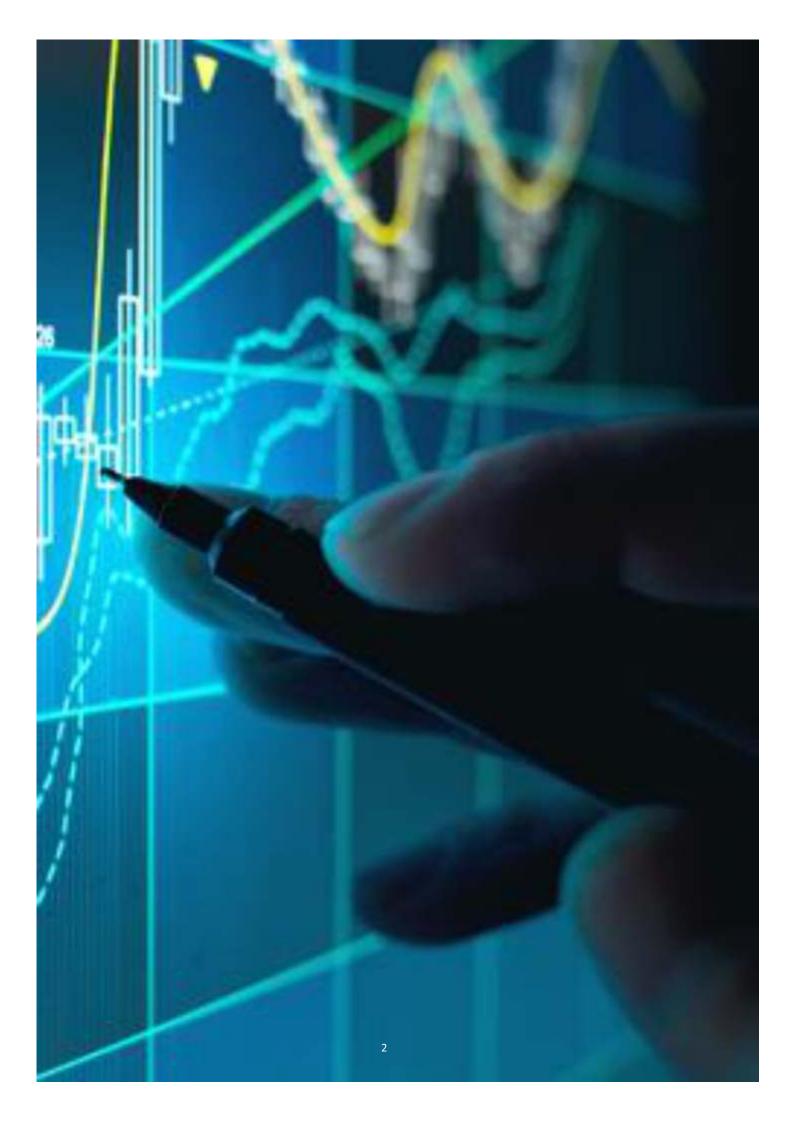
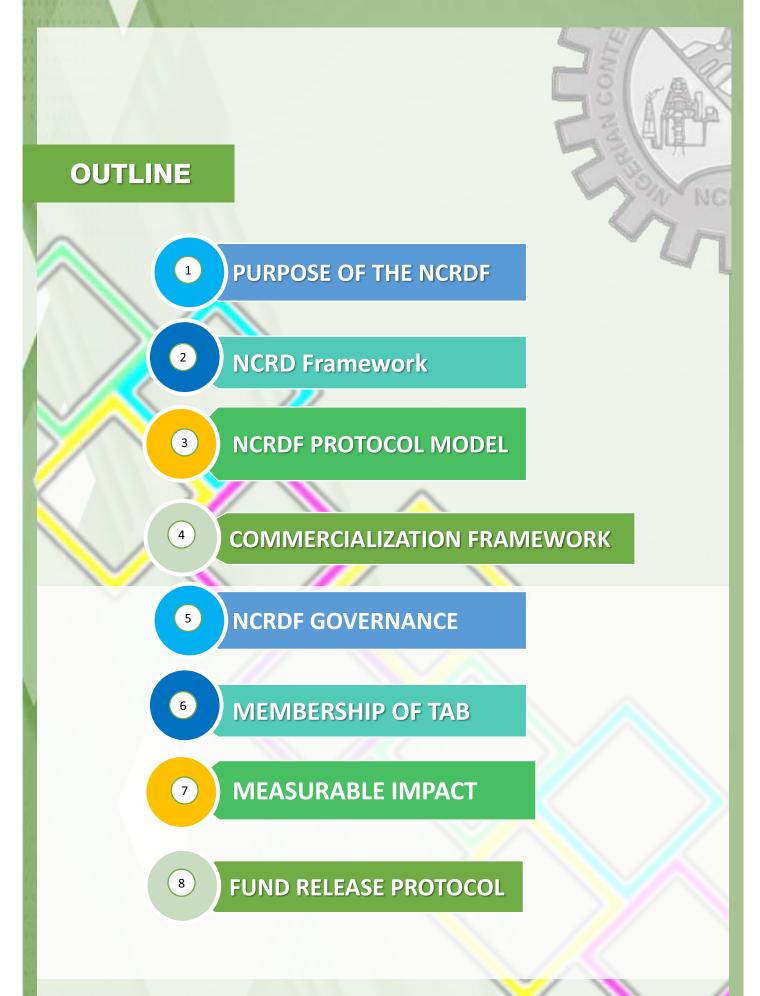




NIGERIAN CONTENT RESEARCH AND DEVELOPMENT FUND (NGRDF) OPERATING PROTOCOL

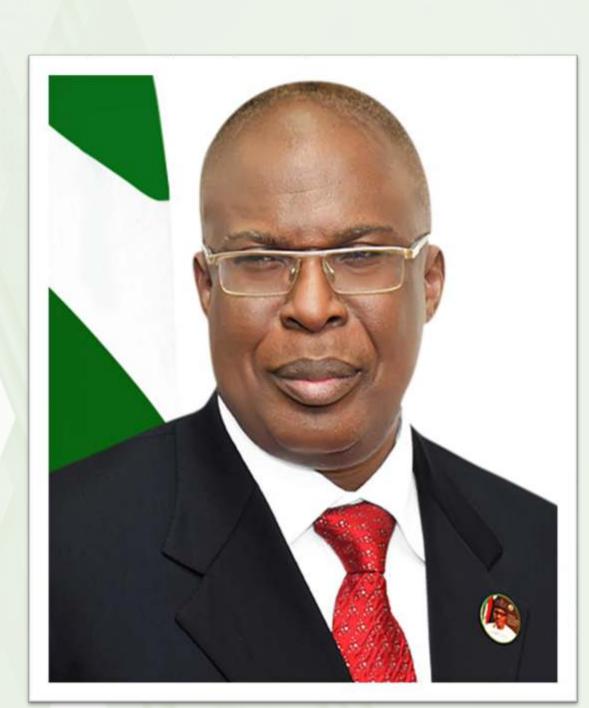






His Excellency President Muhammadu Buhari

President and Commander-in-Chief Federal Republic of Nigeria



His Excellency Chief Timipre Sylva Honourable Minister of State For Petroleum Resources



Engr. Simbi Wabote, FNSE, FIPS

Executive Secretary NCDMB



Mr. Patrick Daziba Obah Director, Planning, Research and Statistics (PRS)



Mr. Akintunde Adelana Director, Monitoring & Evaluation



Mr. Isaac Yalah Director, Finance and Personnel Management



Barr. Muhammed Umar Director, Legal Services



Mr. Abdulmalik Hatilu General Manager, Research Statistics and Development Division

