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Cover images: A self-organized renal organoid made by serial reaggregation of ex-fetu mouse renogenic stem cells. Image credit: Veronika Ganeva and Jamie Davies. See paper by Davies, this issue, for more details.

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could be related to the overload that may be produced by the other regions of the axial axis, having a greater impact on teaching health in younger teachers. It is necessary to propose appropriate strategies to reduce MSD and obesity in school teachers.

P1-G17

Incisor is an important factor of the development of maxillary dental arch form

Michiko Nakatsuka¹, Shunji Kumabe², Satoshi Fujita¹, Kentaro Ueno², Kazutoshi Kakimoto¹, Yutaka Komasa¹, Koichi Imai¹

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The mesiodistal crown width of canine and bilateral intercanine distance have been reported as important factors of the development of maxillary dental arch form. However, there are not many studies evaluating other factors. Therefore, this study aimed to examine the factors of the development of maxillary dental arch form by statistical analyses. The present study conformed to the principles of the Declaration of Helsinki Ethical Principles for Medical Research (1964). The protocol (No. 050507: Morphological Analysis of dental arches) was approved by the Ethic Review Board of Osaka Dental University. 396 paired maxillary and mandibular dental casts of young adult students (occlusal plane: 30 mm from the mandibular basal plane; distance between the maxillary basal planes in occlusal condition: 60 mm) were prepared. We selected 62 sets of maxillary dental arches with normal dentition and occlusion. We established 22 measurement points on the maxillary dental casts, and obtained data were analyzed using correlation and principal component analyses. Positive correlations were observed between bilateral inter-central incisor distance and bilateral inter-lateral incisor distance, mesiodistal crown width of central incisor, and arch length. Negative correlation was observed between bilateral inter-central incisor distance and anterior angle. Strong positive

correlation was observed between bilateral inter-lateral incisor distance and bilateral intercanine distance. However, weak positive correlation was observed between bilateral inter-central incisor distance and bilateral intercanine distance. There was a strong positive correlation between mesiodistal crown width of central incisor and arch length. The original 22 sets of information were condensed into 4 components. Regarding component 1, principal component loading values for the bilateral inter-lateral incisor distance and mesiodistal crown width of central incisor, and arch length exceeded 0.7. The bilateral interincisor distance and incisor width influence maxillary dental arch form, especially arch length.

P1-G18

Predictors of Body Height Based on the Long Bone of the Limbs in Adult Males From Banjar Hulu Tribe

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Determining body height is an important aspect of forensic identification. Forensics identification is a part of medical forensic science that has an important role in the identification process, even if there are only body parts are found. This study aimed to predict body height based on the bone length of the limbs in adult males from Banjar Hulu Tribe (BHT). It is a population that inhabits the river valleys on the Meratus Mountain in South Kalimantan. This study used observational design with cross sectional approach. Sampling was conducted by purposive sampling with total subject of 35 men aged 21-50 years who fulfilled inclusion and exclusion criteria. This study has received ethical approval from the Medical Faculty of Lambung Mangkurat University ethics commission with No.743/KEPK-FK

UNLAM/EC/VII/2018. Data were analyzed using multiple linear regression with 12 independent variables, namely, the lengths of right upper arm (right UA), left upper arm (left UL), right forearm (right FA), left forearm (left FA), right hand (right HL), left hand (left HL), right upper leg (right UL), left upper leg (left UL), right lower leg (right LL), left lower leg (left LL), right foot (right FL), and left foot (left FL). The results of this study obtained regression equation for body height (BH) = $52.172 + (0.850 \times \text{right UL}) + (2.081 \times \text{right HL}) + (0.844 \times \text{right UA})$ with 93.9% accuracy in predicting body height of adult males from BHT. The conclusion of this study is the combination of right UL, right FL and right UA was able to predict the male height of the Banjar Hulu Tribe with very good accuracy (93.9%).

P1-G19

Estimation of body height based on the bone length of the limbs in adult males from Dayak Ngaju tribe

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Ethnic identity is important in identification process conditions natural disasters or accidents occur, or for solving criminal cases and for recognizing unidentified bodies. This study aimed to estimate body height from the long bones of the limbs in adult males from Dayak Ngaju tribe. This tribe has the largest population in Central Kalimantan, with Dayak Ot Danum as their ancestor. The design used in this study was observational with cross-sectional approach. Samples were taken by purposive sampling technique with sample size of 35 managed 21 to 50 years who fulfilled the inclusion and exclusion criteria. This study has received ethical approval

from the ULM FK ethics commission with a letter number, No.743/KEPK-FK UNLAM/EC/VII/2018. Data were analyzed using multiple linear regression with 12 independent variables, namely, the lengths of right upper arm (right UA), left upper arm (left UL), right forearm (right FA), left forearm (left FA), right hand (right HL), left hand (left HL), right upper leg (right UL), left upper leg (left UL), right lower leg (right LL), left lower leg (left LL), right foot (right FL), and left foot (left FL). The results showed that right UL and left FL could estimate body height with 86.2% accuracy, with regression formula of Body Height = $75.877 + (0.903 \times \text{right UL}) + (2.130 \times \text{left FL})$. Conclusion: The combination of right UL and left FL with the formula : $75.877 + (0.903 \times \text{right UL}) + (2.130 \times \text{left UL})$ could estimate the male body height of the Dayak Ngaju Tribe with accuracy 86.2%.

P1-G20

Lymphoid formations of rectum in middle fetal period

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Studying the development of immune system of rectum helps understand the mechanisms of immune processes of organ. Objective: to study development of lymphoid formations of human rectum in middle fetal period.

The work was done on 27 preparations of rectum of human fetuses obtained in result of medical abortions in term of 21-28 weeks. Research was approved by Ethical Committee of University. According to Regulations of Health Ministry of Kazakhstan Republic, in cases of medical abortions for medical reasons an autopsy examination is carried out. Written informed consent was obtained for rectal tissue sampling during autopsy. No personal data was used for research.

Macropreparations of rectal mucosa by Hellman's method were made. Histological sections stained by hematoxylin-eosin were prepared.



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For presenting the poster:

**ESTIMATION OF BODY HEIGHT BASED ON THE BONE LENGTH OF THE LIMBS IN ADULT
MALES FROM DAYAK NGAJU TRIBE**

At the

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Yours sincerely,

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