



Bayero
University
Kano

RESEARCH POLICY

Directorate of Research, Innovation and Partnership (DRIP)

BAYERO UNIVERSITY, KANO

(Office of the Vice-Chancellor)

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Table of Contents

Preface

1. INTRODUCTION	4
1.1 Preamble	6
1.2 Mission Statement	6
1.3 Philosophy and Principles of the Research Policy	6
1.4 Rationale of the Policy	6
1.5 Research Focus	7
1.6 Scope of the Research Policy	8
1.7 Research Directorate	8
2. STRUCTURE AND FUNCTIONS OF DIRECTORATE OF RESEARCH, INNOVATION AND PARTNERSHIP	9
2.1 Structure	9
2.2 Functions of DRIP	9
2.3 The Functions of the Division of Research and Publications	9
2.4 The Functions of the Division of Innovation and Technology Incubation	9
2.5 The Functions of the Division of Partnership	10
2.6 Board of Research, Innovation and Partnership	10
2.7 Membership of the Board	11
2.8 Functions of the BRIP	11
2.9 Tenure of membership of the Board	12
2.10 College/Centre/Faculty/Institute/ School Research Committees	12
2.11 Membership of College/Centre/ Faculty/Institute/ School Research Committees	12
2.12 Departmental Research Committee	12
2.13 Membership of Departmental Research Committee	12
3. RESEARCH DEVELOPMENT, INVENTION AND INNOVATION	13
3.1 Preamble	13
3.2 Research Development	13
3.3 Invention	13
3.4 Innovation	13
3.5 Commercialisation/Marketing of Research and Innovations	13
3.6 Challenges	13
3.7 Managing the Commercialisation Process	14
4. FUNDING AND FINANCIAL MANAGEMENT	15
4.1 Funding	15
4.2 Financial Management	15
4.3 Accountability and Transparency	16

5. RESEARCH ETHICS AND INTEGRITY	17
5.1 Research Ethics	17
5.2 Ethical approval is required when/if a research involves the following	17
5.2 Research on Human Subjects	18
5.3 Research involving Animals	18
5.4 Hazardous Agents	18
5.5 Biomedical and Health Related Researches	19
5.6 Integrity	19
5.7 Ownership	19
5.8 Research Misconduct	19
5.9 Committee of Enquiry	20
5.10 Enquiry	20
5.11 Inquiry	20
6. RESEARCH PARTNERSHIP	22
6.1 Research and Partnership	22
6.2 Medium Term Approaches to Knowledge Transfer	22
6.3 Long Term Plans for Knowledge Transfer	23
7. RESEARCH SUPPORT SERVICES	24
7.1 Scope of Research Support	24
7.2 Information-based Research Support Services	24
7.3 Facility-Based Research Support Services	24
8. RESEARCH TRAINING AND MONITORING	25
8.1 Research Training	25
8.2 Training Workshops	25
9. MONITORING AND EVALUATION	26
9.1 Monitoring and Evaluation	26
9.2 Guidelines	26
10. PROCEDURE AND PUBLICITY	27
10.1 Degree and Non-Degree Oriented Research Procedure	27
10.2 Leadership and Supervision of Researches	27
10.3 Research Dissemination and Publication	27
10.4 Research Handling and Record Keeping	27

Research has been recognised as one of the fundamental activities carried out by universities around the globe. Research is the tool used to create and disseminate knowledge necessary for technological and industrial development of a nation. Recognition of this fact was partly responsible for the establishment and development of research universities in Europe and the United States. The passage of the Bayh Dole Act, in the 1980s, accompanied by the corresponding increase in research output in the United States facilitated the proliferation of research universities around the world.

Bayero University Kano claims to be an emerging research university in Nigeria based on the the following reasons: a) the mission statement of the university has been modified to focus on research and knowledge transfer, b) the Directorate of Research, Innovation and Partnership (DRIP) has been established as a unit responsible for coordinating and managing all aspects of research in the university c) Research, Authorship, and Intellectual Property Policies have been developed to guide and regulate research-related matters in the university, and d) the university focuses on training its academic and research staff as well as postgraduate students on how to responsible research. According to the modified mission statement, Bayero University is committed to addressing African developmental challenges through cutting-edge research, knowledge transfer and training of high quality graduates. DRIP has developed the current Research Policy with the view to developing guidelines, for academic, research (including students) and administrative staff, necessary for achieving the mission of the university.

The Research Policy is a concise but comprehensive manual that provides practical guidelines on research management and administration. Section One presents the need for the policy in Bayero University. The rationale and philosophy of the policy as well as the priority research focus of the university have been clearly spelt out. Section Two gives an overview of the structure and functions of the DRIP. The composition and functions of the Board of Research, Innovation and Partnership (BRIP), which serves as the governing body of DRIP, are, also, presented. While Section Three presents research development, Section Four deals with issues relating to research funding and financial management. Section Five presents guidelines on responsible conduct of research in the university. All researches activities must be conducted in accordance with this policy as well as relevant national, professional and international ethics. Guidelines on handling suspected research misconduct are, also, provided. While Section Six presents guidelines on collaborations in research and knowledge/technology transfer, Section Seven explains the types of research support services to be provided in the university. Section Eight presents guidelines on training and retraining of researchers as well as mentoring of junior colleagues and students in the university. Section Nine explains the strategy for monitoring and evaluating the performance and efficacy of research management and administration in the university. Section Ten is dedicated research documentation and publicity. This is crucial as it can

create awareness of the research initiatives and breakthroughs, thereby enhancing visibility and image of the university.

