosis. <i>1 year, 8 months</i>	£105,931
FS/16/73/32314	<b>Dr A Price</b> MbChB BSc (Hons)	University of Birmingham	Effects of a reduction in renal function on cardiovascular structure and function: a five-year study of kidney donors. <i>3 years</i>	£220,817
FS/16/29/31957	<b>Mr M Chowdhury</b> MBChB MRes MSc MRCS	University of Cambridge	Investigation of inflammation and calcification in patients with lower limb peripheral arterial disease (PAD). <i>3 years</i>	£298,109
FS/16/75/32533	<b>Dr A Chapman</b> BMedSci MBChB MRCP	University of Edinburgh	Refining the diagnosis of type 2 myocardial infarction. <i>3 years</i>	£283,073
FS/17/19/32641	<b>Dr N Spath</b> BSc MB BS	University of Edinburgh	Manganese-enhanced magnetic resonance imaging of the myocardium. <i>3 years</i>	£210,408
FS/16/74/32573	<b>Dr A Maznyczka</b> MB ChB BSc MRCP	University of Glasgow	The T-TIME trial coronary physiology study. <i>3 years</i>	£263,332
FS/17/26/32744	<b>Dr N Sidik</b> BMedSci MBChB	University of Glasgow	The conundrum of angina in patients without obstructive coronary disease as revealed by CT coronary angiography (COR-CTCA): an observational cohort study involving coronary function tests and a nested randomised trial. <i>3 years</i>	£283,092
FS/16/47/32190	<b>Dr G Gulsin</b> BSc (Hons) MBChB (Hons)	University of Leicester	Prevalence and determinants of subclinical cardiovascular dysfunction in adults with type 2 diabetes mellitus. <i>3 years</i>	£275,156
FS/16/33/32196	<b>Miss C Bailey</b> MB ChB	University of Manchester	Not all cardiac ryanodine receptor mutations are the same: a study using human induced pluripotent stem cells to elucidate arrhythmic mechanism in the first described nonsense mutation of the cardiac ryanodine receptor resulting in a cardiac phenotype. <i>3 years</i>	£225,333
FS/17/18/32449	<b>Dr A Apps</b> BSc (Hons) BMBCh (Hons)	University of Oxford	Using <sup>13</sup> C imaging to investigate ischaemic heart disease in humans. <i>3 years</i>	£305,522

### Clinical Research Training Fellowships (continued)

FS/17/17/32438	<b>Dr P Gajendragadkar</b> MA MPhil MBBChir MRCP	University of Oxford	Understanding the role of NOS1AP on myocardial repolarisation: insights from NOS1-mediated regulation of action potential duration and potassium currents in mice and men. 3 years	£296,104
FS/16/34/32211	<b>Ms S Payne</b> BPhy MPH MFPH	University of Oxford	Dietary modification for hypertension: development and feasibility testing of a behavioural intervention to reduce salt intake. 3 years	£272,158
FS/16/48/32306	<b>Dr R Gosling</b> MBChB BSc MRCP	University of Sheffield	Virtual coronary intervention (vCI): instant one-stop <i>in silico</i> treatment planning. 3 years	£156,750

### Infrastructure Grants

Reference number	Name	Institution	Grant title	Total
IG/16/2/32273	<b>Prof M Conte</b> PhD	King's College London	Funding to support the purchase of 800MHz and 600MHz spectrometers and resources for automation in the Centre for Biomolecular Spectroscopy (Joint funding with Wellcome Trust). 1 year	£1,000,000
IG/17/1/32821	<b>Prof M Bennett</b> BSc MBChB PhD MA FRCP FAHA FMedSci	University of Cambridge	Funding to purchase a high-resolution animal ultrasound system for cardiac and vascular studies. 1 year	£202,533
IG/16/1/32140	<b>Prof J Emsley</b> BSc PhD	University of Nottingham	Funding towards major equipment for structural biology studies. 1 year	£235,111

### Special Project Grants

Listed alphabetically by Institute

Reference Number	Name	Location	Grant title	Total
SP/17/4/33083	<b>Academy of Medical Sciences</b>	Academy of Medical Sciences	Academy of Medical Sciences Clinical Lecturer Starter Grants (renewal). 4 years	£800,240
SP/17/5/33084	<b>Academy of Medical Sciences</b>	Academy of Medical Sciences	Academy of Medical Sciences Springboard Awards for Biomedical Researchers. 3 years	£676,200
SP/17/1/32702	<b>Dr E de Silva</b> BSc PhD MBBS FRCP	Imperial College London	Biomechanical determinants of advanced coronary atherosclerotic plaque formation in transgenic hyperlipidaemic minipigs. 3 years	£636,391
SP/16/6/32726	<b>Prof N Chaturvedi</b> MBBS MSc MRCP MFPHM MD	University College London	Glycaemia and chronic disease: harnessing UK Biobank and eHealth linkage to quantify risks, explore mechanisms and determine treatment impacts (Joint funding with Diabetes UK). 5 years	£349,068
SP/16/3/32317	<b>Dr W Fuller</b> BA MA PhD	University of Dundee	The role of NCX1 palmitoylation in cardiac function. 4 years	£637,445

