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Nota di contenuto	Cover; Editorial advisory board; Guest editorial; Multiscale hydro-mechanical analysis of unsaturated granular materials using bridging scale method; Multiscale properties of dense granular materials; Characteristic lengths in Cosserat continuum modeling of granular materials; DEM analyses of shear band in granular materials; A yield function for granular materials based on microstructures; Effects of density ratio and diameter ratio on penetration of rotation projectile obliquely impacting a granular medium Numerical study of concrete mixing transport process and mixing mechanism of truck mixer Asymmetric local velocity distribution in a driven granular gas; 2D particle contact-based meshfree method in CDEM and its application in geotechnical problems; Discrete modeling of rockfill materials considering the irregular shaped particles and their crushability; Analysis of ice load on conical structure with discrete element method; Particles deposition on microfiltration permeable boundary; Numerical simulation of impinging jet flows by modified MPS method A comparative study of different baffles on mitigating liquids loshing in a rectangular tank due to a horizontal excitation
Sommario/riassunto	Computational particle based methods provide unique and powerful numerical tools for modelling systems exhibiting discrete and/or discontinuous behaviour, such as granular materials. Such systems are

highly heterogeneous, typically composed of voids and particles with different sizes and shapes. Geological matter, soil and clay, soil-rock mixture in nature, geo-structure, concrete, etc. are some practical examples. Significant progress has been made in the development of particle based computational methods for granular materials in China over the last decade. This special issue contains