

Institutional Research and Academic Planning in the Context of Higher Education Steering Instruments

1

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BACKGROUND

- Institutional research (IR) informs academic planning, arguably more routinely since the legislative changes that followed South Africa becoming a democracy in 1994.
- Steering mechanisms: *planning, funding and quality* necessitate the collection and analysis of data at a national level (Bunting *et al.*, 2010; Lange *et al.*, 2013).
- IR Offices became the custodians of centralised data to support academic planning processes.

BACKGROUND

- Institutional research has been defined in many different ways; Saupe (1981, 1990) defines it as “research conducted within an institution of higher education in order to provide information which supports institutional planning, policy formulation, and decision making” (Terenzini, 1993: 2).
- Globalisation has led institutional researchers to expand on this definition to include policy and positioning of institutions to create viable, sustainable higher education institutions (HEIs) (Caleron & Mathies, 2013).

STEERING INSTRUMENTS

4

Steering in many countries is accomplished through a 'multi-level multi-actor' system of governance; (Bailey, 2014).

Steering instruments take different forms at various levels– e.g. linked through the Programme and Qualification Mix (PQM).

Private HEIs do not have government funding or PQMs, but must follow the Programme Accreditation process and provide evidence of resources and quality management processes.

STEERING INSTRUMENTS

- Evidence to support the accreditation of programmes is based on data from the HEI's management information systems and benchmarking (Lange *et al.*, 2013).
- NQF and HEQF compliance for qualifications.
- Benchmarking exercises are a requirement.
- How institutions perform relative to national planning targets and their own goals requires institutional research that goes beyond national reporting requirements.

RESEARCH PROBLEM

- Global shifts have necessitated the analysis of data to support decision making.
- Seymour (2002) argues that fragmentation in planning, research to support planning and programme review is detrimental to an institution.
- The challenge for IR is to shift from generating reporting data to the application in the planning and decision making process (Toma 2008), of which academic planning is part.

RESEARCH DESIGN

7

Research Aim

- To investigate the extent to which shifts in institutional research impact on academic planning decision-making.

Research Question

- To what extent, if any, have institutional researchers shifted from generating reporting data to using such data in the academic planning decision-making process?

RESEARCH DESIGN

- A Qualitative research approach informs the survey design.
- A Questionnaire was used to collect data.
- Data analysis was undertaken using ATLAS.ti.
- A thematic analysis was undertaken to elicit trends.

SAMPLE

- Sample selection involved South and Southern African HEIs that were represented on the 2014 SAAIR database of members.
- A non-probability sampling strategy (Roberts-Holmes, 2011; Creswell, 2012) using a combination of purposive and convenience sampling was used to select Southern African institutions in Botswana and Namibia as well as public and private institutions in South Africa.