### Special Project Grants (continued)

SP/17/3/33020	<b>Prof A Baker</b> BSc PhD FMedSci	University of Edinburgh	Control of endothelial cell commitment and specification by long non-coding RNA (Joint funding with BIRAX). 3 years	£198,774
SP/17/8/33094	<b>Prof K Horsburgh</b> BSc PhD	University of Edinburgh	Disintegration of the cerebrovascular matrisome: a central mechanism leading to small vessel disease and vascular cognitive impairment (Joint funding with Stroke Association and Alzheimer's Society for Advancing Care and Treatment of Vascular Dementia (ACT-VAD)). 4 years	£364,800
SP/17/7/33093	<b>Prof J Wardlaw</b> CBE BSc (Hons) MBChB (Hons) FRCP FRCP MD FMedSci FESO FRSE	University of Edinburgh	Rates, Risks and Routes to Reduce Vascular Dementia (R4VaD) (Joint funding with Stroke Association and Alzheimer's Society for Advancing Care and Treatment of Vascular Dementia (ACT-VAD)). 5 years	£538,080
SP/16/5/32415	<b>Dr D Adlam</b> BA BM BCh DPhil FRCP	University of Leicester	Cardio-oncology: a high resolution national electronic health record investigation of the interplay between cancer and heart disease (Joint funding with Cancer Research UK). 5 years	£770,451
SP/16/4/32697	<b>Prof T Robinson</b> MD FRCP FESO	University of Leicester	Funding for the Leicester Cardiovascular Genomics Group. 4 years, 8 months	£1,610,040
SP/17/2/33029	<b>Prof Sir R Collins</b> MSc MBBS LMSSA FRCP FMedSci FRS	University of Oxford	UK Biobank Core Renewal (Joint funding with Wellcome Trust, Medical Research Council, Cancer Research UK and National Institute for Health Research). 5 years	£3,170,000
SP/17/6/33092	<b>Dr R Carare</b> MD PhD	University of Southampton	Vascular dementia: failure of fluid drainage from cerebral white matter (Joint funding with Stroke Association and Alzheimer's Society for Advancing Care and Treatment of Vascular Dementia (ACT-VAD)). 3 years	£97,120

## Clinical Study Grants

Listed alphabetically by Institute

Reference Number	Name	Location	Grant title	Total
CS/16/3/32615	<b>Prof S Redwood</b> MBBS MD FRCP FACC FSCAI	King's College London	A randomised trial of expedited transfer to a cardiac arrest centre for non-ST elevation out-of-hospital cardiac arrest: the ARREST trial. 5 years	£950,497
CS/16/4/32482	<b>Prof D Lawlor</b> MB ChB MRCP	University of Bristol	Early life determinants of pre-adolescent differences in cardiometabolic health between South Asian and white British children: the Born in Bradford (BiB) cohort. 5 years	£1,016,398
CS/17/2/32836	<b>Dr P Henriksen</b> MBChB PhD FRCP	University of Edinburgh	A multi-centre prospective randomised open-label blinded end-point controlled trial of cardiac troponin I guided combination angiotensin converting enzyme inhibitor and beta blocker therapy to prevent cardiac toxicity in breast cancer patients (joint funding with the Medical Research Council and National Institute for Health Research). 5 years	£399,973



### Clinical Study Grants (continued)

CS/16/2/32145	<b>Prof C Gale</b> BSc MBBS PhD MEd FESC MSc FRCP	University of Leeds	Effectiveness of the GRACE risk score on the management and outcome of patients hospitalised with non-ST elevation acute coronary syndrome. <i>4 years, 9 months</i>	£807,038
CS/17/1/32445	<b>Prof A Gershlick</b> MBBS FRCP	University of Leicester	RAPIDNSTEMI – Revascularisation in ACS patients: immediate versus delayed intervention: a study assessing the impact of very early intervention on outcomes in NSTEMI-ACS patients. <i>4 years, 3 months</i>	£1,573,061
CS/17/3/32799	<b>Prof M Tomaszewski</b> MD FAHA FRCP	University of Manchester	Biomarkers in urine, antihypertensive treatment and blood pressure control in hypertensive patients: outreach study. <i>3 years</i>	£754,472

