

# Summary Report

## APBON 4<sup>th</sup> Web Seminar

1. Date: 10<sup>th</sup> December, 2020

Time: 15:00-17:00 in Japanese Standard Time (UTC 06:00-08:00am)

(13:00-15:00 in Thailand, Indonesia, 14:00-16:00 in Philippines, China)

2. Location, Participants

- Webex Meeting Room
- 28 participants (24 participants and 4 from secretariat) from 9 Nationalities
- MC: Dr. Sheila Vergara  
(ASEAN Centre for Biodiversity, Philippines)

3. Program:

### **Opening and Announcement:**

Secretariat of APBON (Mr. Saito: Biodiversity Center of Japan)

- welcomed all of the participants to join this 4<sup>th</sup> APBON web seminar
- The agenda and rules of meeting were proposed
- Introduced today's MC

**Presentation1:** Mr. Tze Leong Yao (Forest Research Institute Malaysia)

“The origin of mangosteen: review and outlook”

### **Q&A Session**

**Q:** This is an excellent and very interesting presentation! One thing that attracts my interest is that the chromosome counts in your slide page 10 is very variable ranging from 56 to 130. Considering your presentation that the numbers of chromosome are 48 for 2n and 96 for 4n, I have a difficulty in justifying whether all the chromosome counts are accurate. Are there any justification for these chromosome counts? Thank you!

**A:** Yes, in this study, there are many theories based on the cytological works, which is based on the counting of the chromosome. So this is why the future study proposed will apply SSRs and SNPs techniques instead of relying on the previous cytological results.

**Q:** You mentioned that mangosteen was not seen in the wild, and I am wondering, after

polyploidy, plants sometimes gain more and became more competitive which can make them strong to survival in the wild, but mangosteen is not. Do you know why mangosteen cannot survive in the wild?

**A:** This is because of weakness of the cultivated mangosteen in the root system.. Way back to 1920s when H.N. Ridley (1855 – 1956) was still active in this region, he proposed to use *Garcinia hombroniana* as a roots' stock for cultivated mangosteen. Root system of the seedling of cultivated mangosteens is quite weak and the survival of the seedlings rely much on watering because the seedling can't withstand prolonged drought. This might explain why the cultivated mangosteen could not be found in the wild. Other observation in Pasoh is that *Garcinia* species deemed polyploid are found in the ephemeral inundated area in Pasoh 50-ha plot.

**Q:** In relation to the prior question, I introduce a reference describing a recently advanced technique to determine ploidy level using herbarium specimens: Virual et al. 2017 A Target Capture-Based Method to Estimate Ploidy From Herbarium Specimens. <https://www.frontiersin.org/articles/10.3389/fpls.2019.00937/full?report=reader>

Although it is still in progress, this kind of method can be widely used in the future. I and Sugiyama-san are considering to develop a similar method by using our protocol.

**A:** Yes, of course. My supervisor advised me to use flow cytometry method because according to someone he knows in Paris, ploidy level of recently dried materials could be analyzed using flow cytometer. Thank you very much for your introduction of this article.

**Presentaton2:** Dr. Takashi Hosono (Japan Agency for Marine-Earth Science and Technology)

“Collecting and sharing framework of marine biodiversity data in the North-Western Pacific region”

#### **Q&A Session**

**Q:** Does the OBIS node in Japan collect the data just only in Japan? Or is it also welcome to submit the data from other countries in Asia?

**A:** It's welcomed from many countries to observe, but I recommend to contact to their own countries' node, because ASEAN node, Malaysian node and Indonesian node are

also active. And we have the network, where we can share the information and talk about how to observe the data management. So I recommend that contact to each country's node first and then please contact to us.

(Reference URL of Dr.Hosono's presentation:

[http://www.godac.jamstec.go.jp/j-obis/e/img/jobis\\_video\\_en.mp4](http://www.godac.jamstec.go.jp/j-obis/e/img/jobis_video_en.mp4) )

**Information exchange on APBON:** (Dr. Muraoka)

- Announcement about APBON meetings (Dr. Muraoka)
- The schedule of APBON meetings from January to March in 2021 was shared, which are 5<sup>th</sup> APBON web seminar scheduled on January 21, 12<sup>th</sup> APBON Workshop scheduled on January 22, and 6<sup>th</sup> APBON web seminar scheduled on February 25. And also the 13<sup>th</sup> Asia Oceania GEO Symposium scheduled on March 3-5.
- The draft agenda of 12<sup>th</sup> APBON Workshop was also shared, which is still under-consideration. And the committee will work on the agenda of 12<sup>th</sup> APBON Workshop and will share to all members as soon as the agenda is fixed.

**Closing and Announcements:** Secretariat to APBON

- The date and speakers of 5<sup>th</sup> and 6<sup>th</sup> APBON Web Seminar are already fixed,  
5<sup>th</sup> APBON Web Seminar on 21<sup>st</sup> January 2021  
(speakers: Dr. Bunthang Touch and Dr. Chheang Dany)  
6<sup>th</sup> APBON Web Seminar on 25<sup>th</sup> February 2021  
(speakers: Dr. Eun-Shik Kim and Dr. Tomoaki Miura).
- And for MC of the 5<sup>th</sup> and 6<sup>th</sup> seminar, anybody is welcomed.
- Everyone in this community is welcomed to join by letting APBON secretariat know of email address, and will be added to APBON mailing list, if you are interested in.
  
- The agenda for the 5<sup>th</sup> APBON Web Seminar will be informed by Secretariats as soon as it is fixed.

Photo session:

