a
Buildability
Workability
Silica flour
Silica fume
Building Sand
w/b ratio <0.35
Egg albumen
RMA: hemc, Xanthan gum
CEM1
strength
PFA
Sports Sand
w/b ratio 0.36-0.50
Foam
Plasticiser
b
Mix 1
PFA 18.34
Water 24.62
CEM1 34.05
Sp. Sand 20.96
Plast. 0.52
Foam 0.67
hemc 0.28
Xan 0.57
Mix 2
PFA 18.15
Water 25.41
CEM1 33.70
Sp. Sand 20.74
Plast. 0.52
Foam 0.68
hemc 0.28
Xan 0.52
Mix 3
PFA 23.59
Water 31.01
CEM1 43.82
Plast. 0.67
Xan 0.62
hemc 0.29
Mix 4
PFA 23.25
Water 31.23
CEM1 43.19
Plast. 0.66
Foam 0.84
hemc 0.28
Xan 0.54
c
η (Pa.s)
Shear Rate (1/s)
Material viscosity η – while at rest
η - while in the vessel
η – while in the tube
d
(W/B 0.48, S/B 0.40)
δ (°)
G* (MPa)
Fck (MPa)
Force/10 (N)
(W/B 0.50, S/B 0.40)
(W/B 0.47)
(W/B 0.48)
0
10
20
30
40
50