SAMPLE

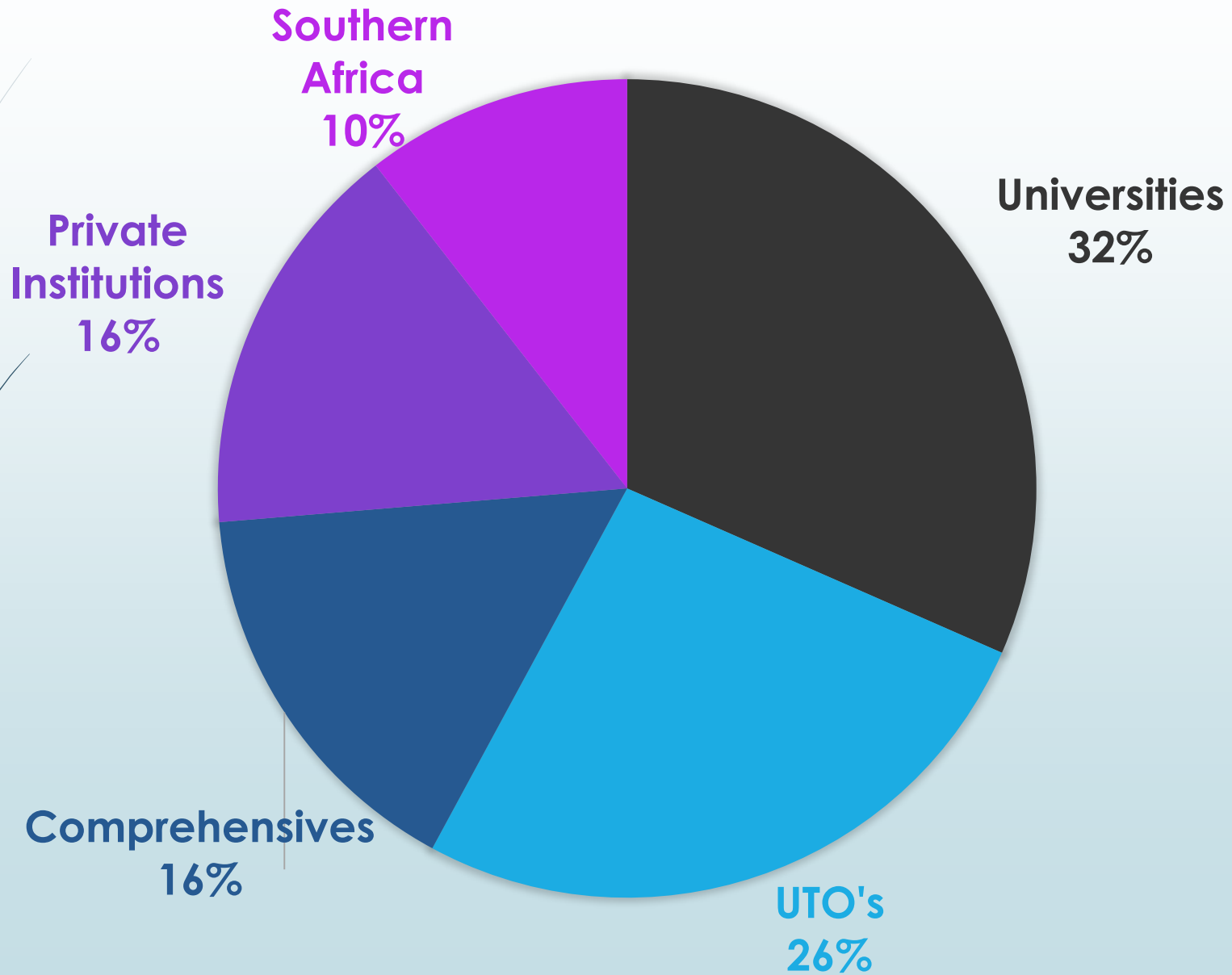
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The sample consisted of:

- Directors of Institutional Research
- Institutional Researchers from:
 - Universities,
 - Universities of Technology,
 - Comprehensive Universities,
 - Universities from Botswana & Namibia