Bayero University employees (including visiting scholars), students and partners are expected to conduct research activities in accordance with the current Research Policy. This will, certainly, lead to increased visibility and impact of the researchers, in particular, and the university as a whole.

I wish to acknowledge the contributions of Prof. Sagir Adamu Abbas (the pioneer Director, DRIP) for setting a solid foundation in the Directorate. The DRIP success story will not be complete without Prof. Murtala Sabo Sagagi and Prof. Abdulrazak Habib for their contribution in developing the first draft of the Research Policy. I, also, appreciate the contributions of Prof. Abdullahi Sule-Kano (current Director), Dr. Umar Ibrahim Gaya (former Deputy Director, Research), Prof. Rabi'u Sani Shatsari (Deputy Director, Partnerships), Prof. Abdullahi Hassan Kawo (Deputy Director, Innovation) and Prof. Ibrahim Ahmad Rufai (current Deputy Director, Research) for revising and editing the document to its present form.

Professor Muhammad Yahuza Bello, FNMS
Vice Chancellor, Bayero University, Kano

1. INTRODUCTION

1.1 Preamble

Creation and application of new knowledge is the primary force that drives socio-economic development around the world. This explains why leading universities pay greater attention to maintaining a balance between teaching and research.

One of the major preoccupations of Bayero University apart from teaching is research. The University recognises the importance of formulating this research policy to help guide staff and students towards advancement of research and innovation. The University aspires to be among the top research institution in the world.

This policy document is a paradigm shift towards high impact research, innovation, knowledge sharing and partnership. It provides guidance, procedures and general information for conducting research at the University. The thrust of the policy is to provide a framework and support systems that would enable scholars to develop competencies and advance their career, enhance community services and improve the strategic standing of Bayero University.

This policy indicates commitment by Bayero University, to encourage and support meaningful research endeavours to address national and international contemporary issues and challenges. The policy places greater attention to collaborative knowledge creation, networking and knowledge transfer.

It should be noted that this policy document only complements, but not substitutes, existing laws and academic/professional guidelines regulating the conduct of research and the dissemination /commercialisation of research outputs. The policy is designed to ensure compliance to the best ethical standards on research conduct and reporting as well as maintaining prudence in financial management.

1.2 Mission Statement

Bayero University is committed to addressing African developmental challenges through cutting-edge research, knowledge transfer and training of high quality graduates.

1.3 Philosophy and Principles of the Research Policy

The philosophical underpinning of the University Research Policy is to create a research environment conducive for staff and students to constantly engage in productive research with high potential for promoting societal development. All researchers shall adhere to the principles of excellence, integrity, honesty, and openness as well as transparency and accountability.

1.4 Rationale of the Policy

This policy is conceived based on the premise that:

- i. universities are important centres in national, regional and global knowledge structures;
- ii. the knowledge structure determines, to a large extent, the level of development of a nation or region;

- iii. new knowledge is created through high impact research;
- iv. research takes place not in “ivory tower” but through a complex of relationships among Universities, other collaborating institutions, communities and the private sector; and
- v. a deliberate policy guideline and leadership are critical ingredients to creating and sustaining credible research, innovation and partnerships.

1.5 Research Focus

To retain and advance its position as citadel of learning, Bayero University shall ensure that knowledge generated is effectively transferred for the advancement of mankind. The university community shall pursue teaching; research and knowledge transfer in a focused and balanced manner.

Academic staff shall be encouraged to carry out research individually as well as in groups, or in collaboration with other academic staff/resource persons within and outside Nigeria.

The following areas/disciplines represent the major thrust/direction of this University: -

- i. Agriculture
- ii. Arts
- iii. Communications
- iv. Education
- v. Environment
- vi. Humanities
- vii. Law
- viii. Life and Medical Sciences
- ix. Natural Sciences
- x. Religious Studies
- xi. Social Sciences
- xii. Management Sciences
- xiii. Mathematics
- xiv. Engineering
- xv. Technology

In view of the global dynamics, the University shall encourage meaningful interdisciplinary and multidisciplinary research effort and collaboration in the following priority areas:-

- i. Food Security, Poverty, Livelihood and Sustainable Development
- ii. Health Care Delivery
- iii. Energy Studies and Environmental Management
- iv. Venture Creation and Entrepreneurship
- v. Language, Religion and Social Reorientation
- vi. Legal and Governance Systems
- vii. Technology Development and Deployment

1.6 Scope of the Research Policy

The Bayero University Policy on Research is a code of practice for all those undertaking research in the university on behalf of the University, in the premises of the University, or using the University facilities/infrastructure. The persons or group of people covered in this policy include but not limited to students, visiting scholars, professors, academic staff not up to the rank of a Professor, Associates, Honorary or Clinical contractors and Consultants.

