

Interdisciplinary 'clusters' to promote research at a young university

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The university

- ✓ **National University of Science & Technology-
NUST, Bulawayo, ZW**
- ✓ **Established in 1994- functioning campus 2000**
- ✓ **Six faculties- Applied Science, Commerce, Built
environment, Medicine, Industrial Technology**
- ✓ **Many staff still pursuing PhD**



Faculties at NUST

Applied Science

*Biochemistry, Chemistry, Computer Science,
Maths, Physics, Sports Science, Env Sci & Health,
Forestry & Wildlife*

Built Environment

Architecture, Quantity Surveying, Landscaping

Commerce

*Banking, Finance, Economics, Accounting,
Actuarial Science*



Faculties at NUST

Communications & Information Science

Publishing, Journalism, Media Studies

Industrial Technology

*Textile Tech, Ind Eng, Civil & Water Eng
Technical Teacher Education*

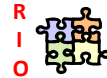
Medicine

Basic, Social Clinical



Problems and challenges

- ✓ Resources needed
- ✓ Poorly networked nationally, regionally and internationally
- ✓ Research not co-ordinated
- ✓ Mentors unavailable
- ✓ Poor library facilities
- ✓ Poor internet (power cuts)



Research activity

- ✓ Individual
- ✓ Sporadic
- ✓ Predominantly limited to 'desk' research
- ✓ Limited by infrastructural constraints e.g. labs equipment
- ✓ Significant projects supported by external grants



NUST intervention

Establishment of Research & Innovation Office

- in 2006
- real activity from Feb 2009
- in the Office of the VC
- Director, Res Officer, Res Administrator



RIO Interventions

Creation of 'research clusters'

- informal groupings
- 'senior academic' is 'cluster leader'
- multidisciplinary in expertise
- voluntary
- multiple 'membership'



Cluster titles

Gender Issues

Environmental Management

HIV/AIDS

Sustainable urban Development

Indigenous knowledge systems

SMEs

Renewable energy

Climate change



NUST



Cluster formations e.g.

Cluster title

Faculties

**Alternative energy
resources**

Ind Tech +AppSci +Comm

SMEs

**Commerce, Built Env,
App Sci, Ind Tech**



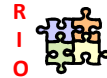
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Cluster activities

Monthly 'unsupervised' meetings with set agenda

- ✓ Report on new literature
- ✓ Report back from conferences/meetings
- ✓ Identification of possible new projects/activity
- ✓ Upcoming new calls for funding
- ✓ Possible future conference attendance
- ✓ Possible membership of scholarly societies



Achievements

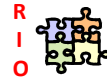
Minor but early stages

- ✓ Submitted 5 applications to DELPHI (??0??)
- ✓ Established 'teams' for future activity
- ✓ Developing a new 'research culture'
- ✓ Preparation for new funding calls



Future 'interventions'

- ✓ Training seminars
 - Proposal/manuscript writing
 - Networking skills
 - Conference preparations (poster/oral)
- ✓ Hosting of conferences
- ✓ Acquiring 'individual' small grants (IFS/TWAS)
- ✓ Results dissemination



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Thank you

For your time and attention

