

FIGURE I
EXPERIMENTAL LOOP

Figure 2
Schematic of Lucite Column

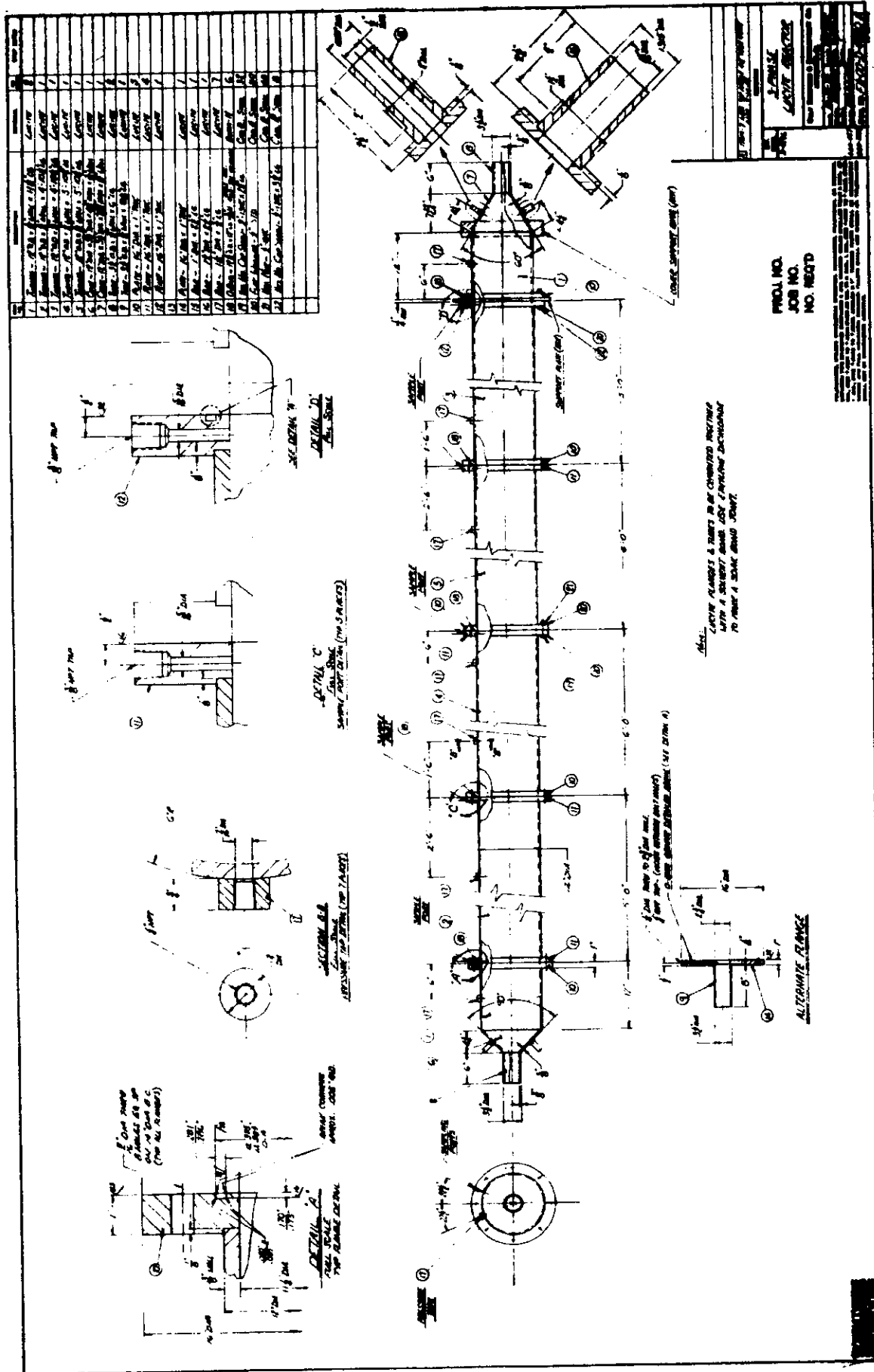


Figure 3

GAS HOLDUP VS. SUPERFICIAL GAS VELOCITY
