

Study of properties and strength of no-fines concrete

ABSTRACT

Nowadays, special concrete is widely adopted in construction industry. No-fines concrete is a one of the special concrete which eliminate the use of fine aggregates in concrete mixing. The application of no-fines concrete has been introduced to construction industry especially pavement construction. Due to its high porosity behavior, the relative density of no-fines concrete is lower than normal concrete of 2400kg/m^3 which also helps in reducing dead weight in the design. In term of strength, no-fines concrete also gave lower compressive strength compared to normal conventional concrete. The aggregate/cement ratio also found to be a factor affecting its strength as it is depending on the interlocking or the strength of bonding between aggregate and cement. Also, concrete with varies mix ratio gives different has been studied for its physical and mechanical properties. In addition, there are further study of introducing fiber materials to determine the chance of enhancement in no-fines concrete study. By elimination of fines aggregates, the development and application of no-fines concrete in the construction industry will be more economical than normal concrete. This paper reviews and studies the performance characteristics and strength of no fine concrete basedon previous researcher's outcome.