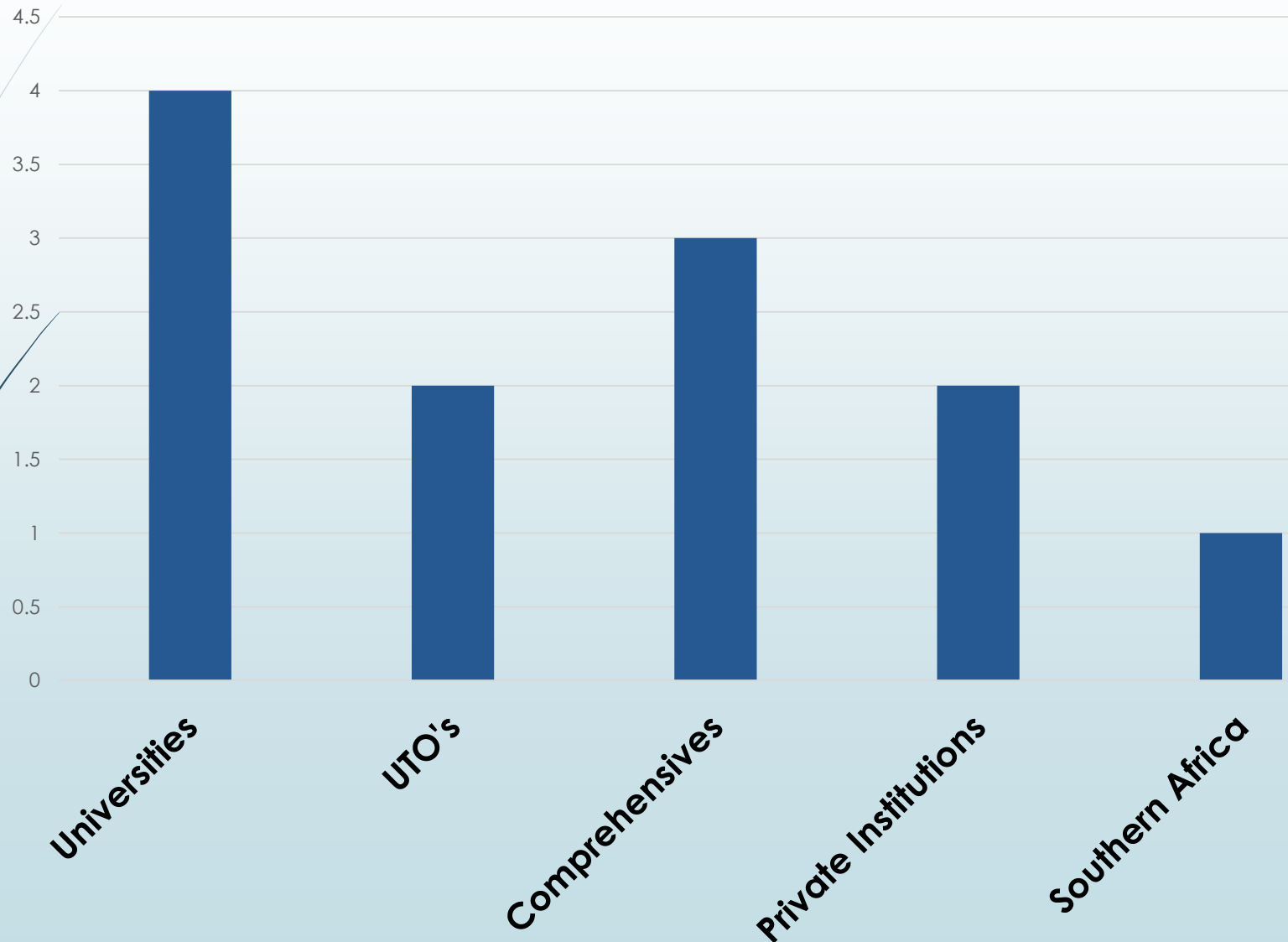
SAMPLE

11



SAMPLE

Response by Institutional Type



ACADEMIC PLANNING (AP)

The “*process of assisting academics when developing **new programmes***” emerged as the central focus within definitions.

- Contextual definitions
- However, no single, agreed-upon definition that *delimits* AP at Institutions in South and Southern Africa.

ACADEMIC PLANNING (AP)

- Enrolment planning & management,
- PQM,
- Programme development, approval, review, quality assurance & benchmarking,
- Course material reviews,
- Oversight of professional board requirements,
- Planning for academic structures,
- Staff recruitment,
- Performance indicators
- Alignment of resource allocation
- Research & community engagement projects

ACADEMIC PLANNING (AP)

Comprehensive universities and private institutions included:

- course budgeting,
 - provision for *life-long learning*
 - market research on community and industry needs.
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- AP within the context of this study encompasses *the provision of and resource allocation for all the activities that support the academic endeavours of an institution.*

STRUCTURES MAKING AP DECISIONS

Programme level decisions

(includes decisions regarding new programme/module approvals and revisions to existing programmes/modules):

- All institutions have committee-based decision-making
- These committees are staffed by academics, and managers/ leaders.

INSTITUTIONAL RESEARCH (IR)

- Contextual definitions of IR differed by institution (as with AP).
- Both quantitative and qualitative IR is undertaken
- Definitions included both an internal support focus as well as a national reporting focus.
- In the absence of any definition of IR, the caveat existed that institutional research was being conducted e.g.

“any data analysis done by staff or students that leads to actionable information (or “business intelligence”) for decision-making or self-insight, could potentially be classified as ‘institutional research’.” (University)

IR DEFINITIONS

“Research conducted internally to the university designed to support decision making, monitoring of interventions and to the critical appraisal of the state of the University in relation to its strategic objectives and priorities. Institutional research is fundamentally an investigation of how change takes place at the university.” [University]

“...foundation and rationale for all decisions and actions aimed at realizing the core-business of the university.” [Comprehensive]

“a management function that provides strategic information for evidence-based planning and programming, monitoring and evaluation” [Southern African University]

IR DEFINITION

19

Some institutions highlighted:

- course fee analysis,
- enrolment management,
- research studies,
- the critical appraisal of the state of the University in relation to its strategic objectives and priorities in order to investigate how change takes place at the University

INSTITUTIONAL RESEARCH (IR)

Functions performed included to:

- Manage student data
- *Analyse, interpret and report information within the changing Higher Education landscape.*
- The policy development aspect of IR was highlighted by only one university.
- Several institutions emphasised the *ad-hoc* use of IR:

“I consider all attempts towards better understanding of the dynamics within the institution as institutional research albeit, some are not formally constituted.” [UOT 2]

INSTITUTIONAL RESEARCH (IR)

21

External Reporting Function of IR

- National reporting
- Focus on issues, trends and patterns in the HE System.

INSTITUTIONAL RESEARCH (IR)

Internal Reporting Function emphasised:

- The collection, analysis, interpretation and dissemination of information to support decision making at various levels of the institution,
- Monitoring of interventions,
- Institutional planning,
- Scenario-building,
- Data on programmes offered,
- Research on applications,
- Policy development and decision making.

IR SUPPORT OF AP DECISIONS

Areas: IR supports academic planning decision-making in the areas of:

- a) Management information & transformation
- b) Monitoring and evaluation and
- c) Quality advancement

Production & analysis: IR support in most institutions includes the production *and* the analysis of data, though data analysis/interpretation is done at many levels, e.g. by IR and AP staff and by academics

IR SUPPORT OF AP DECISIONS

a) Management Information & Transformation aspect of AP

Support is provided by producing data on various functions:

Institutional Level	Programme Level
Institutional profile	Needs analyses of national skills gaps
Pocket stats	Market research
Alumni data basis	Enrolment planning
Library procurement	national/ international trends in enrolment
PQM	Costing and budgeting for course design
Timetables	Benchmarking for programme approval
Press releases (Marketing)	Programme reviews
Enrolment	Enrolment targeting & management
Throughput and retention studies	
Financial modelling and analysis	
Billing and accounts	
Graduation ceremonies	
Space planning	
Triangulation of data	
Disciplinary processes	
Student recruitment (Feeder schools, applications, offers accepted/ declined, returning students)	
Student profiles based needs analysis	
Student oriented improvements	
Management of academic entities (e.g. staffing etc.)	

IR SUPPORT OF AP DECISIONS

26

b) Monitoring and Evaluation

- Meeting institutional academic goals
- Environmental scanning
- Student evaluations of modules
- Internal satisfaction & other surveys
- Studies on issues e.g. the effectiveness of the NBT
- Student or graduate surveys
- Monitoring lecturers (qualifications, nationality, gender, workload load planning)
- Support for teaching and learning – Pedagogy

IR SUPPORT OF AP DECISIONS

27

c) Quality Advancement

- Analysis of data: course/ programme review
- Student evaluations of tutors (face-to-face tutors, e-tutors)
- Retention and attrition rates; top achievers; examination committees; awarding of bursaries; throughput rate; programme profitability.
- School data – number of students, demographics; nationality; country of origin;
- External evaluation processes and benchmarking visits often inform decision-making or stimulate new ideas. [University]

EFFECTIVENESS OF SUPPORT FOR AP

- A few institutional researchers reported adequate support for AP decision-making especially programme needs.
- The perception exists that research projects have been instructive and well received by decision-makers.

