

FP7 2013 Work Programmes International Dimension

Opportunities for AUSTRALIA





FP7 Work Programmes

- Legal basis for the implementation of FP7
- Contain full information on the calls for proposals to be published in 2012-2013
 - Details of topics and expected impacts, budgets and timing of calls etc
- Work programme of actions of over €9,4 billion, including:
 - Project calls open for Australian partners, €4.84 billion
 - People (Marie S. Curie Grants), € 0,97 billion
 - Ideas (European Research Council grants), € 1,75 billion
 - Iter, € 0,94 billion
 - Other (special actions, general and other activities), € 0,89 billion



Principles of participation of Australia in FP7

- All areas of FP7 open to the participation of Australian researchers and/or research organisations
- Australia is 'International Cooperation Partner Country' (ICPC) ⇒ Same rights and obligations for receiving EU funding as EU Member States
- Consortia must have the minimum required number of EU Member States/Associated States participants

⇒ Normally 3 Member States/Associated States participants(please refer eligibility criteria mentioned into the full text of the call)





FP7 "Cooperation" Specific Programme

For memory, the ten themes under "cooperation" programme are the following:

- •Health
- •Food, Agriculture and Fisheries, Biotechnology
- Information & communication technologies
- •Nanosciences, nanotechnologies, materials & new production technologies
- •Energy
- •Environment (including Climate Change)
- •Transport (including aeronautics)
- •Socio-economic Sciences and the Humanities
- •Space
- Security



Health & KBBE

- Two major calls 10 July 2013, (€ 838 million)
 Main topic: Brain research
- Research priorities:
- Health.2013.2.2.1-1: Prospective longitudinal data collection and Comparative Effectiveness Research (CER) for traumatic brain injury (TBI) 30 Mio

TOTAL 96 Mio:

- Health.2013.2.2.1-2: Development of effective imaging tools for diagnosis, monitoring and management of mental disorders
- Health.2013.2.2.1-3: Paediatric conduct disorders characterised by aggressive traits and/or social impairment: from preclinical research to treatment
- Health.2013.2.2.1-4: Patho-physiology and therapy of epilepsy and epileptiform disorders
- Health.2013.2.2.1-5: Understanding and controlling pain





Health – Interest for Australia

- All topics of the main call FP7-HEALTH-2013-INNOVATION-1 are open for Australian participation
- Topics of particular interest may include: Health.2013.2.2.1-1: Prospective longitudinal data collection and Comparative Effectiveness Research (CER) for traumatic brain injury (TBI) 30 Mio

TOTAL 96 Mio:

- Health.2013.2.2.1-2: Development of effective imaging tools for diagnosis, monitoring and management of mental disorders
- Health.2013.2.2.1-3: Paediatric conduct disorders characterised by aggressive traits and/or social impairment: from preclinical research to treatment
- Health.2013.2.2.1-4: Patho-physiology and therapy of epilepsy and epileptiform disorders

Health.2013.2.2.1-5: Understanding and controlling pain





KBBE – Interest for Australia

- All topics open for Australia participation
- Topics of particular interest may include:
 KBBE.2013.1.2-08: Innovative insights and tools to integrate the ecosystem-based approach into fisheries advice 6 mio
 KBBE.2013.3.2-01: Marine bio technology ERA-NET 2 Mio
 KBBE.2013.2.5-02: Saving water and energy for resource-efficient food processing 18 mio





Food, Agriculture and Biotechnologies (FAB)

- One call 10 July (€380 million)
- Research Priorities
 - Sustainable Agriculture and Forestry
 - Sustainable and Competitive Agri-Food Sector for a Safe and Healthy Diet
 - Unlocking the Potential of Aquatic Living Resources
 - Sustainable and Competitive Bio-based Industries
- Calls have an emphasis on
 - Completing ERA (European Research Area)
 - Stimulating innovation incl. knowledge exchange with SMEs
 - Supporting European policies (e.g. General Food Law Regulation)
 - Supporting international cooperation (e.g. Tackling challenges of a global nature, Millennium Development Goals)



Cross thematic Call "Oceans of Tomorrow"

4 topics of particular interest to Australia:

•OCEAN.2013-1: Biosensors for real time monitoring of biohazard and man made chemical contaminants in the marine environment

•OCEAN.2013-2: Innovative multifunctional sensors for in-situ monitoring of marine environment and related maritime activities

•OCEAN.2013-3: Innovative antifouling materials for maritime applications

•OCEAN.2013-4: Innovative transport and deployment systems for the offshore wind energy sector





Information and Communications Technologies (ICT)

Two ICT Calls - 10 July (€1,4 billion)

ICT WP

ICT-2013.1.4 Internet of Things and the Digital Enterprise 20 Mio
ICT-2013.6.2 Data Centres in an energy-efficient and environmentally friendly Internet 20 MIo
ICT-2013.6.6 Co-operative mobility 15 Mio
ICT-2013.6.4 Optimising Energy Systems in Smart Cities 40 Mio





ICT – Interest for Australia

- All topics open for Australia participation
- Topics of particular interest may include:

Objective ICT-2013.10.3 International partnership building and support to dialogues – Horizontal International Cooperation Actions. The target is to support dialogues between the European Commission/the EU and strategic partner countries and regions, and to foster cooperation with strategic third country organisations in collaborative ICT R&D both within the EU's Framework Programmes (FP7, Horizon 2020) and under relevant third country programmes





NANOSCIENCES, NANOTECHNOLOGIES, MATERIALS & NEW PRODUCTION TECHNOLOGIES (NMP)-I

- Nine calls + 2 coordinated calls 10 July 2012 601 € million
- European energy-efficient buildings
- Focus on smart and sustainable growth, for a greener industry

Energy efficient Buildings Call TOTAL 116 Mio

- EeB.NMP.2013-1 Nanotechnology for multifunctional lightweight construction materials and components **(NMP)**
- EeB.NMP.2013-2 Safe, energy-efficient and affordable eco-innovative materials for building envelopes and/or partitions to provide a healthier indoor environment **(NMP)**
- EeB.NMP.2013-3 Integration of technologies for energy-efficient solutions in the renovation of public buildings **(NMP)**
- Contribution to four cross-thematic calls on raw materials, ocean for tomorrow, smart cities and anti-microbial resistance



NANOSCIENCES, NANOTECHNOLOGIES, MATERIALS & NEW PRODUCTION TECHNOLOGIES (NMP)-II

- Focus on smart and sustainable growth, for a greener industry
- EeB.NMP.2013-4 Integrated control systems and methodologies to monitor and improve building energy performance (NMP)
- EeB.NMP.2013-5 Optimised design methodologies for energy-efficient buildings integrated in the neighbourhood energy systems **(NMP)**
- EeB.NMP.2013-6 Achieving high efficiency by deep retrofitting in the case of commercial buildings **(NMP)**
- EeB.ENV.2013.6.3-4 Energy efficient retrofitting and renewal of existing buildings for sustainable urban districts **(ENV)**
- Contribution to four cross-thematic calls on raw materials, ocean for tomorrow, smart cities and antimicrobial resistance



NMP – Interest for Australia

- All topics open for Australia participation
- Topic in areas of particular interest:
 - two topics in the Factories of the Future PPP (FoF.NMP.2013-3 and FoF.NMP.2013-9) are particularly suitable for collaboration at international level, particularly under the IMS (Intelligent Manufacturing Systems) scheme.







- One call 10 July (€371 million)
- Focus on the implementation plans and road maps of the European Strategic Energy Technology Plan (SET-Plan)
- Aim to accelerate market take up of most promising technologies in:
 - Smart Cities and Communities
 - Renewable Energy
 - Carbon Capture and Storage (CCS);
 - Smart Grids and Energy storages
- Contribution to three cross-thematic calls on raw materials, ocean for tomorrow and bio-resource efficiency





Energy – Interest for Australia

- All topics open for Australia participation.
- Given the resources of the Pacific region, renewable energy resources may be an area of interest in which to promote greater participation in FP7. Also, cooperation could be promoted though regional initiatives which have European partners – such as CCS and the Coalition for Climate and Energy





Environment

- Three calls to be launched on 10 July:
 - Environment two-stage (€248 million)
 - Environment one-stage (€17 million)
 - Water innovation & demonstration (€40 million)