Nigerian Content Development and Monitoring Board NCRDF Operating Protocol

Published by

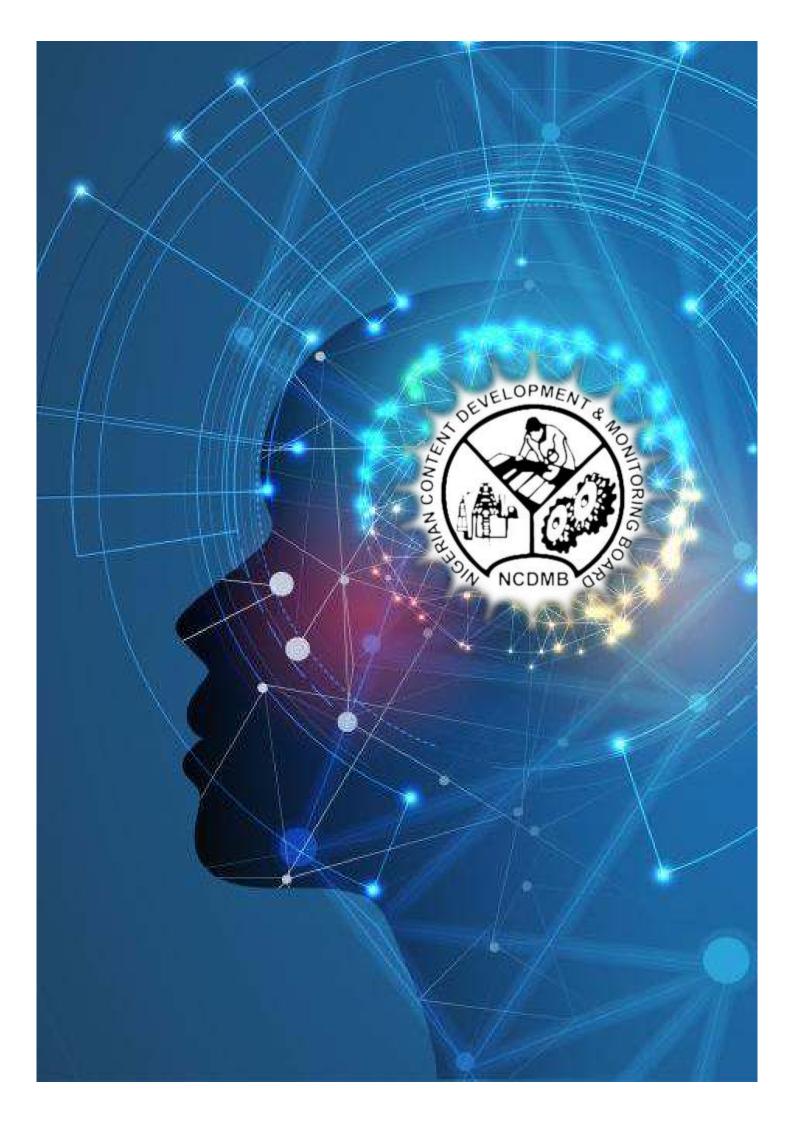
Directorate of Planning, Research and Statistics Nigerian Content Development and Monitoring Board

2021

© Copyright of NCDMB

Concept Abdulmalik Halilu

Coordination Jonathan Njoku



Nigerian Content Research and Development Framework

Background

The Nigerian Oil and Gas Industry Content Development (NOGICD) Act of 2010 establishing the Nigerian Content Development and Monitoring Board (NCDMB) outlines the Board's regulatory role in the development of local capacity and capability for Research and Development (R&D) in the Nigerian Oil and Gas industry. Sections 37 to 39 of the NOGICD Act mandate NCDMB to superintend over R&D activities in the oil and gas industry. The scope of the Board's regulatory role includes:

- i. Develop capabilities for Research and Innovation in Nigeria including facilities, equipment, personnel and processes.
- ii. Review and approve R&D plans of Operating Companies.
- iii. Monitor implementation of R&D projects to ensure:
 - a. Execution reflects Nigerian content requirement of domiciliation within Nigerian R&D Centers.
 - b. R&D spend is tied to addressing industry technology, material and process challenges.
 - c. Commercialization of research breakthroughs.
 - d. Deployment of successful products of research in industry Operations.