## Programme Grants

Listed alphabetically by Institute

Reference number	Name	Institution	Grant title	Total
RG/16/3/32175	<b>Prof N Peters</b> MD FRCP	Imperial College London	Myocardial electro-architecture underlying fibrillatory conduction in complex arrhythmogenesis (renewal). <i>5 years</i>	£1,220,323
RG/17/4/32662	<b>Prof A Randi</b> MD PhD	Imperial College London	Endothelial transcriptional networks in the control of angiogenesis and tissue homeostasis (renewal). <i>5 years</i>	£1,250,000
RG/16/14/32397	<b>Prof M Mayr</b> MD PhD	King's College London	Exploring known and novel biomarkers of cardiovascular disease. <i>5 years</i>	£1,115,323
RG/16/15/32294	<b>Prof K Otsu</b> MD PhD FAHA FMedSci	King's College London	Non-apoptotic cell death in heart failure. <i>5 years</i>	£1,599,643
RG/17/2/32808	<b>Prof C Shanahan</b> BSc PhD	King's College London	Mechanisms of vascular smooth muscle cell ageing and calcification (renewal). <i>5 years</i>	£1,655,449
RG/16/7/32357	<b>Prof A Hobbs</b> BSc PhD	Queen Mary University of London	Delineating physiological and pathological regulatory roles for C-type natriuretic peptide in cardiac structure and function. <i>5 years</i>	£817,911
RG/16/11/32334	<b>Prof E Brunner</b> BSc MSc PhD FFPH	University College London	Vascular risk and functional decline in old age: from discovery to translation. <i>5 years</i>	£1,096,911
RG/16/8/32388	<b>Dr M Clarke</b> PhD BSc (Hons)	University of Cambridge	Novel mechanisms that induce vascular inflammation. <i>5 years</i>	£966,437
RG/16/9/32391	<b>Prof J Huntington</b> BSc BA PhD	University of Cambridge	Assembly and function of the engines of coagulation: the prothrombinase and intrinsic xase complexes. <i>5 years</i>	£1,079,583
RG/16/4/32218	<b>Prof H Markus</b> BM BCh BA FRCP DM	University of Cambridge	Using genetics to explore the pathophysiology of cerebral small vessel disease. <i>5 years</i>	£1,116,851

<b>Programme Grants (continued)</b>				
RG/16/10/32375	<b>Prof D Newby</b> BA BSc PhD BM DM DSc FRSE FESC FACC FMedSci	University of Edinburgh	Non-invasive imaging of human coronary atherothrombosis. <i>5 years</i>	£1,796,358
RG/16/2/32153	<b>Prof M MacLean</b> BSc PhD FBPharmacolS FSB MBE FRSE	University of Glasgow	Sex and the development of pulmonary arterial hypertension (renewal). <i>5 years</i>	£1,011,528
RG/16/5/32250	<b>Prof K Naseem</b> BSc PhD	University of Hull	Characterising the thromboinflammatory roles of platelet CD36. <i>5 years</i>	£869,721
RG/16/1/32092	<b>Prof S Plein</b> MRCP MD PhD	University of Leeds	Mechanisms of cardiovascular disease in diabetes mellitus. <i>5 years</i>	£912,067
RG/16/6/32233	<b>Prof D Steele</b> BSc PhD	University of Leeds	Impaired Rap1 signalling increases mitochondrial reactive oxygen species production and susceptibility to cardiac arrhythmias: implications for drug therapies and disease mechanisms (renewal). <i>5 years</i>	£809,239
RG/17/3/32774	<b>Prof A Ng</b> MBChB PhD FRCP (Glasg) FRCP FESC	University of Leicester	Neurocardiac interaction in malignant ventricular arrhythmias and sudden cardiac death. <i>5 years</i>	£993,584
RG/16/13/32609	<b>Prof S Ye</b> MB MD PhD FRCPath	University of Leicester	A comprehensive study to uncover and understand genetic influences on vascular smooth muscle cell behaviour in relation to cardiovascular diseases. <i>3 years</i>	£679,644
RG/16/12/32451	<b>Prof B Casadei</b> MD DPhil FRCP FESC FMedSci	University of Oxford	A systematic approach to identifying and testing novel therapeutic targets for atrial fibrillation (renewal). <i>5 years</i>	£1,572,997
RG/17/1/32663	<b>Prof F Karpe</b> MD PhD FRCP	University of Oxford	Identification and functional evaluation of genetic and epigenetic determinants of human fat distribution: investigations to understand the cardio-protective effect of lower body adiposity. <i>5 years</i>	£779,060