• Focus on :

- ENV.2013.6.1-1 Climate-related ocean processes and combined impacts of multiple stressors on the marine environment 9 mio
- ENV.2013.6.2-1 Water resources management under complex, multi-stressor conditions 9mio
- ENV.2013.6.2-2 Toxicants, environmental pollutants and land and water resources management 12mio
- ENV.2013.6.3-3 Contribution to the assessment of global water resources through the use of new Earth Observation datasets and techniques 9mio
- ENV.2013.6.3-1 Turning waste into a resource through innovative technologies, processes and services no info in the WP
- ENV.2013.6.2-3 Transition to sustainable, low carbon societies 3mio
- ENV.2013.6.2-8 'Sustainable management of Europe's deep sea and sub-sea floor resources (not counted since already included in Oceans of Future)
- ENV.2013.6.3-2 Eco-innovative demonstration projects no info in the WP
- Contribution to three cross-thematic calls on water, ocean for tomorrow and raw materials Research and Immovation



Environment

Focus on :

ENV.2013.6.5-2 Mobilising environmental knowledge for policy and society', sub-topic d) 'Raising societal awareness and tackling skill shortages on raw materials. 1mio ENV.2013.6.2-3 'Transition to sustainable, low carbon societies' 6 Mio ENV.2013.6.5-2 Mobilising environmental knowledge for policy and society', sub-topic e) 'Implications of socio-economic research on air pollution policy 1Mi ENV.2013.6.2-3 Transition to sustainable, low carbon societies 3 Mio ENV.2013.6.4-4 Towards stress tests for critical infrastructures against natural hazards 3 Mio ENV.2013.6.5-2 Mobilising environmental knowledge for policy and society', sub-topic a) 'Policy and economic implications of the post-2012 climate agreements. 6 Mio (one million per one proposal in each of the six subtopics) ENV.2013.6.1-4 Land cover and land-use change and climate change mitigation 6 Mio ENV.2013.6.2-6 Improved monitoring of the impact of cultivation on the environment using global Earth Observations 9 Mio ENV.2013.6.5-1 Accelerating progress towards the Green Economy', sub-topic c) 'Business practices for promoting the 'Green Economy' and sustainable production and consumption post Rio+20 1 Mio





Environment – Interest for Australia

- All topics open for Australia participation
- Topics of particular interest may include:
 - ENV.2013.6.5-4 Knowledge platforms, networking and uptake of research results for more strategic international R&I cooperation – FP7-ENV-2013one-stage
 - ENV.2013.6.2-6 'Improved monitoring of the impact of cultivation on the environment using global earth observations'
 - ENV.2013.6.3-5 'Contribution to the assessment of global water resources through the use of new earth observation datasets and techniques'
 - ENV.2013.6.4-3 'Coasts at threat in Europe: tsunamis and climate-related risks'
 - ENV.2013.6.5-1 'Accelerating progress towards the Green Economy'

Research and Innovation



Transport

- Five calls to be published on 10 July
 - ✓ Aeronautics And Air Transport (four calls $\sim \in 149$ million)
 - ✓ Sustainable Surface Transport (one call $\sim \in 111$ million)
- Strategic research and innovation priorities for 2013:
 - Aeronautics and Air Transport
 - Sustainable surface transport (including the 'European green cars initiative')
 - Horizontal activities
 - "Galileo" (Europe's initiative for a state-of-the-art global satellite navigation system)





Transport – Interest for Australia

- All topics open for Australia participation
- Themes of particular interest may include:
 - Road Safety and Security
 - Intermodal freight transport, e-logistics
 - Bio fuels for transport
 - Airports, navigation





Socio-Economic Sciences and the Humanities (SSH)

- Two calls- 10 July (€106 million): SSH-2013.7.1-1. Post-carbon cities in Europe: a longterm outlook- 2 Mio
- Four priorities for 2013 work programme:
 - Underpinning innovation for smart growth
 - Public sector reform and strengthening governance in the EU
 - Inclusive and sustainable growth
 - Support for developing the external policies of the European Union



SSH – Interest for Australia

- All topics open for Australia participation
- One topic calling for international cooperation which may be of potential interest include:
 - SSH.2013.2.1-3 The role of multinational companies in addressing global development challenges







