

## C01-O12

### **POLAR AND ALPINE MICROBIAL COLLECTION (PAMC): A CULTURE COLLECTION DEDICATED TO POLAR AND ALPINE MICROORGANISMS**

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The number of microbial strains isolated from polar and alpine areas is increasing and they are recognized as valuable resources in fundamental studies, such as ecology, physiology, and -omics. Thus, the necessity of culture collection dedicated to the polar and alpine microorganisms has increased. Korea Polar Research Institute (KOPRI) established the Polar and Alpine Microbial Collection (PAMC) to share biodiversity information and bio-resources collected from polar and alpine areas in science and public communities. Approximately 2,500 out of 7,000 strains maintained in PAMC have been identified and belonged primarily to the phyla *Actinobacteria*, *Bacteroidetes*, *Firmicutes*, and *Proteobacteria*. Many of the microbial strains of PAMC can grow at low temperature and produce proteases, lipases, and/or exopolysaccharides. PAMC provides search tools based on keywords such as taxonomy, geographical origin, habitat and physiological characteristics. Biological materials and information provided by PAMC will be important resources for those who have had no opportunity to visit polar and alpine areas and are expected to contribute to the development in the extreme life sciences (Grant: PE14080).