## New Horizons Grants

<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
NH/16/1/32447	<b>Dr C Dunsby</b> MSc PhD	Imperial College London	Novel optical approaches to understanding the microscopic origins of calcium waves and the mechanisms underlying their arrhythmogenic properties. <i>3 years</i>	£283,307
NH/16/2/32499	<b>Prof M Malik</b> PhD MD DSc DSc (Med)	Imperial College London	Electrocardiographic pattern classification for automatic repolarisation assessment. <i>3 years</i>	£257,498

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**New Horizons Grants (continued)**

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NH/17/1/32725	<b>Dr D O'Regan</b> FRCP FRCR PhD	Imperial College London	Using machine learning to predict clinical outcomes in heart failure. 3 years	£297,017
NH/16/3/32579	<b>Dr W Holmes</b> BSc PhD	University of Glasgow	Towards metabolic assessment of myocardial viability using oxygen-17 MRI. 2 years, 6 months	£171,153

## Translational Awards

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Listed alphabetically by Institute

<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
TG/16/2/32657	<b>Prof G Lombardi</b> BSc PhD	King's College London	Thymus derived Tregs expanded in vitro as a treatment for paediatric heart transplant patients to prevent cardiac allograft vasculopathy. 2 years	£230,159
TG/16/1/32108	<b>Dr W Fuller</b> BA MA PhD	University of Dundee	Small molecules activating Nrf2 as a therapeutic approach to prevent cardiac ischaemia-reperfusion injury. 2 years	£161,187
TG/16/3/32687	<b>Dr C Antoniades</b> MD PhD	University of Oxford	Translating a novel CT imaging method to identify vascular inflammation and vulnerable plaques. 2 years	£287,000

## Project Grants

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Listed alphabetically by Institute

<i>Reference number</i>	<i>Name</i>	<i>Institution</i>	<i>Grant title</i>	<i>Total</i>
PG/17/3/32722	<b>Prof J Gorelik</b> MSc PhD	Imperial College London	Role of altered nanodomains of calcium signalling in atrial fibrillation. 3 years	£149,011
PG/16/78/32402	<b>Dr J Keegan</b> BSc MSc PhD	Imperial College London	Combined compressed sensing and super-resolution for 3D late enhancement imaging improves scar segmentation and quantification in atrial fibrillation. 3 years	£233,276
PG/16/96/32557	<b>Prof J Mason</b> PhD FRCP	Imperial College London	Analysis of extracellular vesicle interactions with vascular endothelium under physiological shear stress is required to determine their role in endothelial injury and cytoprotection, and as a therapeutic target. 3 years	£241,939
PG/16/83/32467	<b>Prof J Mitchell</b> BSc PhD	Imperial College London	Comparative cell biology and pharmacology of autologous endothelial cells and smooth muscle grown from human blood. 2 years	£137,646
PG/16/47/32156	<b>Dr M Noseda</b> MD PhD	Imperial College London	Single-cell transcriptomics of adult cardiac progenitor cells: hierarchical organisation, index sorting and isoform sequencing. 3 years	£257,120
PG/16/91/32515	<b>Prof A Randi</b> MD PhD	Imperial College London	Von Willebrand factor controls heart function through angiotensin-2. 1 year	£70,416

Project Grants (continued)				
PG/16/93/32345	<b>Dr S Sattler</b> Dr rer nat	Imperial College London	Suppression of immune-mediated heart disease by IGF-1: targeting the adaptive immune system after myocardial infarct. <i>3 years</i>	£287,793
PG/16/95/32350	<b>Dr M Tang</b> PhD	Imperial College London	Quantitative and non-invasive 3D flow and vascular wall shear stress mapping using ultrafast contrast-enhanced ultrasound and particle image velocimetry. <i>3 years</i>	£179,389
PG/17/5/32705	<b>Dr P Vikhorev</b> BSc MSc PhD	Imperial College London	Effect of mutations associated with dilated and hypertrophic cardiomyopathies on myofibril mechanical properties and contractility. <i>3 years</i>	£240,126
PG/16/68/31991	<b>Prof G Morris</b> BA DPhil	Keele University	The role of nuclear envelope proteins in cardiac conduction and heart disease. <i>3 years</i>	£233,316
PG/16/81/32441	<b>Dr M Bishop</b> MPhys DPhil	King's College London	Enabling clinical translation of a novel activation-repolarisation time metric for improved identification of optimal catheter ablation sites. <i>3 years</i>	£287,947
PG/17/14/32867	<b>Dr J Burgoyne</b> PhD	King's College London	Studying novel modes of autophagy regulation and their roles in heart failure. <i>3 years</i>	£219,368
PG/16/41/32138	<b>Prof L Gnudi</b> MD PhD FRCP FASN	King's College London	Role of soluble Nogo-B in diabetic nephropathy: a protective role for the endothelium? <i>3 years</i>	£234,128
PG/16/59/32274	<b>Dr A Ivetic</b> BSc (Hons) ARCS PhD	King's College London	Exploring the relationship between ezrin-radixin-moesin (ERM) proteins and NADPH oxidase 2 (Nox2) in modulating endothelial cell permeability in health and disease. <i>3 years</i>	£203,867
PG/16/72/32354	<b>Prof J Kentish</b> MA PhD	King's College London	To what extent can PKD-induced phosphorylation of cardiac myofibrils correct the dysfunction of myofibril contraction in the failing human heart? <i>2 years</i>	£151,303
PG/16/75/32383	<b>Dr P Lamata</b> PhD	King's College London	Improving risk stratification in hypertrophic cardiomyopathy through a computational anatomical analysis of ventricular remodelling. <i>3 years</i>	£299,408
PG/16/108/32593	<b>Prof R Razavi</b> MBBS MRCP MD	King's College London	Identifying the optimal location for LV endocardial lead placement in CRT delivery using cardiac magnetic resonance imaging, acute haemodynamic response and non-invasive electro-anatomical mapping. <i>2 years</i>	£183,756
PG/16/70/32310	<b>Prof A Shah</b> MD FRCP FESC FMedSci	King's College London	Regulation of cardiomyocyte cell cycling by nuclear NOX4D. <i>3 years</i>	£277,614
PG/16/43/32141	<b>Dr R Southworth</b> BSc PhD	King's College London	Development of new hypoxia-avid PET agents for the imaging of chronic cardiovascular disease. <i>3 years</i>	£253,358

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**Project Grants (continued)**


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PG/16/97/32567	<b>Prof D Middleton</b> BSc PhD	Lancaster University	The effects of green tea polyphenols on apolipoprotein A-I amyloidosis associated with atherosclerosis. <i>1 year</i>	£66,048
PG/16/40/32137	<b>Prof M Brown</b> MA MSc MD FRCP FAHA FMedSci	Queen Mary University of London	A feasibility study of endoscopic ultrasound-guided ablation as a non-surgical, adrenal-sparing treatment for aldosterone-producing adenomas. <i>3 years</i>	£225,952
PG/16/79/32419	<b>Dr P Longhi</b> BSc PhD	Queen Mary University of London	Investigating the role of CD103 dendritic cells in controlling adipose tissue inflammation. <i>2 years</i>	£206,467
PG/17/15/32845	<b>Dr I Dumitriu</b> MD PhD	St George's, University of London	New kids on the block: mapping CD4 <sup>+</sup> T lymphocytes in atrial fibrillation. <i>3 years</i>	£299,559
PG/17/18/32883	<b>Dr C Bourantas</b> MD PhD ESC	University College London	Evaluation of the efficacy of computed tomographic coronary angiography in assessing coronary artery morphology and physiology. <i>2 years</i>	£143,115
PG/16/73/32364	<b>Dr V Budhram Mahadeo</b> BSc (Hons) PhD	University College London	Investigating a novel regulator of vascular calcification associated with hypertension. <i>3 years</i>	£252,924
PG/17/6/32797	<b>Dr C Capelli</b> MEng PhD	University College London	Large-scale validation of computer simulations for personalised cardiovascular treatments in congenital heart disease. <i>3 years</i>	£183,422
PG/16/56/32246	<b>Dr R Day</b> BSc (Hons) PhD FHEA	University College London	Biomaterial-based therapeutic neovascularisation. <i>3 years</i>	£175,958
PG/16/87/32492	<b>Dr M Gage</b> BSc PhD	University College London	Macrophage insulin signalling enhancement in inflammation and atherosclerosis. <i>3 years</i>	£257,102
PG/16/50/32182	<b>Prof J Greenwood</b> BSc PhD FRCPATH	University College London	The role of LRG1 in promoting disorganised neovascularisation. <i>3 years</i>	£288,940
PG/16/84/32464	<b>Dr C Pellet-Many</b> BSc MSc PhD	University College London	Role of neuropilins in the development of atherosclerosis and neointimal lesions following vascular injury. <i>3 years</i>	£256,358
PG/17/8/32840	<b>Dr C Roberts</b> PhD BSc (Hons)	University College London	The role of CYP26B1 regulation of retinoic acid in cardiac development and regeneration. <i>3 years</i>	£293,936
PG/16/76/32394	<b>Dr J Simons</b> BSc PhD FRSB	University College London	Mechanisms of cardiac transthyretin amyloidosis. <i>3 years</i>	£285,983
PG/17/2/32737	<b>Prof C Stern</b> BSc DPhil DSc FRSB FMedSci FRS	University College London	Deconstructing and reconstructing heart development. <i>1 year, 6 months</i>	£118,115
PG/16/99/32572	<b>Prof A Taylor</b> BA (Hons) BM BCh MD FRCR FRCP PG Dip (Medical Leadership)	University College London	3D printing congenital heart disease: assessing clinical translation for clinical practice, surgeon training, education and patient understanding. <i>3 years</i>	£206,476

