



# The Establishment

#### of The Malaysian Cohort (TMC) Project

Ying-Xian Goh, Mohd Arman Kamaruddin, Noraidatulakma Abdullah & Rahman Jamal UKM Medical Molecular Biology Institute (UMBI), UKM Kuala Lumpur, Malaysia.

2003

\*Corresponding contact: <a href="mailto:rahmanj@ppukm.ukm.edu.my">rahmanj@ppukm.ukm.edu.my</a>

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In APEC\*

The economic leaders request for the establishment of Life Science Innovation Forum (LSIF) to develop a plan for life science innovation.



Life Sciences Innovation Forum Framework

was developed in an inaugural forum. The body values research, development, manufacturing and marketing, as well as health services for the forum.

LSIF

### 2004

2002

Prof. Dr. Leland Hartwell (Nobel laurate of Physiology or Medicine, 2001) suggested to initiate research on revealing early onset of chronic diseases via cohort studies.

Prof. Dr. Rahman Jamal was appointed by the government as the leader to initiate the health study project in Malaysia.



## **TMC Meetings** 2006

Two committees meetings were carried out in January and July respectively, to establish the working framework for TMC.



# 2005 TMC Plan

**Budget** of TMC project was **drafted and approved** at the Ninth Malaysia Plan (RMK-9).

TMC committee was formed. It consists of 67 Malaysian experts from various background, together with Prof. Dr. John Potter and Prof. Dr. Alan Kristal from Fred Hutchinson Cancer Research Center.

Committee meeting with the advisor of the Asia Cohort Consortium.





# 2007 Pilot Study

Malaysian aged between 35-65 years old are eligible to participate TMC study. The pilot study was started at UKMMC and MTDC. TMC host the Asia Cohort Consortium meeting.

UMBI was established as the main center for the study.







Source: The Malaysian Cohort Executive Report 2006–2020 APEC\* – Asia–Pacific Economic Corporation

### Field Study



Two teams of crew were formed to work at the field to recruit fellow Malaysian from every places in Malaysia.





### Field at East Malaysia

2010

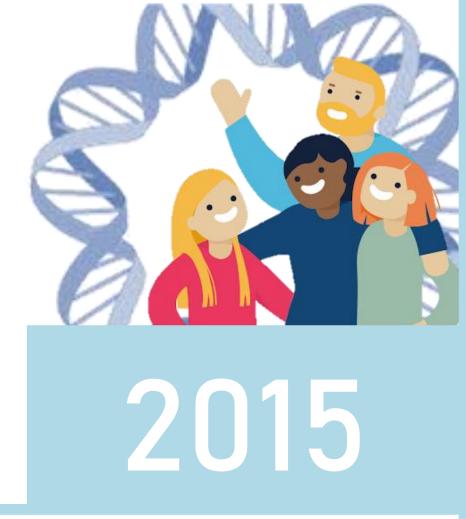
TMC started to recruit participant at Sabah (2010) & Sarawak (2011).

TMC is participating in the MyGenome project, that yield 26 complete genomes of Malaysian from various ethnicity.

# **The 100KE** 2012

TMC has successfully recruited reached 100,000 participants since the project is established.

In 2013, participants who join 5 years ago (in 2007) are eligible for a follow-up screening. Follow-up phase of recruitment has started.



2011



#### Accreditation

TMC's laboratory start to receive MS ISO 15189 accreditation from Standards Malaysia.

First scientific study using cohort samples on dengue seroprevalence was published.

> BMC Res Notes. 2011 Jun 29;4:216. doi: 10.1186/1756-0500-4-216.

Dengue epidemic in Malaysia: Not a predominantly urban disease anymore

**2014 INFOSYS** 

On the information system (INFOSYS), a network-based eCIMS was

#### TMC Profile Published!

The first publication on the profile of TMC study was published on International Journal of Epidemiology.

> Int J Epidemiol. 2015 Apr;44(2):423-31. doi: 10.1093/ije/dyu089. Epub 2014 Apr 11.

Cohort Profile: The Malaysian Cohort (TMC) project: a prospective study of non-communicable diseases in a multi-ethnic population launched to replace CIMS, the old computer-based system. HeDIMS and TSIMS were developed.





2018 3<sup>rd</sup> Follow-up

#### Home Recruitment 2019

For those who unable to return to our recruitment center and reside in Selangor or Kuala Lumpur area, we visit their resident to followup their health status.





Participants who matures from recruitment since 2013 are eligible for a third follow-up.

WhatsApp was used to communicate and connect with participants.

Planning and validating Food Frequency Questionnaire (FFQ).



Poster prepared by: Ying-Xian Goh, Mohd Arman Kamaruddin,

Noraidatulakma Abdullah & Rahman Jamal\* from UKM Medical Molecular Biology Institute (UMBI)

\*Corresponding contact: rahmanj@ppukm.ukm.edu.my

Source: The Malaysian Cohort Executive Report 2006–2020 Year of Publication: 2020



The Malaysian Cohort is very unique because it has populations from three distinct ethnicities-India, China, and Malaysia that makes it a very valuable resource to probe the effect of environment and discover biomarkers of complex diseases.

> – Professor Samir K. Brahmachari Founder Director of Institute of Genomics and Integrative Biology, New Delhi, India.

Our Gift To The Future Generation