AIR-WATER SYSTEM

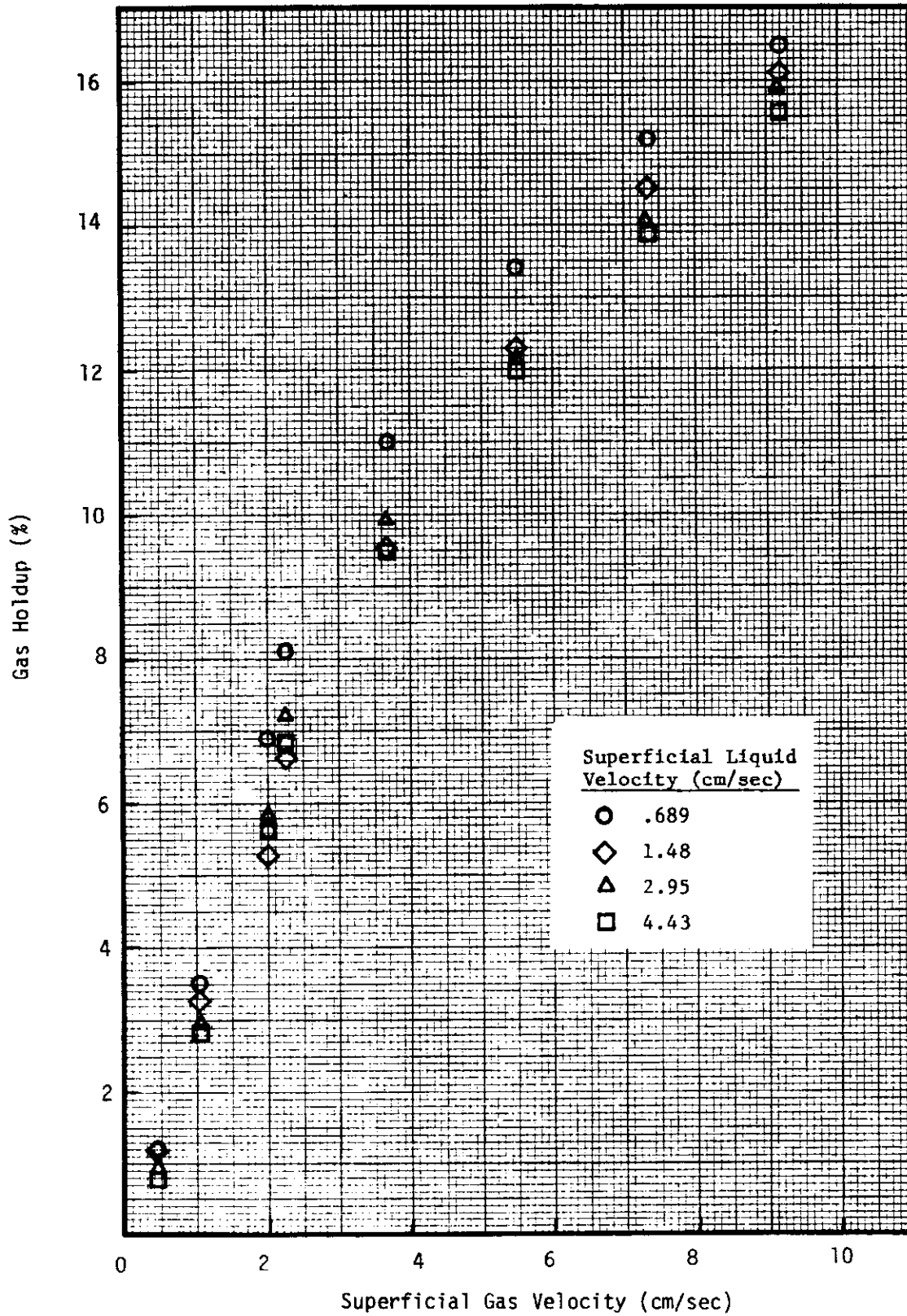


Figure 4
Comparison of Air-Water Data With Existing
Correlation of Akita & Yoshida⁹

