The contribution of water for development research to poverty reduction and economic development

Introduction
Research is a key driver in fostering economic growth and reducing poverty. Research into water for development can contribute to achieving the Millennium Development Goals. However, SPLASH has shown that research is often not sufficiently focused on developing countries, which holds back their national development. SPLASH has also demonstrated the role of research to national welfare by more clearly defining its contribution to economic growth and poverty reduction and the benefits of making research more responsive to the needs and priorities of developing country governments. This fact sheet highlights the main results of this.

The purpose
SPLASH demonstrates the positive contribution of water research to poverty reduction and economic development. Examples illustrate that each research activity has the potential to contribute to the advancement of national development, e.g. technological innovations in the water supply and sanitation sector, such as rainwater harvesting systems, can improve the social and economic welfare of the local population. Research results can help to convince policy makers of possible future actions, which can also act as a catalyst for others to foster research activities.

Headline facts

• Research and Development (R&D) is important for advancing national welfare, and has been shown to have a significant impact on economic development.

• Water and the economy are inextricably linked. Economic returns on R&D are often much higher than the initial levels of investment needed. For example, the estimated level of annual funding needed to meet the MDGs on water supply and sanitation is USD 11.3 billion. This compares to the total accrued economic benefit projected at USD 84 billion, which represents a seven-fold return.

• Many developing countries have recognized the importance of research. This can be demonstrated by Poverty Reduction Strategy Papers (PRSP), where research is often mentioned as a strategy to promote growth and reduce poverty. International platforms exist, such as the African Ministerial Council on Science and Technology (AMCOST), which aim to develop policies and set priorities on science, technology and innovation for African development. African countries also have a target of spending 1% of GDP on R&D by 2010 (endorsed at the Khartoum Summit in 2006).
Governments can play an essential role in supporting research, by recognising its contribution to economic growth and poverty reduction and providing an enabling environment for research to be undertaken.

Key references


Recommendations
Based on this study, certain recommendations are made for policy makers:

• To be effective and to address the gap between developed and developing countries, R&D must be part of any national innovation system. Setting realistic incentives for research engagement and publishing are ways in which progress can be made towards this. Maintaining active linkages and communication between policy makers and researchers and other actors such as intermediaries (NGOs or coordinating institutions) can help to promote demands for new research, thereby providing sustainable and practical research solutions.

• UNESCO Director-General Koïchiro Matsuura stated that most African countries will need to make major new investments if the target of spending 1% of GDP on R&D is to be met (UNESCO, 2007). Policy makers therefore have to reconsider their priorities to foster research investment in the health or water sector over military spending. National funding to support local researchers should also be increased, with funding schemes making it obligatory to engage national researchers.

Further information
This is one of a series of SPLASH fact sheets available on the SPLASH website www.splash-era.net

If you would like to receive the quarterly SPLASH newsletter ‘Making a SPLASH’, please contact era-net@dfid.gov.uk

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