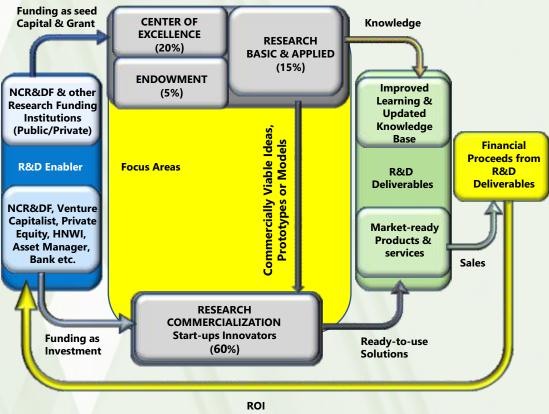
To achieve its mandate, NCDMB has developed the R&D framework anchored on seven (7) policy thrust:

- 1. Focus on market-driven research.
- 2. Establish world class Research and Development (R&D) Centers of Excellence
- 3. Establish Research and Development Council.
- 4. Provide sustainable funding to support Research and Development.
- 5. Develop stakeholder collaboration matrix for Research and Development (R&D).
- 6. Provide enablers for commercialization of research breakthrough.
- 7. Facilitate acceptance and utilization of products of research by end users.

OPERATING MODEL FOR NIGERIAN CONTENT RESEARCH AND DEVELOPMENT FUND (NCRDF)

A \$50 Million NCRDF has been created to drive NCDMB'S INTERVENTION IN R&D.

- 1. Strategic enabler for home grown technology development.
- 2. Position NCDMB as a leader in structured funding for Research.
- 3. Four (4) focus areas Research studies, commercialization of Research, establishment of Centers Of Excellence (CoE) and endowment of Professorial Chair.
- 4. Involves multiple stakeholders with deep knowledge of Research for development.
- 5. Potential to attract co-funding from venture capitalist and foundations to support indigenous technology development.
- 6. KPIs set to ensure utilization is outcome-focused.



Operating Model for NCRDF

Research Commercialization Framework

A Framework for commercialization of Research with high market proposals has been developed to drive NCDMB's intervention in commercialization of Research

Product validation

- 1. Validate product characteristics along end user needs
- 2. Publish breakthrough
- 3. Patent breakthrough (Local/international)

Product deployment

- 1. Vendor registration with end users
- 2. Facilitate access to market
- 3. Procurement process & deployment
- 4. Product Lifecycle Mgt
- 5. End user post deployment survey
- 6. Regulatory Approval
- 7. Business Matching with MNC and market globally

Business Development

Product

development cycle development

Prototype

- Develop model
 Validate product characteristics along end user needs
- 1. Hydro-pneumatic generator 2. Pyrolysis of plastic waste to petroleum products