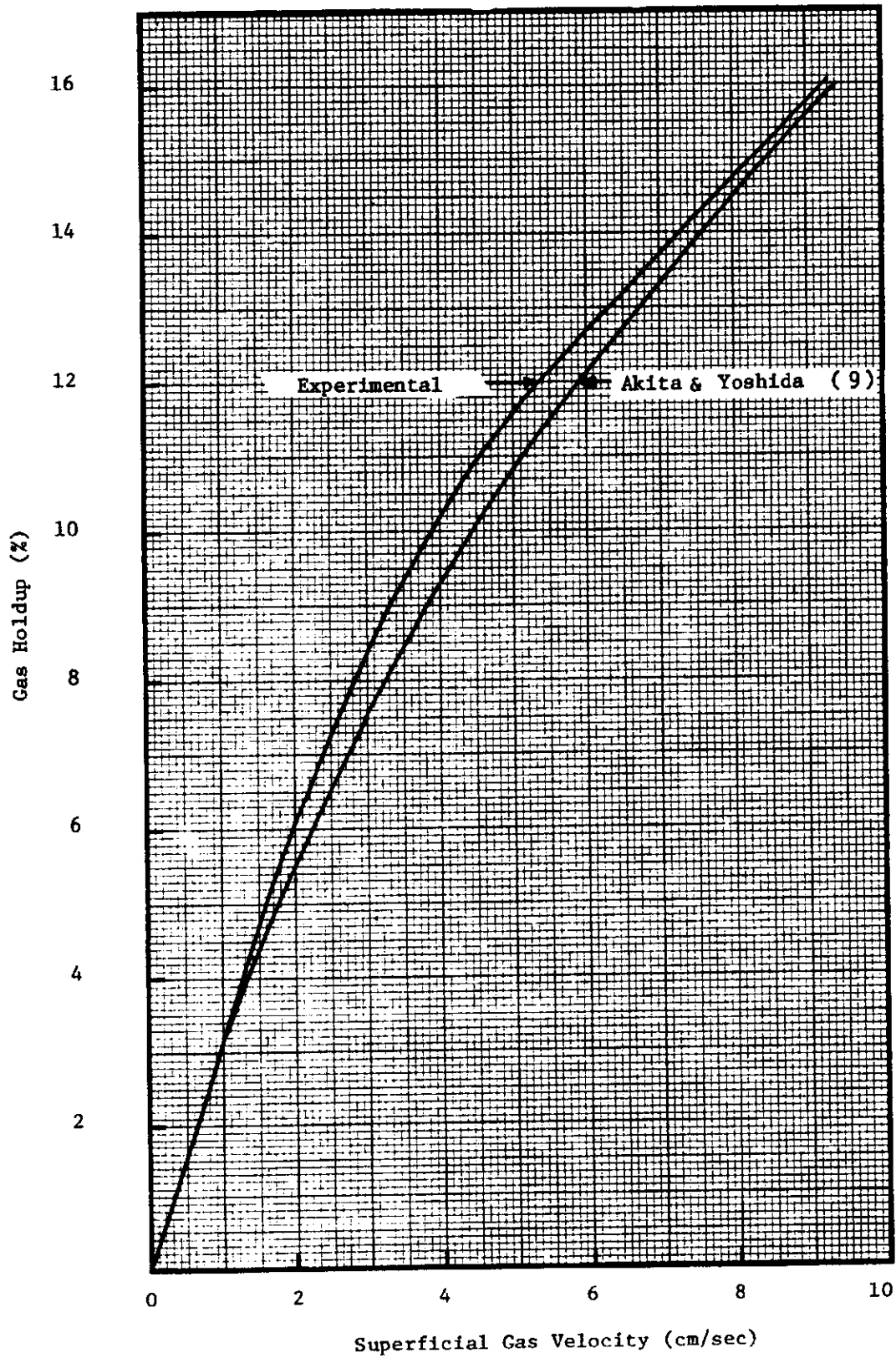


Figure 5

Gas Holdup vs. Superficial Gas Velocity
0.33 vol % Surfactant

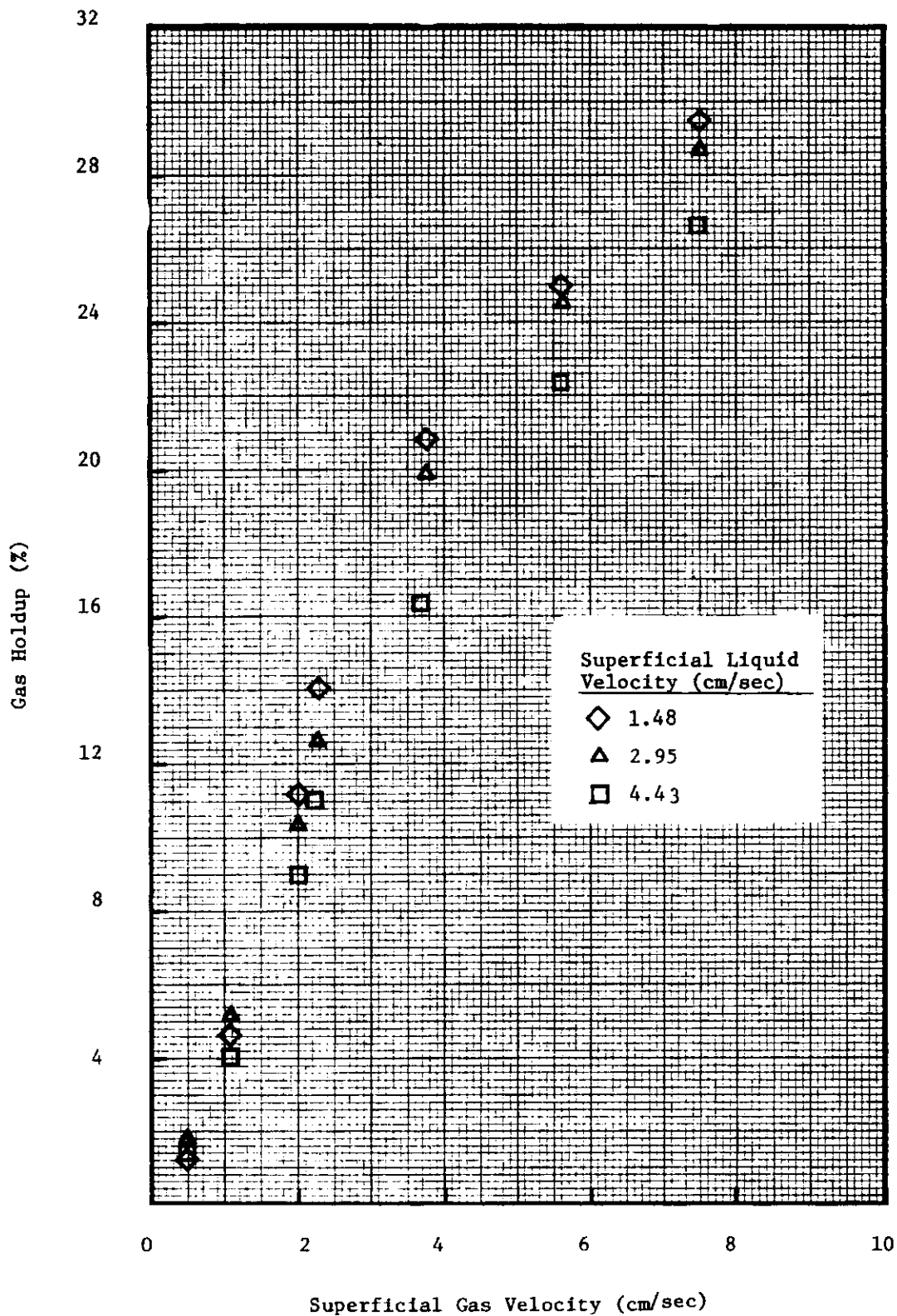


Figure 6
Gas Holdup vs Superficial Gas Velocity
Effect of Solids Concentration
70-140 Mesh Beads