1.7 Research Directorate

The Directorate of Research, Innovation and Partnership (DRIP) is created to achieve the following objectives:

- a. to promote high-impact and focused research in evolving thematic areas to transform the University into a credible knowledge-hub of international standing;
- b. to establish a mechanism for technology/knowledge transfer and product development with the aim of generating spin-offs and Intellectual Property (IP) rights to make research truly functional;
- c. to act as a link with national and international organisations/institutions and establish a data bank for all partnerships and externally funded research and development project to ensure effective coordination;
- d. to be a repository of resources by establishing a database that will collate, collect, store, process and disseminate information on research, publications, innovation and networks for the benefit of the University community and others;
- e. to coordinate all aspect of research, innovation and critical partnerships and advise Senate and the Management on priorities, resources and other related issues in order to ensure effective monitoring, evaluation and feedback; and
- f. to coordinate research fellowship/post-doctoral fellowship in the university.

2. STRUCTURE AND FUNCTIONS OF DIRECTORATE OF RESEARCH, INNOVATION AND PARTNERSHIP

2.1 Structure

The Directorate, headed by a Director, has three divisions each headed by a deputy director as follows:

- a) Division of Research and Publications,
- b) Division of Innovations and Incubation of Technology,
- c) Division of Partnerships.

2.2 Functions of DRIP

The following are the functions of DRIP:

- a) defining the research focus of the University in different disciplines;
- b) initiating and supporting degree and non-degree research endeavours;
- c) sourcing and management of research funds;
- d) provision of guidelines and facilities for researchers;
- e) patenting and keeping of copyrights; and
- f) commercialisation/marketing of research output.

2.3 The Functions of the Division of Research and Publications

The following are the functions of the Division of Research and Publications:

- a) to oversee the implementation of the University's research policy framework and guide towards generating new knowledge in the thematic areas identified in this policy;
- b) to strengthen general research activities of the University by providing benchmarks, training of academic and non – academic staff as the case may be;
- c) to provide a climate for collaborative and interdisciplinary high-impact researches;
- d) to support indexed publications among staff and upgrade local publications outlets for international listings and indexing;
- e) to vet and recommend to the Vice-Chancellor applications for research grants from the University research funds;
- f) to act as clearing house for, and disseminator of, information on research issues and activities in the University; and
- g) to facilitate the publications of research outputs.

2.4 The Functions of the Division of Innovation and Technology Incubation

The following are the functions of the Division of Innovation and Technology Incubation:

- a) to identify researches and projects across the University that demonstrate clear economic, commercial, or social value;
- b) to stimulate technology incubation of new inventions;

- c) to identify potential users (inventors, industry, government and entrepreneurs) of University's research outputs with the aim of knowledge transfer/sharing;
- d) to facilitate the creation of new techniques, technologies, products, new businesses and generating licenses and consultancy emanating from the University's original research projects;
- e) to provide technical and logistic support in the thematic and non-thematic research areas to generate Intellectual Property (IPs) rights;
- f) to provide incentives and challenge the faculties, departments and centres to generate IPs from their original research works and showcase all the IPs generated locally and internationally;
- g) To develop the capacity of researchers/research groups in IP generating researches;
- h) To create a stock of commercially viable knowledge-based product for the University;
- i) To attract contract research between the University and corporations, governments and others; and
- j) To organise periodically an exhibition of Research output from the University.

2.5 The Functions of the Division of Partnership

The functions of the Division of Partnership are:

- a) to improve the position of the University in the global knowledge production/supply-chain networks;
- b) to coordinate partnership entered with other institutions, organisations and individuals;
- c) serve as a one-stop-shop for information, logistics, funding and support for all partnerships and networks locally and internationally;
- d) ensure the execution of the deliverables and terms of all linkages, partnership and externally generated funding;
- e) identify mutually beneficial partnership and ensure the sustainability of existing networks; and
- f) to continually follow-up on all partnerships and ensure that they are mutually beneficial.

2.6 Board of Research, Innovation and Partnership

The Board of Research, Innovation and Partnership (BRIP), shall be the governing body of the Directorate, and is responsible to the Vice-Chancellor (as shown in Figure 1) and Senate for the regulation of research activities in the University. The Boardz shall provide guidelines relating to research work, innovation and collaboration.



Figure 1: Organizational Structure of BRIP

2.7 Membership of the Board

The membership of the board of Directorate of Research, Innovation and Partnership shall include the following:

- a) Director, Directorate of Research, Innovation and Partnership (Chairman);
- b) The three Deputy Directors of DRIP;
- c) Deans representing each of the faculties in the University;
- d) One Member representing each of the research institutes, directorates and centres (the person so selected must not be below the rank of a Senior Lecturer);
- e) Two Professors elected by Senate as its representatives;
- f) Dean, School of Postgraduate Studies;
- g) Director of Academic Planning ; and
- h) Secretary, Directorate of Research, Innovation and Partnership.