Project Grants (continued)				
PG/16/85/32471	<b>Prof D Yellon</b> PhD DSc	University College London	How do the class I PI3K isoforms contribute to reperfusion injury and ischaemic preconditioning? <i>3 years</i>	£198,067
PG/16/90/32518	<b>Dr N Mody</b> BSc PhD	University of Aberdeen	Synthetic derivatives of Fenretinide, a novel approach to prevent lipotoxicity, insulin resistance and vascular endothelial dysfunction. <i>3 years</i>	£200,340
PG/16/53/32242	<b>Dr Y Sun</b> PhD	University of Birmingham	Large-scale screening for membrane protein interactions involved in platelet-monocyte interactions. <i>3 years</i>	£296,751
PG/16/103/32650	<b>Dr N Morgan</b> BSc PhD	University of Birmingham	Functional investigation of SLFN14 in megakaryocyte and platelet biology. <i>2 years</i>	£143,827
PG/16/104/32652	<b>Prof R Ascione</b> MD ChM FRCS	University of Bristol	Arterial bioengineering of decellularised human saphenous veins to reduce early graft thrombosis and improve long-term patency rate. <i>3 years</i>	£268,283
PG/16/61/32300	<b>Prof S George</b> BSc PhD	University of Bristol	Attenuation of late vein graft failure by CK2 inhibition. <i>3 years</i>	£197,047
PG/16/55/32277	<b>Prof J Hancox</b> BSc PhD FRSB FBPhS	University of Bristol	Investigation of cardiac late sodium current as a therapeutic target in Rett Syndrome. <i>3 years</i>	£252,678
PG/16/71/32301	<b>Prof J Hancox</b> BSc PhD FRSB FBPhS	University of Bristol	Investigation of pharmacological modulators of TASK-1 K <sup>+</sup> channels on electrophysiology of the atrioventricular node. <i>3 years</i>	£245,194
PG/16/101/32622	<b>Prof P Madeddu</b> MD	University of Bristol	Targeting of protein kinase C beta II (PKCβII) to improve vascular and muscular fitness in diabetic peripheral ischaemia. <i>3 years</i>	£186,790
PG/16/62/32295	<b>Prof H Mellor</b> BSc PhD	University of Bristol	Mechanisms of neovascularisation: RhoJ, FMNL3 and the formation of vascular lumens. <i>2 years</i>	£125,181
PG/16/48/32172	<b>Dr S Mundell</b> BSc (Hons) PhD	University of Bristol	Regulation of P2Y12 receptor function in smooth muscle cells by antiplatelet drugs: treatment of restenosis? <i>2 years</i>	£147,312
PG/17/10/32829	<b>Dr A Nobbs</b> BSc (Hons) PhD	University of Bristol	Molecular mechanisms in <i>Streptococcus</i> -triggered endocarditis. <i>3 years</i>	£189,630
PG/16/102/32647	<b>Prof A Poole</b> MA PhD VetMB FBPhS MRCVS	University of Bristol	The role of the water channel aquaporin-1 in the regulation of platelet function, procoagulant activity and thrombosis. <i>3 years</i>	£221,590
PG/16/63/32307	<b>Prof M Bennett</b> BSc MBChB PhD MA FRCP FAHA FMedSci	University of Cambridge	Smooth muscle cell regulation of vascular ageing. <i>3 years</i>	£235,035
PG/16/45/32152	<b>Dr M Harper</b> MA PhD	University of Cambridge	HMGB1, a novel pro-thrombotic signal released by necrotic platelets. <i>3 years</i>	£188,040

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**Project Grants (continued)**