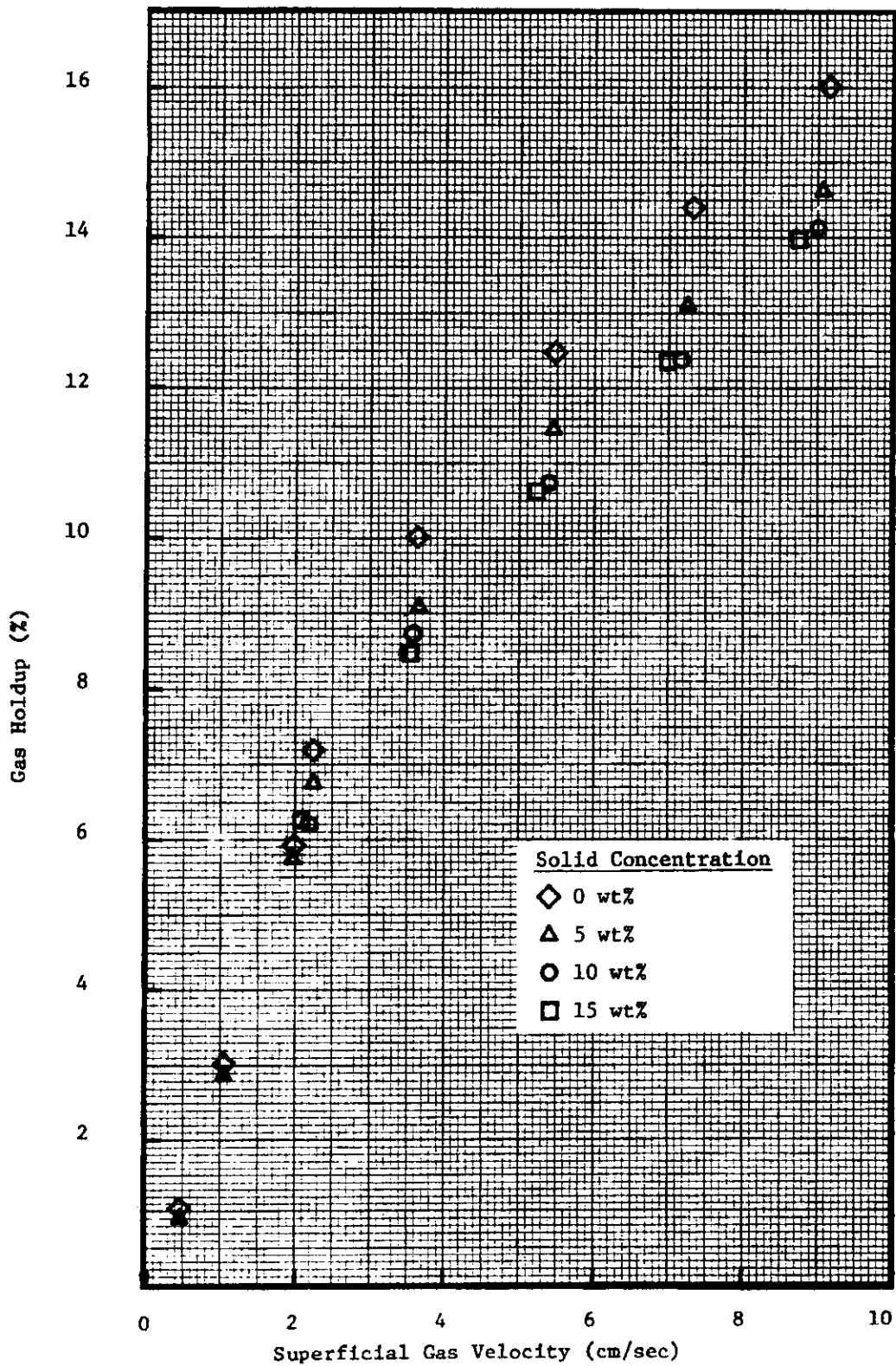


Figure 7
Gas Holdup vs Superficial Gas Velocity
Effect of Solids Particle Size

Solids Concentration = 10 wt %

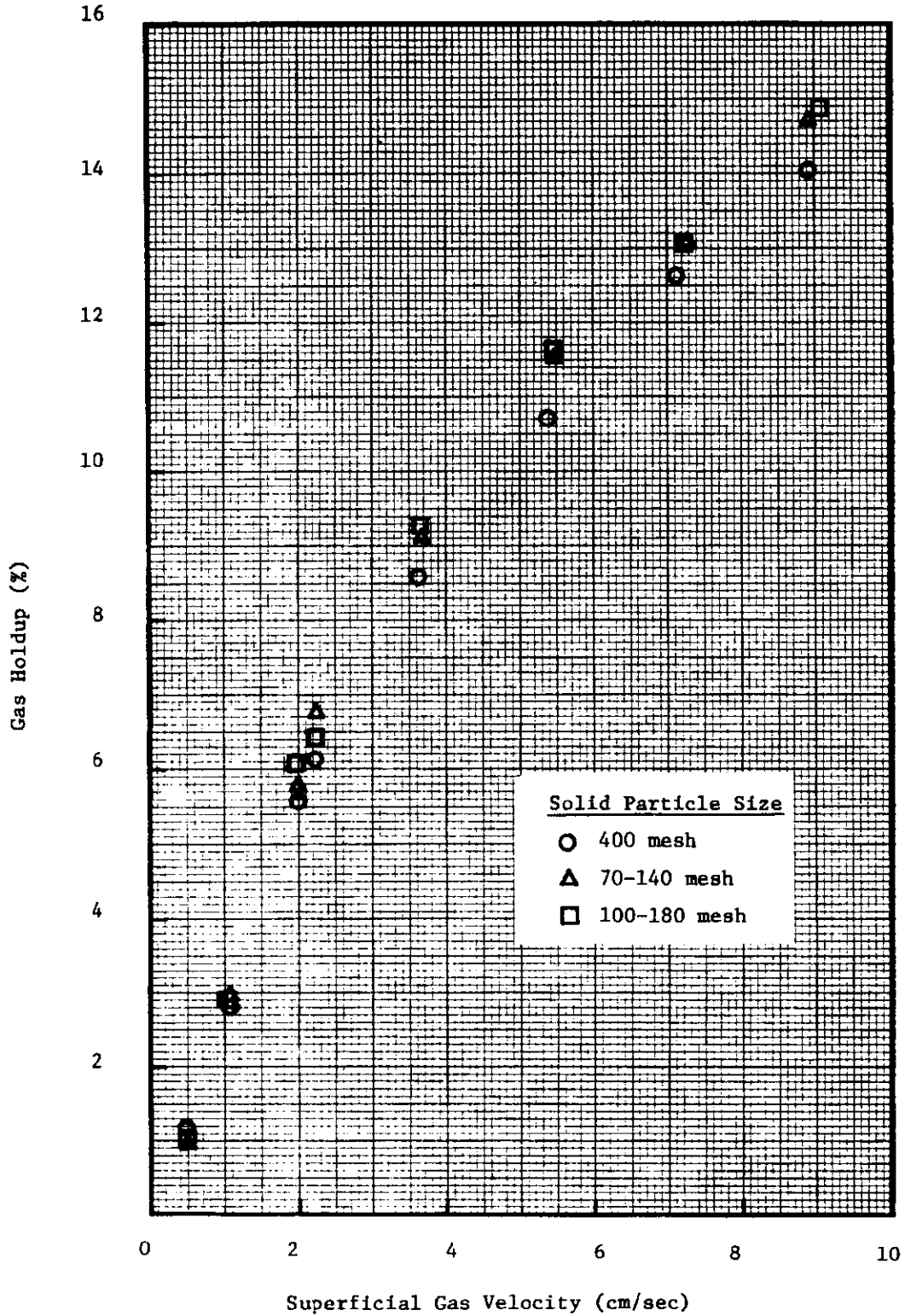


Figure 8
 Gas Holdup vs Gas Superficial Velocity
 Effect of Solids Withdrawal System
 15wt%, 70-140 Mesh Beads

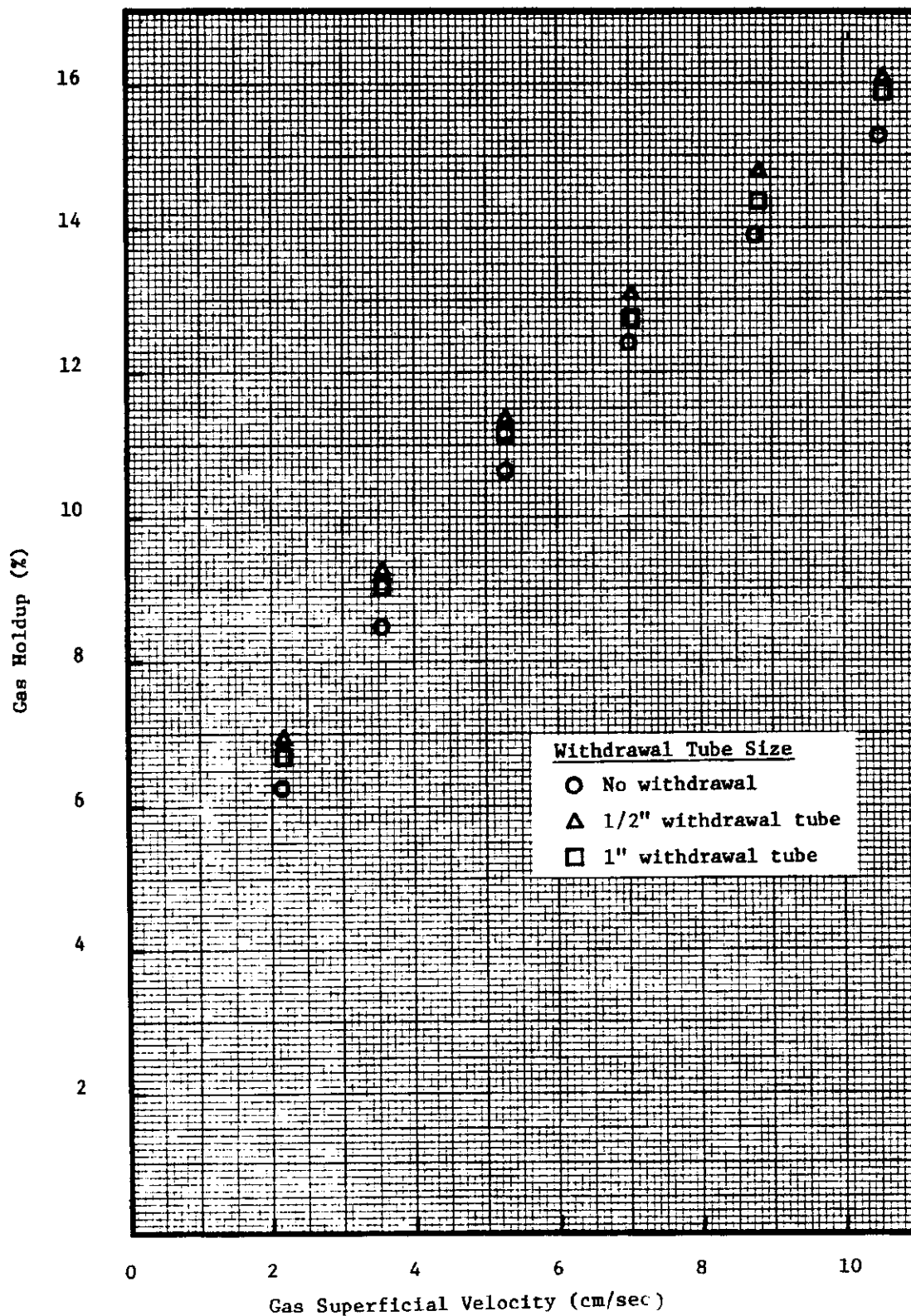


Figure 9
Gas Holdup vs Superficial Velocity
Effect of Solids Withdrawal System
5 wt % 100-180 Mesh Sand