2.8 Functions of the BRIP

The Board is a policy making organ and shall perform the following functions:

- a) scrutinise all research proposals-degree and non-degree oriented and ensure that such proposals conform with the University research policy and guidelines;
- b) approve/disapprove research proposals as well as the quantum of funding and recommendations to the Vice-Chancellor;
- c) advise the Vice-Chancellor/Senate on research activities, innovation and partnership in the University;
- d) recommend to the senate, revised University policy or guidelines on the conduct of research, innovation and partnership from time to time.
- e) consider Research Progress reports from researchers and approve release of funds to researchers; and
- f) oversee the implementation of the University Research, Innovation and Partnership Policy and submit an annual report to the Vice-Chancellor.

2.9 Tenure of membership of the Board

Membership of the Board shall be for a period of two years renewable once only.

2.10 College/Centre/Faculty/Institute/ School Research Committees

Colleges, Centres, Faculties, Institute and Schools in the University shall have respective research committees which reports to the DRIP Board. The committee shall:

- a) receive applications for support/funding from prospective researchers in the departments together with research proposals;
- b) assess applications/proposals and send its recommendations to the DRIP Board;
- c) keep records of Unit/Faculty researches, funding and copyrights;
- d) keep updates of profiles of researchers.
- e) submit up to date records of reputable publication channels and citations for staff to the DRIP; and
- f) submit quarterly reports of research activities to the DRIP Board.

2.11 Membership of College/Centre/ Faculty/Institute/School Research Committees

The College/Centre/Faculty/Institute/ School Research Committees shall comprise the following:

- a) the Provost, Dean or Director of the relevant unit acts as Chairman;
- b) all Heads of Department in the relevant unit;
- c) faculty Research officer (with a PhD and should not be below the rank of Senior Lecturer); and
- d) all Professors and Associate Professors in the relevant unit.

2.12 Departmental Research Committee

There shall be in each department of the University a departmental research committee. The committee shall:

- a) receive applications for support/funding from prospective researchers in the department and outside the department;
- b) assess applications/proposals and send its recommendations to the faculty research committee;
- c) keep record of the departmental researches, funding and copyrights;
- d) update and appraise profiles of researchers in the department; and
- e) submit up to date record of reputable publication channels and citations of staff in the department to the faculty research committee.

2.13 Membership of Departmental Research Committee

The membership of Departmental Research Committee comprises the following:

- a) the Head of Department as Chairman ;
- b) departmental Research officer (with a PhD and not below the rank of Senior lecturer);
- c) all Professors and Associate Professors in the Department;
- d) all lecturers in the department involved in research supervision at PG level (Provided they are not registered students).

3. RESEARCH DEVELOPMENT, INVENTION AND INNOVATION

3.1 Preamble

Research may be exploited and commercialised to contribute towards national interest and development. Bayero University, its staff/students or other parties shall comply with relevant contractual agreements and conditions for full utilisation and commercialisation of research output. These are hereby defined and stated as follows:

3.2 Research Development

Bayero University is committed to the highest scientific and ethical standards in research and development. It seeks to promote inventive and innovative research that will lead to practicable and applicable results.

3.3 Invention

The University shall promote new ideas and practices that lead to creation of new processes, systems, technologies, products and methods.

3.4 Innovation

The University shall promote the implementation of new or significantly improved products and processes, marketing methods, business practices or external relations. Innovation shall be integrated into teaching in the relevant fields and an attempt shall be made to ensure the commercialisation of appropriate innovations coming from such researches.

3.5 Commercialisation/Marketing of Research and Innovations

Bayero University Shall provide an enabling environment that will encourage rapid progression of discoveries “From Laboratory to Marketplace.” This will generate revenue for the University, and foster job creation.

3.6 Challenges

The University is committed to resolving the binding constraints to the effective commercialisation of its discoveries. In the past, technologies developed by the public research institutions were not matched with the commercialisation process for these reasons:

- a) the public laboratory's primary mission may be focused on basic research, not development of products in general;
- b) the research may be directed at technologies, which must be developed regardless of cost-effectiveness, and market needs;
- c) the technologies involved are intended for specific missions that represent public

needs rather than market needs; and

d) most of the researchers do not have market experience.

Bayero University shall undertake a sustained re-orientation and re-education of its community in order to overcome these challenges.

3.7 Managing the Commercialisation Process

Bayero University shall aim to create incubation centres and spin-offs that will facilitate the transfer of knowledge and bridge the gap between the University and the industry.

4. FUNDING AND FINANCIAL MANAGEMENT

4.1 Funding

To ensure relevance and integration with the immediate and wider society, research activities shall be carried out largely through funds from government, individuals, industries and organisations outside the university, within and outside the country. The university shall be committed to the following:

- a) set aside at least 5% of its annual Internally Generated Development Fund (IGDF) as research funds. Such funds shall be kept in the University Research Account;
- b) DRIP shall keep a register of all research funders and regularly update the register;
- c) list of all potential funders including call for research proposals for support, which shall be kept by DRIP and shared with the University community; and
- d) Faculties/Colleges/Centres/Directorates/Departments shall set aside 10% of funds generated from professional/commercial programmes for research activities. Such funds shall be deposited in the University Research Account.

4.2 Financial Management

Bayero University shall deploy research funds/grants in a manner that is consistent with its general financial regulations. All funds received and disbursed must be recorded and audited to ensure probity and accountability.

The university shall ensure that the funds are efficiently utilised to produce the expected outcome from the grants. To ensure effective management of funds, the following conditions apply:

- a) Research Finance officer (RFO) in the DRIP office is to maintain accounts of inflow and outflow of funds;
- b) the RFO shall be a qualified accountant and shall be assisted by other relevant professionals in funds administration;
- c) the University Audit Unit shall verify all expenses arising from the research funds;
- d) detailed financial statement of all grants must be tabled and discussed at the Board of DRIP at the end of the accounting year or at agreed intervals;
- e) a comprehensive report on research grants shall be submitted to the Vice-Chancellor;
- f) progress and Annual audited financial reports shall be prepared by DRIP and sent to all external funding agencies;
- g) researchers shall have reasonable cost estimates in their proposals and the estimates shall be within the limit allowed under government and University rules and regulations;
- h) expenditure of research funds shall be subject to the approval by DRIP and any other funding agency in line of the terms and conditions of the grant;
- i) recipients of research grant shall, at the end of the research, report on both the findings of the research and the financial aspect of it;
- j) recipients of research grant shall open a personal research grant account to be

monitored from time to time by DRIP; and

- k) failure to present expenditure report to the DRIP within 60 days after the completion of any research could constitute research misconduct and shall be so treated.

4.3 Accountability and Transparency

Bayero University is committed to transparency and accountability in research undertakings and the following guidelines shall apply:

- i. all financial transactions shall be carried out within the framework of the University's financial regulations and the conditions under which the grants were made;
- ii. all funds spent must be fully receipted and accounted for by the researcher/grantee/(s);
- iii. Internal/External auditors may be engaged by the University to audit research funds disbursed and utilised by researchers and the DRIP;
- iv. all research processes and procedures employed by the researchers must honestly be disclosed, and the conclusion(s) truly be drawn from the data analysed or examined; and
- v. all equipment used in research must be accounted for.

5.1 Research Ethics

Bayero University is committed to the highest standard of ethical, scientific and scholarly practice and compliance with the requirements for the receipt of funds from agencies for the purpose of research. All researches carried out by staff, students or any person under the University must be safe, ethical and must conform to the guidelines on the use of human subjects, animals, and biohazardous agents.

5.2 Ethical approval is required when/if a research involves the following:

- I. Collection of personal and/or sensitive information via questionnaires or interviews (written, audio and video). An information is classified as sensitive when it relates to research participant's:
 - a) physical or mental health condition;
 - b) political opinions;
 - c) religious beliefs or other beliefs of a similar nature;
 - d) ethnic or racial origin;
 - e) membership of a trade union;
 - f) sexual life;
 - g) the commission or alleged commission by him/her of any offence;
 - h) any proceedings for any offence committed or alleged to have been committed by him/her, the disposal of such proceedings or the sentence of any court in such proceedings.
- ii. vulnerable groups such as children and young people under the age of 18 years old and those with a learning disability or cognitive impairment, or individuals in a dependent or unequal relationship;
- iii. taking samples or measurements or administration of substances to healthy adult human participants;
- iv. participants with medical conditions;
- v. deception or carrying out the study without participants' full and informed consent;
- vi. research protocols that use the following subjects/materials:
 - a. animal products such as bone material, organ samples, skin, fur etc;
 - b. animal or plant;
 - c. biological materials (from any product derived from plants or animals);
 - d. chemicals;
 - e. human tissue or embryos;
 - f. genetically modified organisms (GMOs);
 - g. human participants or data (including clinical drug trials);
 - h. equipment, devices and pressure vessels;
 - i. radiation or radioactive substances (ionising or non-ionising).

Furthermore, Bayero University, research policy on ethics covers the following areas:

5.2 Research on Human Subjects

Researches involving human subjects as participants or informants carried out by the staff and students of the University must satisfy the following conditions:

- i. the research participant or informant must willingly consent to the research after understanding the aim, its possible implications and risk following full briefing by researchers;
- ii. all data obtained from the informants or human subjects must be kept confidential and their anonymity must be maintained if required;
- iii. the researcher(s) shall refrain from asking insulting or embarrassing questions. Confidential matters that could place the informant in an embarrassing or compromising position are to be handled carefully;
- iv. there shall be openness in the use of monitoring devices, such as recorders and cameras and the use of such devices shall be with the consent of the informant;
- v. for research protocols involving human subjects, a researcher must ensure that risks are minimised for participants and that the issue of compensation for research-induced injury is addressed. Where possible, the researcher should ensure that participants benefit from the research outcome;
- vi. approval must be obtained from the Directorate of Research, Innovations and partnerships for all researches involving human subject before commencement;
- vii. researcher(s) potential conflict of interest must be avoided and disclosed; and
- viii. all other safety standards involving the use of microorganisms, bio-chemicals, genetic materials, radiation and chemicals on human subject must be met.

5.3 Research involving Animals

The following regulations on animals shall be followed:

- i. all relevant international standards on human care and use of laboratory animals must be complied with in researches involving animals;
- ii. disposal of dead animals or their tissue must be in compliance with relevant health and safety regulations;
- iii. all individuals involved in the care and use of laboratory animals should strictly abide by the applicable laws and regulations pertaining to animal care and use;
- iv. the personnel actively engaged with research on animals must be screened annually for relevant transmittable diseases such as tuberculosis, and Ebola, must attend training specified for the prevention of transmission of such diseases and injury to the species; and
- v. the animal housing area, i.e. animal house, must be equipped with safety kits and be well maintained.

5.4 Hazardous Agents

Hazardous agents here mean all chemicals, biological materials, radiations and generally modified substances capable of causing harm to an individual or society. The following

shall be taken into account when handling hazardous agents:

- i. all appropriate safety guidelines and regulations in the acquisition, use, storage and disposal of biohazardous agents must be followed; and
- ii. there should be regular training in the safe handling and management of hazardous agents in researches.

5.5 Biomedical and Health Related Researches

Any research project involving human subjects, animals or bio-safety matters will obtain ethical and/or biosafety approval from DRIP. Appropriate relevant approvals shall also be obtained from the state, Federal or traditional authorities. These include:

- a. human Subject- DRIP and Institutional review boards with mandate and/ or oversight at the research locations; and
- b. materials Transfer Agreement (MTA) may be needed before the transfer of study samples (biological and human samples or even data) between researchers within or outside the country or between University researchers and their collaborators in the industry.

5.6 Integrity

Researchers in Bayero University should demonstrate high sense of integrity in all aspects of their research, such as budgeting in research proposals; prudence in procuring of research facilities; avoiding at all cost fabrication, falsification and plagiarism in reporting research results or writing research reports.

Researcher(s) shall adequately and accurately record all research procedures, observations and results, regardless of whether or not the research value or import is apparent. These shall be maintained for at least five years.

5.7 Ownership

All data, notebooks, and research products resulting from the University sponsored research are the property of the University.

5.8 Research Misconduct

Research Misconduct is any behaviour that improperly appropriates the intellectual property or contributions of others, and impedes the progress of research, or compromises the integrity of research practices. Such behaviour is unethical and unacceptable in proposing, conducting or reporting research, or in reviewing the proposals or research reports of others.

The following constitute research misconduct:

- a. **Fabrication of Data:** A researcher shall not claim data where none has been obtained;
- b. **Falsification of Data:** A researcher shall not falsify data, including changing records;
- c. **Interference:** A researcher shall not without authorisation take, sequester or

materially damage any research-related material of another researcher, including the apparatus, reagents, biological materials, writings, data, hardware, software or any other substance or device used or produced in the conduct of research;

- d. **Infringements** of the University's policies governing research practice; and
- e. **Misrepresentation:** A researcher shall not conceal or disregard the truth in the form of:
 - i. Stating or presenting falsehood;
 - ii. Omitting a fact so that what is stated or presented states or presents a material of significant falsehood;
- f. **Misappropriation:** A researcher shall not: Plagiarise – (the presentation of the documented ideas, words or creation of another person as his or her own, without attribution appropriate for the medium of presentation). Plagiarism may include:
 - i. reproducing, paraphrasing or summarising, without acknowledgement, any work of another person to portray the work as a researcher's own work;
 - ii. making use of any information in breach of confidentiality, including those associated with the review of any manuscript or grant application; and
 - iii. omitting reference to the relevant published work of others for the purpose of inferring personal discovery of new information;
 - iv. misleading ascription of authorship: A researcher or reviewer shall not ascribe authorship misleadingly, including the listing of authors, breaching the moral rights of authors, attributing work to others who have not contributed to the research, and failing to acknowledge appropriately works primarily produced by a research student/trainee or associate.

5.9 Committee of Enquiry

When there is an allegation of research misconduct, the Director DRIP may set up a committee of enquiry and/or inquiry.

5.10 Enquiry

An enquiry is an information gathering process to determine whether an allegation of research misconduct has substance. It is a request for truth of information. It usually determines whether or not a formal investigation is necessary. In the event of an enquiry, the allegations labelled against the accused individual(s) shall be appropriately communicated to him/her/them and be invited to comment on the accusation. The accused individual(s) shall cooperate fully with the research misconduct committee. The committee of enquiry shall complete its assignment and submit its report to DRIP within 21 days.