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PG/17/1/32532	<b>Dr W Li</b> BSc PhD	University of Cambridge	Role of extracellular protein-protein interaction network in determining the specificity of endothelial bone morphogenetic protein signalling. 3 years	£265,932
PG/17/9/32834	<b>Prof Z Mallat</b> PhD MD	University of Cambridge	Molecular mechanism linking chr9p21 genetic risk variants to cardiovascular disease: altered IL-1/TLR signalling and transcriptional regulation of IRAK4. 3 years	£289,799
PG/16/69/32194	<b>Dr S Fountain</b> BSc PhD	University of East Anglia	Vasodilatation by positive allosteric modulation of the endothelial P2X4 receptor for ATP. 3 years	£234,379
PG/16/94/32393	<b>Dr S Fountain</b> BSc PhD	University of East Anglia	The role of diacylglycerol kinases in chemokine-mediated responses in human monocytes and monocyte-derived macrophage. 3 years	£194,129
PG/16/98/32568	<b>Dr M Bailey</b> BSc PhD	University of Edinburgh	Connecting salt appetite to hypertension in mice with central nervous system deletion of 11 $\beta$ hydroxysteroid dehydrogenase type 2. 3 years	£235,313
PG/16/88/32493	<b>Prof A Baker</b> BSc PhD FMedSci	University of Edinburgh	Long non-coding RNA control of MIR-143 and MIR-145 expression and function in pulmonary arterial hypertension. 3 years	£207,336
PG/16/51/32180	<b>Prof A Baker</b> BSc PhD FMedSci	University of Edinburgh	Analysis of a novel long non-coding RNA (SMILR) that controls vascular smooth muscle cell proliferation. 3 years	£209,873
PG/16/58/32275	<b>Dr A Caporali</b> PhD	University of Edinburgh	Role of microRNA-26b in post-ischaemic angiogenesis. 3 years	£209,650
PG/17/17/32877	<b>Dr S Nicklin</b> BSc PhD PG Cert	University of Glasgow	Cardiac gene therapy with angiotensin-(1-9): dissecting the underlying mechanism for preservation of cardiac function post-myocardial infarction. 3 years	£248,753
PG/17/12/32847	<b>Prof G Smith</b> BSc PhD	University of Glasgow	Investigating the influence of myofibroblast coupling on cardiac conduction and infarct electrophysiology. 3 years	£246,665
PG/16/42/32142	<b>Dr A Workman</b> BSc PhD	University of Glasgow	Adrenoceptor-subtype antagonism profiles with anti-arrhythmic potential in human atrial myocytes. 3 years	£149,580
PG/16/60/32292	<b>Prof R Ariens</b> BSc PhD	University of Leeds	Deciphering the role of fibrin intrafibrillar structure and protofibril arrangements in blood clot structure, function and stability. 3 years	£165,272
PG/17/7/32806	<b>Dr M Bailey</b> PhD MB ChB (Hons) BSc PG Cert (Health Research) MRCS (Eng)	University of Leeds	Vascular smooth muscle cell location, function and phenotype in murine models of abdominal aortic aneurysm. 3 years	£205,957

Project Grants (continued)				
PG/16/74/32374	<b>Dr A Benson</b> BSc (Hons) PhD	University of Leeds	The effects of exercise on structural and electrical remodelling in right heart failure. <i>3 years</i>	£217,223
PG/16/86/32474	<b>Dr S Ponnambalam</b> BSc PhD	University of Leeds	Ubiquitin ligase control of angiogenesis. <i>3 years</i>	£219,413
PG/16/89/32506	<b>Dr K Smith</b> BSc PhD	University of Leeds	The effects of increased fibrinogen phosphorylation on endothelial dysfunction and thrombus formation: implications in atherosclerosis. <i>3 years</i>	£170,317
PG/17/16/32853	<b>Dr P Sukumar</b> MBBS MMST PhD	University of Leeds	Examining the mechanisms and pathophysiological implications of the phenotypic switch in the endothelium of mice with endothelial cell specific IGF-1 and insulin resistance. <i>3 years</i>	£275,438
PG/16/107/32681	<b>Dr R Akhtar</b> MEng PhD	University of Liverpool	Exploring the interplay between biochemical and biomechanical heterogeneity as a risk factor for acute Type A aortic dissection. <i>2 years</i>	£155,355
PG/16/65/32313	<b>Dr G Wang</b> MBChB MD PhD	University of Liverpool	The mechanisms of extracellular histone-induced immunothrombosis and its roles in microvascular circulatory failure during critical illnesses. <i>3 years</i>	£243,401
PG/17/4/32689	<b>Prof M Boyett</b> BSc PhD FRSB FRCP	University of Manchester	Heart block in heart failure and the athlete: the role of a novel mechanism. <i>2 years</i>	£142,811
PG/16/52/32229	<b>Prof A Heagerty</b> MD FRCP FAHA FBHS FMedSci	University of Manchester	The structure and function of the sympathetic nervous system in perivascular adipose tissue in health and obesity. <i>3 years</i>	£231,536
PG/16/80/32411	<b>Prof C McCollum</b> MB ChB MD FRCS	University of Manchester	Developing a real-time Intensive Care Risk Identification System (IRIS) for the early identification and treatment of complications following cardiac surgery. <i>3 years</i>	£284,637
PG/16/77/32400	<b>Dr D Oceandy</b> MBChB PhD	University of Manchester	Modulation of calcium signalling in cardiac fibroblasts by the plasma membrane calcium pumps (PMCA) to improve pathological cardiac remodelling. <i>1 year, 6 months</i>	£135,281
PG/16/49/32176	<b>Prof M Tomaszewski</b> MD FAHA FRCP	University of Manchester	Paternal lineages of the Y chromosome in predisposition to coronary artery disease and common autoimmune disorders in UK Biobank. <i>2 years</i>	£91,233
PG/16/105/32659	<b>Dr H Phillips</b> BSc MSc PhD	University of Newcastle upon Tyne	Investigating the role of autophagy in cardiomyocytes during heart development. <i>3 years</i>	£287,567
PG/16/100/32632	<b>Prof S Bhattacharya</b> MBBS MD MRCP MSc FESC FMedSci	University of Oxford	Targeting the chemokine network in myocarditis using ligand traps derived from tick saliva. <i>3 years</i>	£223,390