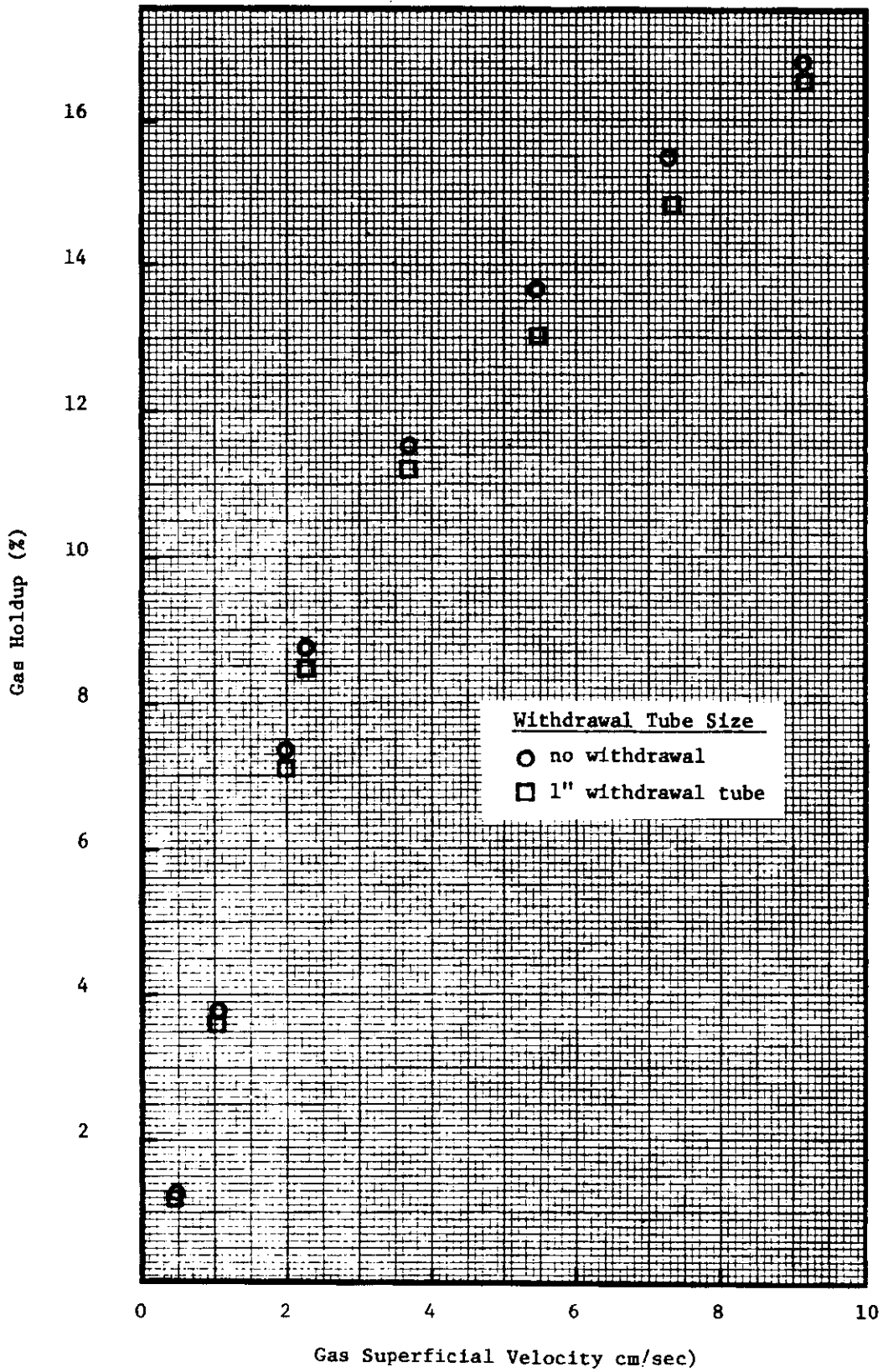


Figure 10
 Holdup vs Superficial Gas Velocity
 5 wt % 400 Mesh Sand

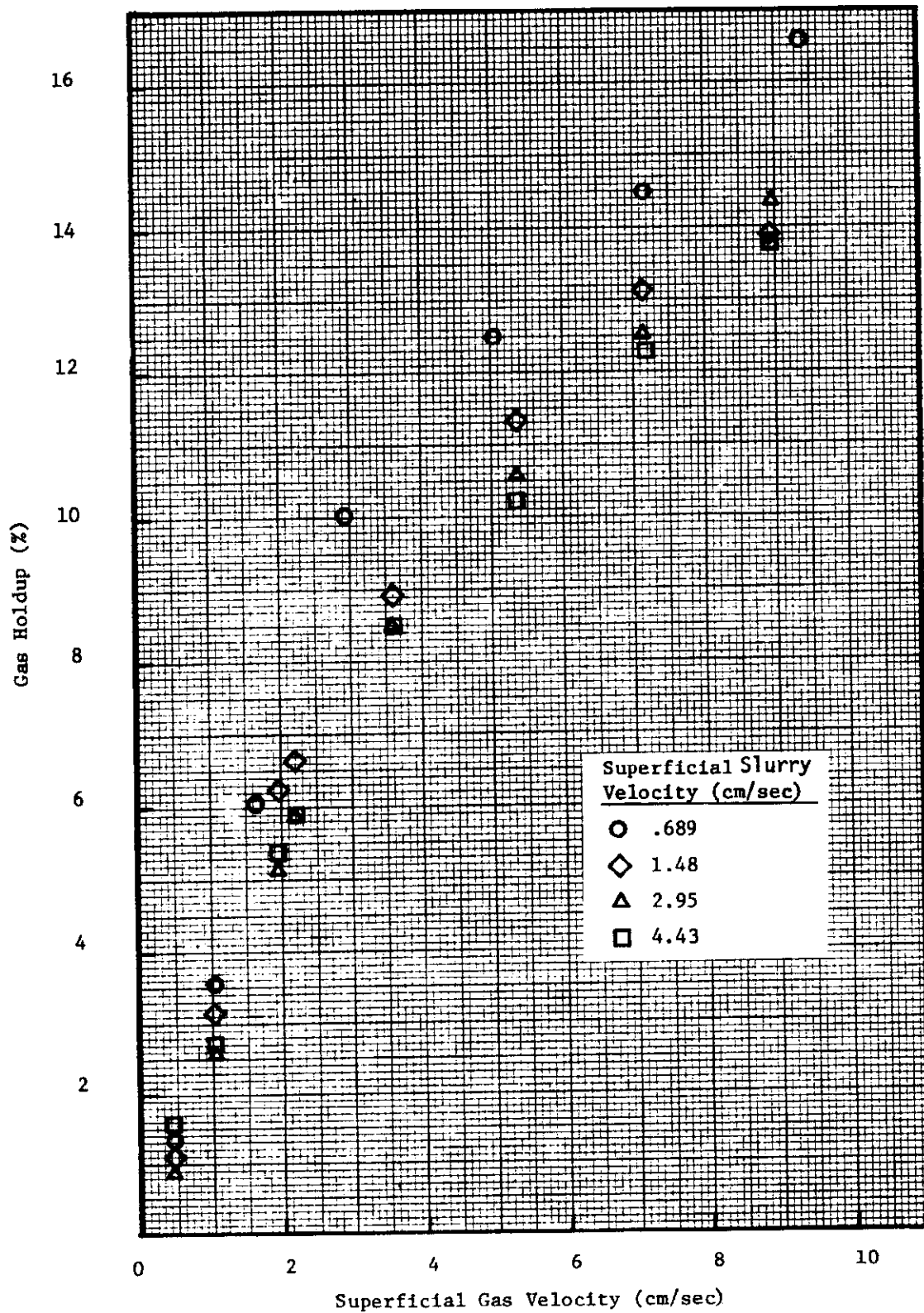