- Calls in 2013 Opening 10 July (€ 126 million)
- Strategic research and innovation priorities for 2013:
 - Earth observation/GMES
 - Climate change monitoring from Space
 - Remote sensing methods and development of downstream services
 - Space science and technologies
 - Exploitation of space science and exploration data
 - research preparing for space exploration
 - Space-weather
 - Security of space assets
 - Cross-cutting activities
 - SME relevant research
 - International cooperation with third countries

Research and Innovation



Space interest for Australia

- All topics open for participation from Australia
- Themes of particular interest may include:

– Earth observation

Research and Innovation





- One call 10 July (€298 million)
- Seven activity areas:
 - Security of citizens
 - Security of infrastructures and utilities
 - Intelligent surveillance and border security
 - Restoring security and safety in case of crisis
 - Security systems integration, interconnectivity and interoperability
 - Security and society
 - Security research coordination and structuring





Security Interest for Australia

- All topics open for participation from Australia
- One topic of potential interest, all of which call for international cooperation, include:
 - SEC-2013.2.4-1. Phase II demonstration programme on logistics and supply chain security
 - SEC-2013.2.4-2 Non-military protection measures for merchant shipping against Piracy
 - SEC-2013.5.3-2 Testing the interoperability of maritime surveillance systems Pre-Operation Validation





FP7 "Capacities" Specific Programme

- For memory, the seven components of Capacities programme are the following:
- Research infrastructures
- •Research for the benefit of SMEs
- Regions of knowledge
- Research potential of Convergence Regions
- •Science in society
- •Support to the coherent development of research policies
- International cooperation



Research Infrastructures

- One call 10 July (€39 million)
- Main lines of action:
 - Focus on the support of the next phase of development of research and education networks in Europe (GÉANT), one of the main pillars of the online European Research Area

Research and Innovation



Research Infrastructures – Interest for Australia

- All topics open for Australia participation
- The international dimension of GÉANT will be encouraged, in particular by:
 - ✓ ensuring global connectivity and interoperability,
 - ✓ developing an open, virtualised and multi-domain tested facility and expanding it globally.





Science in Society

- One call 10 July (€63 million)
- Focus on enabling responsible research and innovation (RRI) in the European Research Area
- All topics open for participation of Australia





International Cooperation

- One major call- 10 July (€41 million)
- Focus on:
 - Bi-regional coordination of S&T cooperation including priority setting and definition of S&T cooperation policies (FP7-INCO-2013-1, INCO-NET)
 - Bilateral coordination for the enhancement and development of S&T Partnerships (FP7-INCO-2013-2, BILAT)
 - Supporting the coordination of national policies and activities of Member States and/or Associated States on international S&T cooperation (FP7-INCO-2013-3, ERA-NET /ERA-NET PLUS)
 - Supporting the trans-national activities of International Cooperation NCPs (FP7-INCO-2013-4, INCO-NCP)
 - Reinforcing cooperation with European Neighbourhood Policy countries on bridging the gap between research and innovation (FP7-INCO-2013-9, R2I-ENP)



FP7 "People" Specific Programme

Research and Innovation





- Eleven calls, issued 10 July 13 March total budget €973 million
- Most Marie Curie Fellowships open to Australia
 researchers
- The World Fellowship calls will be of particular interest to Australia:
 - IOF March 2013 43,50 million
 - IIF March 2013 43,50 million
 - IRSES March 2013 30 million





Marie Curie World Fellowships – Interest for Australia

- Topics of particular interest may include:
 - **IOF:** International Outgoing Fellowships
 - **IIF:** International Incoming Fellowships
 - **ITN:** Initial Training Network
 - **IAPP:** Industry-Academia Partnership and Pathways





FP7 "Ideas" Specific Programme

Research and Innovation



Ideas Programme

- Applications can be made in any field of research particular emphasis on the frontiers of science, scholarship and engineering
- All calls open to researchers of any nationality who intend to establish and conduct partly their research activity in any EU Member State or FP7 associated country
- Starting Grants call 10 July €398 million
- Advanced Investigator Grants call November €662 million