5.11 Inquiry

- a) If the enquiry concludes that the allegation of misconduct has substance, then an inquiry (investigation) committee shall be set up by DRIP and formal investigation shall begin within 3 weeks (21 days) of the completion of the enquiry;

- b) the purpose of an inquiry is to determine whether research misconduct has occurred and, if so by whom and to what extent;
- c) the accused individual(s) shall be given fair hearing by being informed about the allegations and be given an opportunity to defend themselves;
- d) a case of research misconduct will be established whenever it is committed, and the allegation proven.
- e) the identity of both the accused individuals and those that reported the alleged misconduct shall be kept confidential as much as possible and care should be taken to protect their positions and reputations.
- f) all those directly involved in the misconduct proceedings shall ensure confidentiality of the process and that information obtained during its course is not disseminated to unauthorised person(s);
- g) if the act of research misconduct is proven by the inquiry; any university staff or student involved shall be referred to the senior staff Disciplinary and appeals committee or Student's Disciplinary Committee as the case may be. Other persons involved not in the categories mentioned above shall be handed over to the police; and
- h) if the individual(s) is/are found not to have engaged in any research misconduct, all reasonable, practical and appropriate measures to protect and restore his/her/their reputations and integrity shall be undertaken.

6. RESEARCH PARTNERSHIP

6.1 Research and Partnership

The University shall endeavour to advance its strategic standing by building mutually beneficial partnership with academic and other relevant institutions within and outside Nigeria. In doing so Bayero University shall partner with relevant institutions to organise key research posts and international partnership/exchange of critical know-how for research and development based on international understanding of research and innovation.

In order to focus on strand of Partnerships and networking, the University shall work in harmony with the following stakeholders:

- a) Higher Education Institutions
- b) Employer Organisations
- c) Small and Medium Enterprises
- d) Big corporations
- e) Social and Community Organisations including NGOs, CBOs, FBOs
- f) Government
- g) International Organisations

The Research and Partnership Units of DRIP shall coordinate all kinds of academic partnerships and linkages and offer a platform for exploring areas of cooperation.

6.2 Medium Term Approaches to Knowledge Transfer

Bayero University aspires to share/transfer its research findings and new innovations using one or combination of the approaches below:

- a. **Spin-offs:** the University will place special attention on new ventures created from licensing or permission for the use of its intellectual property;
- b. **Start-ups:** Bayero University shall use its technology/business incubators and collaboration to form viable start-ups as part of revenue generation drive of the University. The companies can be wholly owned or partially owned by the University.
- c. **Licensing:** In some cases the University may enter into licensing with interested investors to develop products or services emanating from the research and innovations of the University;
- d. **Contract research:** University Researchers shall be encouraged to engage in applied research from specific field of knowledge with private corporations under agreed terms;
- e. **Consulting:** The University's expertise will be open to the government and other sectors under agreed terms.
- f. **Graduate and Researcher Mobility:** The University shall intensify its efforts to produce graduates with relevant skills and competencies to drive positive change in the society; and

- g. **Field Work:** Academic Departments should intensify engagements with communities in the catchment area of the University to ensure dissemination of relevant research findings for appropriate impact at the community level.

6.3 Long Term Plans for Knowledge Transfer

The University will try to advance its strategic goal of transferring/sharing knowledge to the society using one or a combination of the following:

- i. technology brokers;
- ii. science parks;
- iii. technology networks;
- iv. venture capital funds;
- v. cluster initiatives;
- vi. intensive community engagement; and
- vii. infusion of findings into teaching.

7. RESEARCH SUPPORT SERVICES

7.1 Scope of Research Support

The University recognises the need to create an enabling environment for research activities to flourish; hence the need to provide a well coordinated research support service to researchers at the level of departments, faculties, colleges and centres in the University.

DRIP shall provide Research Support services as follows:

- i. information-based Research Support Services; and
- ii. facility-based Research Support Services.

7.2 Information-based Research Support Services

The University considers providing holistic support as very important in enhancing research performance. It therefore, recognizes 8 key areas of support that can be provided to researchers and to departments and units within the University. The University shall: -

- i. enhance channels for access and opportunity to research information resources;
- ii. provide a platform for securing funding;
- iii. strengthen collaboration networks;
- iv. provide training support for all researchers;
- v. provide administrative, Financial, and managerial advisory services;
- vi. create a platform for dissemination of research output;
- vii. sustain an efficient institutional management of research by keeping information on researches and researchers; and
- viii. collaborate with the University Library in sourcing and providing information services on up to date scholarly literature for use by researchers.

7.3 Facility-Based Research Support Services

In order to promote high quality research and attract both young and experienced researchers, effective and efficient research facilities are required. The University shall upgrade and maintain its physical and social infrastructure necessary for undertaking productive research.

DRIP shall provide support to researchers in terms of advice and facility availability, quality, access and utilization.