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**Project Grants (continued)**


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PG/17/13/32860	<b>Prof P Leeson</b> PhD FRCP	University of Oxford	Adult preterm cerebrovascular phenotype and influence of cardiovascular fitness. <i>3 years</i>	£296,684
PG/16/67/32340	<b>Prof M Lei</b> BSc MD DPhil	University of Oxford	Investigating the molecular and cellular basis underlying Pak1 intervention in Ca <sup>2+</sup> -dependent ventricular arrhythmogenesis. <i>3 years</i>	£195,321
PG/16/57/32256	<b>Dr S Peters</b> PhD	University of Oxford	Sex differences in the vascular consequences of diabetes: big data analyses to inform strategies for prevention and treatment. <i>3 years</i>	£298,258
PG/16/106/32669	<b>Prof C Porcher</b> PhD	University of Oxford	Tracing mesoderm-derived lineages through single cell analysis and fate mapping studies. <i>3 years</i>	£296,759
PG/16/66/32288	<b>Dr P Swietach</b> BA DPhil	University of Oxford	Regulation of nuclear pH in ventricular myocytes and its role in gene expression. <i>3 years</i>	£226,672
PG/17/11/32841	<b>Prof A Clerk</b> BSc PhD	University of Reading	The role of BRAf in the heart. <i>1 year</i>	£74,110
PG/16/64/32311	<b>Dr S Vaiyapuri</b> MSc PhD	University of Reading	Investigation of the functions of formyl peptide receptors in the regulation of thrombosis and haemostasis in pathophysiological conditions. <i>2 years</i>	£170,397
PG/16/44/32146	<b>Dr E Kiss-Toth</b> MSc PhD Habil	University of Sheffield	Regulation of hepatic Tribbles-1 activity by miR202: a novel anti-atherosclerotic strategy. <i>1 year, 6 months</i>	£108,891
PG/16/54/32230	<b>Prof J McCarron</b> BSc PhD	University of Strathclyde	Endothelial Ca <sup>2+</sup> signalling in hypertension visualised from inside pressurised arteries. <i>3 years</i>	£219,519
PG/16/82/32439	<b>Prof J McCarron</b> BSc PhD	University of Strathclyde	Endothelial acetylcholine release explains flow-mediated dilation and is impaired in type 2 diabetes. <i>3 years</i>	£204,947
PG/16/46/32155	<b>Dr M Bannister</b> BSc PhD	University of Swansea	Elucidating viable mechanisms of block in the cardiac ryanodine receptor. <i>3 years</i>	£185,387
PG/16/92/32453	<b>Dr N Thomas</b> BSc PhD	University of Swansea	Functional assessment of cardiac ryanodine receptor Ca <sup>2+</sup> release channel populations: a direct demonstration of coupled gating? <i>3 years</i>	
PG/17/19/32862	<b>Prof J Potts</b> BSc PhD	University of York	Preventing protein-mediated staphylococcal biofilms on medical devices: structural characterisation of three extracellular targets. <i>3 years</i>	£285,231



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Foundation**

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We've broken new ground, revolutionised treatments and transformed care.

But heart and circulatory disease still kills one in four people in the UK.

That's why we need you.

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FOR EVERY  
HEARTBEAT**

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