## F831

Genetic Variation of Placental Aconitase in Korean Population

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한국인 집단의 태반내 효소 Aconitase(ACON:E.C.4.2.1.3)의 유전적 다형현상을 규명하기 위하여 Horizontal starch gel electrophoresis 방법을 이용하여, 307명의 태반에서 동위효소 ACON의 표현형을 분석하고 대립유전자의 빈도를 산출하였다. 전기영동 결과, ACON은 mitochondrial form(ACON<sub>M</sub>)과 soluble form(ACON<sub>S</sub>)으로 분리되었고, ACON<sub>M</sub>의 표현형은 monomorphic했다. ACON<sub>S</sub>의 표현형 ACON<sub>S</sub> 1-1, ACON<sub>S</sub> 2-1 및 ACON<sub>S</sub> 2-2인 개체수는 285, 21, 1명 이었으며, 두개의 대립유전자  $ACON_S^I$  및  $ACON_S^S$ 의 빈도는 0.957, 0.043이었다. 이를 다른 민족집단의 연구결과 와 비교해 볼 때, 일본인 집단의 유전자 빈도( $ACON_S^I$  = 0.951,  $ACON_S^S$  = 0.049)와 유사하였고, 아시아 집단의  $ACON_S^S$  빈도가 유럽인 집단보다 높은 것을 확인하였다.

## F832

The distribution of cytogenetic types and the structure of natural populations of Scilla scilloides Complex

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A total of 2,439 plants of *Scilla scilloides* Complex were sampled from 174 natural populations over the Korean Peninsula and analysed cytologically. Ten cytogenetic types were found. They are AA(2n=16), BB(18), AAB(25), ABB(26), AABB(34), ABBB(35), BBBB(36), AABBB(43), AAABBB(51) and AAAABBBB(68), where A and B are the genomes with x=8 and x=9, respectively. The AABB tetraploids are predominant(68.0%) and distributed throughout the Peninsila. The AA diploids are distributed along the west side and no population of AA was found on eastern. On the other hand, BB plants were found in the southernmost Island, Cheju-do. B genomes are more frequently observed than A genomes in southern west side of the Peninsula and thus, ABBB allotetraploids and AABBB allopentaploid which have three of B genomes were predominant in that region. The 148 populations are consisted of a single cytotype plants with respect to genome composition and others were mixed populations of two or three cytotype plants. The frequency of B-chromosomes was also investigated. The number of B-chromosome in a plant ranged from 1 to 31 and 1B plants were most predominant.