8. RESEARCH TRAINING AND MENTORING

8.1 Research Training

The University shall ensure regular and effective training of its staff and students in research as a vital part of the University's strategic plan. The training shall involve grooming the young academics into the research culture of the University by empowering them in research methodology, use of computers and internet resources to enable them carry out research effectively for higher degrees (Masters and PhD) in their relevant disciplines. The senior academics shall enjoy research-retraining activities especially in new or emerging research concepts, paradigms and methodologies including ICT applications.

The Directorate of Research, Innovation and Partnership, (DRIP) shall be strengthened to provide such services. Postgraduate Research candidates shall have the opportunity for effective training on research during course work and from faculty based research seminars.

8.2 Training Workshops

DRIP in consultation with Deans, Directors, and Heads of Department shall:

- i. have regular workshops to train staff on all aspects of research;
- ii. such training workshop shall, apart from improving research skills of the participants, include preparation of grant winning proposals;
- iii. the workshops organised by DRIP shall be at the level of faculties, colleges, centres and directorates;
- iv. DRIP shall make use of resource persons within and outside the University;
- v. the proceedings of the workshop shall be published and distributed to faculty members; and
- vi. the University may also sponsor academic staff, especially staff from DRIP to other training workshops on capacity building in research, organised by other institutions or professional bodies and organisations within and outside Nigeria.

9.1 Monitoring and Evaluation

The Directorate of Research, Innovation and Partnership shall be:

- a) responsible for monitoring and evaluation of Research in the University;
- b) ensure that the dynamic nature of global research is followed and maintained;
- c) develop appropriate Monitoring and Evaluation (M&E) tools for assessing research activities in the University;
- d) regularly update (M&E) tools for performance appraisal mechanisms and review the policy document from time to time; and
- e) ensure reporting of progress in the management and administration of research in the University.

9.2 Guidelines

The Directorate of Research, Innovation and Partnership shall carry out all these responsibilities in accordance with the following guidelines:

- i. measure the results/impact of researches carried out in the University;
- ii. identify, recognise and recommend to the University to reward the best researchers through any of the following;
 - a. Promotion
 - b. Incentives (material, monetary etc.)
 - c. Recognition
 - d. Merit Award
- iii. collect progress reports, annually/periodically, in order to effectively monitor all ongoing researches;
- iv. document research accomplishments and compliance with the terms and conditions of research grants as well as problems encountered by researchers;
- v. prepare, produce and update research performance statistics containing list of researchers, grants, contract, publications and patents as a report to the Senate of the University;
- vi. send all research proposals for blind peer review in order to ensure originality and quality in researches;
- vii. Continuously carry out evaluation and impact assessment of the outcome of researches in respect of:
 - a. accomplishment of the goals and objectives of the research;
 - b. impact on the society for example attitudinal change, policy change legislations and the environment; and
 - c. contribution to knowledge.

10. PROCEDURE AND PUBLICITY

10.1 Degree and Non-Degree Oriented Research Procedure

Research proposals emanating from outside the university may be supported by the University under the following conditions:

- i. that a staff of Bayero University is the principal collaborator;
- ii. that the research proposal is assessed by DRIP and is found worthwhile;
- iii. that the interest of the Bayero University is adequately protected; and
- iv. that the research conforms to the general guidelines governing the conduct of research in the University.

All proposals for non-degree researches shall be accompanied with a clear timeline for the completion of such researches. All non-degree researches must conform to the general provisions contained in the University research policy handbook.

10.2 Leadership and Supervision of Researches

The following conditions apply with regards to leadership and supervision of research in the University:

- i. Degree oriented researches shall be under the guidance and supervision of competent supervisor(s). The supervisors shall have the technical skills and competence to supervise the research work and his/her/their appointment must follow existing SPS guidelines; and
- ii. Non-degree oriented research shall be under the leadership of a Principal Researcher/Investigator who is to serve as the link between the researchers, funding agency and the DRIP.

10.3 Research Dissemination and Publication

The Directorate of Research, Innovation and Partnerships (DRIP) shall periodically:

- i. publish a research report bulletin which would keep the University community and the wider society informed about on-going research, progress in researches and breakthroughs;
- ii. use the mass media, especially radio and television to reach out to a larger number of stakeholders outside the University in order to:
 - a) mobilise support for research activities
 - b) engage the society in a constant research dialogue
- iii. publish research results in relevant and outstanding journals or books by reputable world class publishers;
- iv. DRIP shall be prominently hosted on the University website; and
- v. researchers shall be encouraged to present their research findings to the University community or general public through the 'University Lecture Series' or through the 'Public Lecture Series'.

10.4 Research Handling and Record Keeping

In research handling and record keeping the following guidelines shall be followed:

- I. data and research reports must conform to the ethics and integrity provisions of the research policy;

- ii. DRIP shall have rights and responsibility along with the researcher or principal researcher (in case of collaborative research) for data access and record management;
- iii. DRIP shall keep research data archives consisting of, but not limited to, e-prints, laboratory notes, images data and reports;
- iv. DRIP shall keep database of researches and researchers, including research linkages.

