Halal in The Technological Age: Thailand’s Experiences
Halal in The Technological Age: Thailand’s Experiences

Winai Dahlan
Den Biol Med Appliq (magna cum laude), ULB, Belgium

Founding Director, The Halal Science Center
Chulalongkorn University, Bangkok, Thailand (HSC)
Vice Chairman, The Central Islamic Council of Thailand (CICOT)
Chairman, The Halal Standard Institute of Thailand (HSIT)
Member, Advisory Board of Sheik al Islam of Thailand

WIFE-SEACO Foundation Dhaka Roundtable 2019
Radisson Blu Dhaka Water Garden, Bangladesh, October 29, 2019
ICEBERG OF HALAL ECONOMY

- ‘Halal’ means allow in Arabic not specific to only Muslims but to all mankind. ‘Halal for All’ is thus the concept accepted worldwide in both Muslim & Non-Muslims countries.

- According to Global Trade Atlas, only 11% of world industrial food products contain pig and alcohol, thus realized as Haram whereas huge majority of the remaining, 89%, can be considered as Muslim friendly showing possibility to be accredited with Halal Mark beneficial for both Muslims and non-Muslims.
Complexity of Chemicals Used in Halal Industry

- Culture Media
- Protein hydrolysate
- Pancreatic enzyme
- Varieties of Raw materials
- Bacteria
- Chemicals

Halal Science For Assuring Halal Safety & Integrity

- Replacements for Shubahah ingredients/materials
- Halal feed innovations
- Halal standard
- Halal QC system
- Halal forensic laboratory for routine check
- Halal logistics & traceability

**Flow Diagram:**

1. **Raw material preparation**
   - [Image of raw materials]

2. **Raw materials**
   - [Image of meat]

3. **Production**
   - [Image of production line]
   - [Image of Halal QC system]

4. **Products**
   - [Images of Halal products]

5. **Logistics**
   - [Image of supply chain]
   - [Image of Halal logistics & traceability]

6. **Consumers**
   - [Image of consumers]

**Key Points:**

- **Halal-tayyib Nutritional products**
- **Halal-tayyib medicinal products & non-food products**
- **Halal forensic laboratory for routine check**
- **Halal packaging**
- **Halal consumers education**
- **Halal ICT tracking**
OKRs’ PRACTICAL ALGORITHMIC DESIGN BEYOND THAILAND’S HALAL POST AUDIT FOR FUTURE HALAL MARKET

Previous Phase

Free of Haram?

Conditional

No

Novel Halal Ingredients/Products

Available Halal Certified Products

Halal Big-Data

HAL-Q Verified Factories

3

Mushbooh/Haram (Suspected/Forbidden)

Find/Develop Replacement

R&D Evaluation of New Products

IP Intellectual Properties

H-Number Creativity

Halal Certification

New Halal Certified Products

Update Chemicals/Ingredients Database

Collect New Ingredient Data & Knowledge

4

Halal Branding

Test of Halal Branding

Preparation For HAL+ Evaluation

HAL+ Verification

HAL+ Verified Products

HAL Plus Integrated Platform

5

Preparation For Branding of Halal Products

Test of Business Matching

Connectivity Test of SPHERE

Functionality Test of SPHERE

SPHERE Platform Connectivity

6

Halal Blockchain

Halal Blockhain Accreditation

Test of Halal Blockchain Function

Develop Halal Blockchain of Certain Businesses

* Halal Accreditation by CICOT

CICOT

CENTRAL ISLAMIC COUNCIL OF THAILAND

Business

Halal Sci

Market
Halal Accreditation in Precision Halalization Era

Halal Authentication by Trusted Islamic Organizations

Higher competitive capability with lower expenses
Physical & Digital Networks for The Creation of Thailand Halal Trust and Branding
“Algorithmic Touch of Halal”

December 20-22, 2019 @ BITEC, Bangna, Bangkok, Thailand