Figure 11
Holdup vs Superficial Gas Velocity
10 wt% 400 Mesh Sand

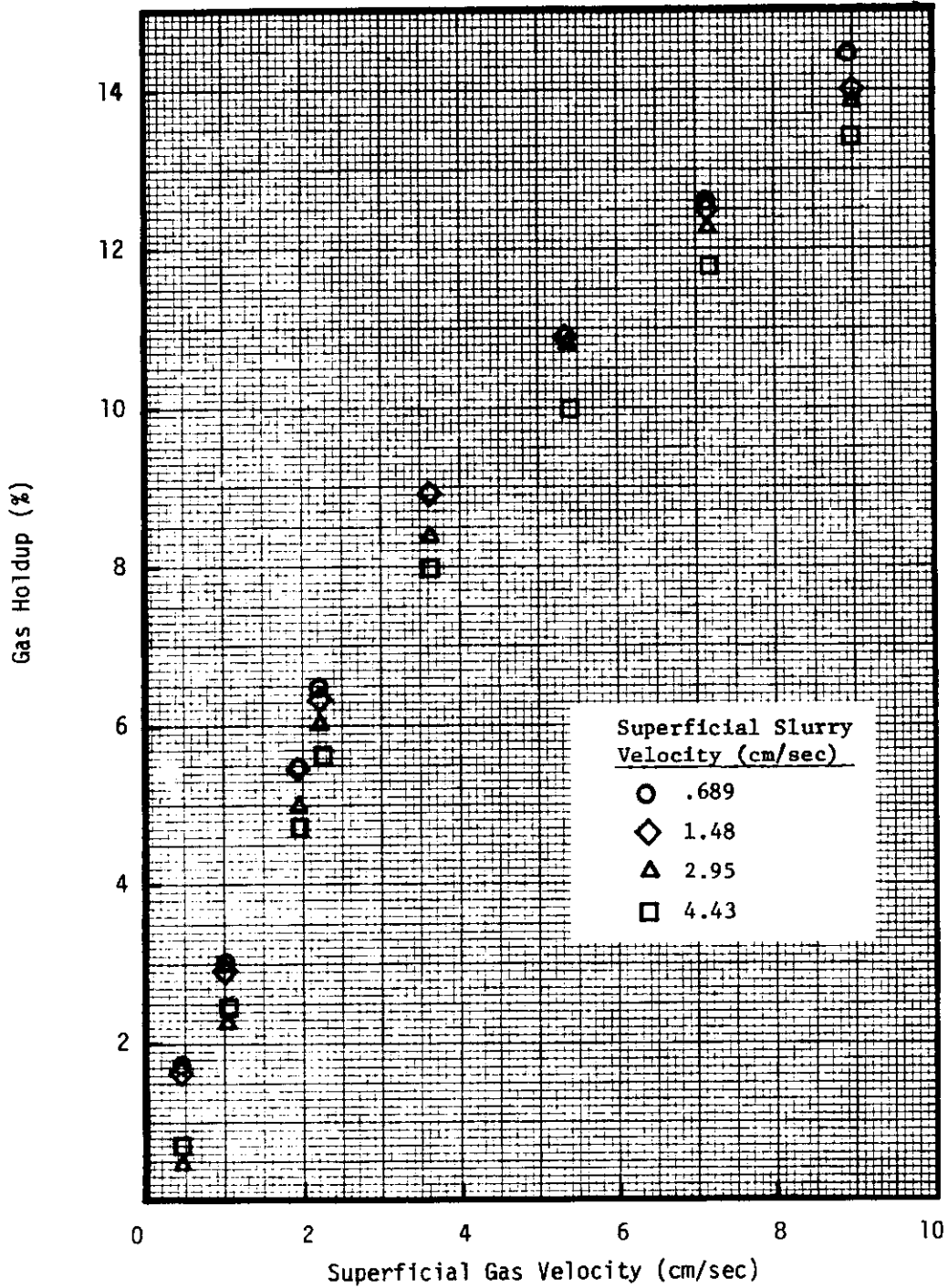


Figure 12
Holdup vs Superficial Gas Velocity