EFFECTIVENESS OF SUPPORT FOR AP

29

- Admission and enrolment data,
- Student profile data (student retention, pass rates and throughput data),
- Courses enrolment figures,
- Curriculum information,
- Impact studies,
- Course fees,
- Course costing,
- Financial provision for staffing,
- Learning material development,
- Infrastructure,
- IT and technical equipment,
- Research expenditure,
- Planned infrastructure development,
- Student employment after graduation

IR SUPPORT FOR INSTITUTIONAL GOALS

Alignment to Institutional Goals involves:

- Ongoing environmental scanning
- “Monitoring of progress towards meeting institutional academic goals” including student success.
- Student evaluations
- Some institutions conduct market needs analyses and market research.
- Some evidence provided of student and graduate surveys.

IR SUPPORT FOR NATIONAL PRIORITIES

Alignment to National Priorities

“Support for national goals and national priorities is very important in terms of new programmes and the gaps in our existing suite.”

- The institutional vision and strategies are closely aligned with the National Development Plan.
- Needs analyses of national skills gaps (PQM, National Skills Priorities) provides support for meeting national priorities.
- Strategic management indicators are aligned to the mission and vision and allow national and international benchmarking.

CHALLENGES

Capacity Challenges:

- Capacity to provide information and analysed data to manage and monitor institutional goals and make strategic evidence-based decisions,
- Insufficient staff, limited financial resources, high workload for both academic and support staff, external paperwork and timelines,
- Limited capacity to undertake Employer surveys,
- Graduate surveys and tracking are undertaken but are “imperfect” or not undertaken at all,
- Conducting market research is challenging,

CHALLENGES

Alignment Challenges:

- Alignment with the National Development Plan is “a challenge for our academic staff”,
- Alignment in understanding between academic and sales/marketing staff of programmes offered,
- Ineffective and insufficient co-ordination of IR support for academic planning,

CHALLENGES

Data Challenges:

- Uneven shifts experienced in generating data for academic planning decision-making purposes,
- The major gaps in the provisions of data are between AP, HR, Finance and Estate Planning,
- IR mainly focuses on the generation of data,
- Data for Module Evaluations,
- Absence of a dashboard,
- Limitations on providing information on current and future challenges as well as areas of improvement,

CHALLENGES

General Challenges:

- Uncritical acceptance of proposals,
- The link between success in programmes and employability is challenging for lifelong learning programmes,
- Feedback on follow-up from reports is lacking,
- Impact studies are not conducted,
- Impact of IR support not yet established,

CHALLENGES

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SHIFTS IN REPORTING DATA

- Automation of reports
- *Information & interpretation of data for decision making*
- *Emergence of impact studies*
- *Accessibility of data for AP and decision making*
- *Structural shifts to facilitate evidence based planning*
- *“IR has shifted towards student success analyses.”*
[University 4]
- Due to staff capacity constraints, *“...the new reporting regulations have turned the tide back to generating reporting data.”* [University 1]

GOOD PRACTICE

- **Commitment to continuous improvement**

- Modules are updated annually
- Scholarly research
- Emergence of impact studies

- **Dashboards for Programme Planning**

“The Office has just developed, ..., another system of “Academic size and shape models” (there are three models - a Forecasting Model, an Affordability Model, and an Academic Planning Model) ...to provide academic leadership with dashboards to assess the strategic and financial viability of their faculties/ schools/ departments/ programmes.” [Compr 1]

- **Core Statistics** on enrolment and pass rates
- **Automated reports**
- **Shifts in reporting to support AP decision making**

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THANK YOU!

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