Field trial

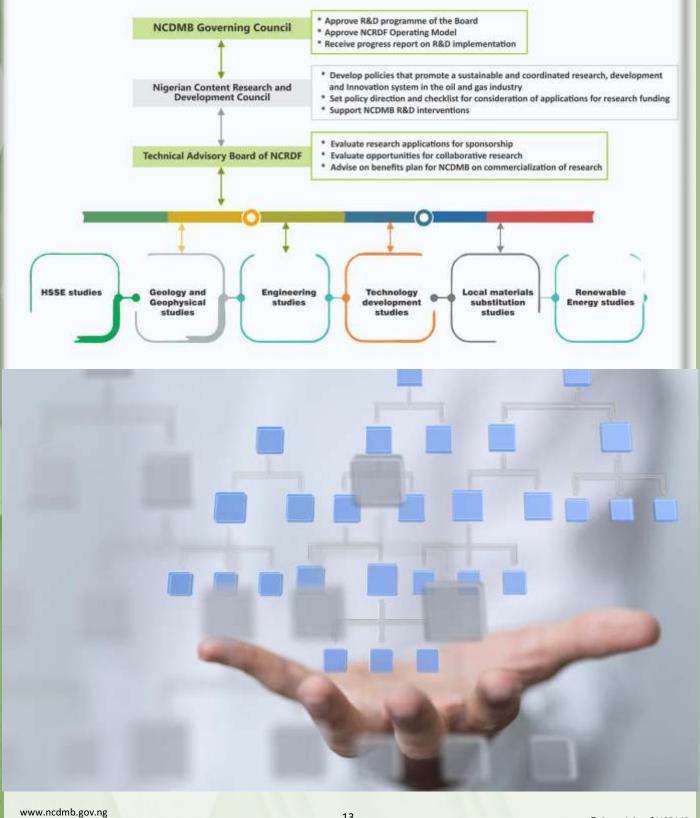
 On site trial (uncontrolled environment test)
 Validate product performance along end user needs

Solpawa bioremediation product

- 1. Business case, feasibility study and incentives
- 2. Branding and marketing
- 3. Access to market
- 4. Facility development
- 5. Training/technology transfer
- 6. Certifications facility, process and product

Framework aligned to API process for approval of new technology

NCRDF GOVERNANCE STRUCTURE



A CONTRACT



A Technical Advisory Board has been Inaugurated to ensure transparent evaluation of proposals for research funding

Membership of TAB

S/NO	ORGANIZATION	NAME	POSITION
1.	NCDMB	Mr. Patrick Daziba Obah	Chairman
2	NCDMB	Mr. Abdulmalik Halilu	Alternate Chairman
3	NCDMB	Mr. Ofili Obinna	Member
4	NNPC Group	Engr. Sugungu Mustafa Magaji	Member
5	DPR	Engr. Musa J. G	Member
6	Petroleum Training Institute	Dr. (Mrs) Sarah Atedubie	Member
7	OPTS	Mr. ljuwe Albert	Member
8	PCTS	Nelson Wilbert	Member
9	Petroleum Technology Association of Nigeria (PETAN)	Prof. Michael Onyekonwu	Member
10	IPPG	Engr. Charles Pepple	Member
11	Research Expert	Professor Krishnan Balasubramaniam	Member
12	Research Expert	Prof. Joel Ogbonna	Member
13	Venture capitalists and Co-funders	Somachi Chris Asoluka	Members
14	NCDMB	R&D Department of PRS	Secretariat of the TAB



Target Measurable Impact of NCDRF

The success of the NCRDF shall be measured by the following metrics:

Activity	Year	Measurable target
Number of IP registrations	2021	3
sponsored	2022	6
	2023	9
Number of applied research	2021	5
proposals sponsored	2022	7
	2023	9
Number of basic research	2021	6
proposals sponsored	2022	9
	2023	10
Number of sponsored	2021	3
prototype development	2022	5
	2023	8
Number of commercialized	2021	1
research outcomes certified	2022	2
for industry application	2023	2
Number of collaborative	2021	1
researches achieved	2022	3
	2023	5
Number of field trial/tests	2021	2
sponsored	2022	3
	2023	3

16

www.ncdmb.gov.ng

NCRDF FUNDS RELEASE PROTOCOL

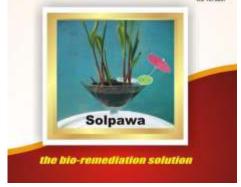


17

















Nigerian Content Development and Monitoring Board

Nigeria Content Tower OX-Bow Lake, Swali, Yenagoa Bayelsa State.

www.ncdmb.gov.ng https://web.facebook.com/OfficialNCDMB twitter.com > officialncdmb