5 wt% 100-180 Mesh Sand

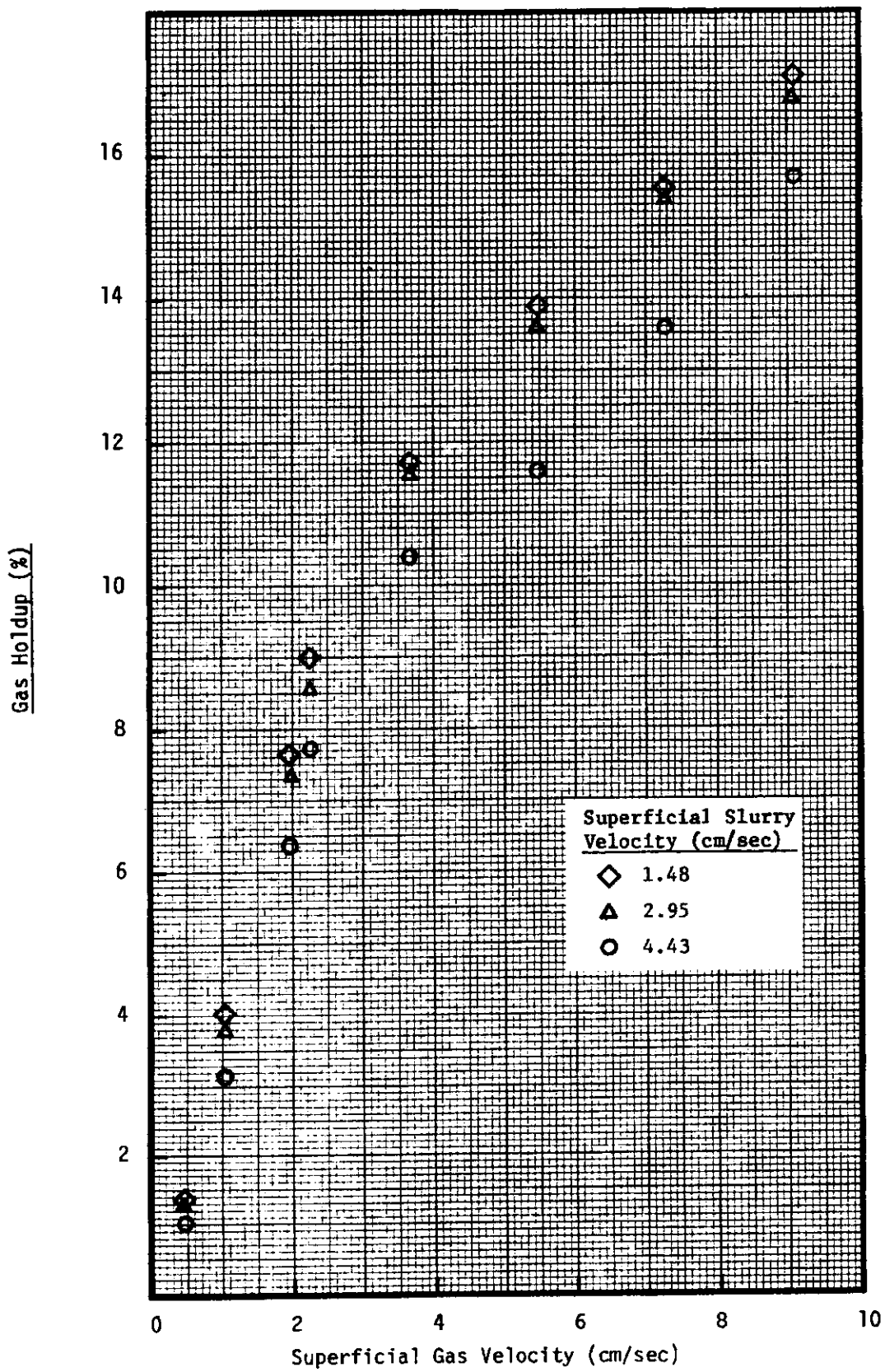


Figure 13
Holdup vs Superficial Gas Velocity
5 wt% 100-180 Mesh Sand

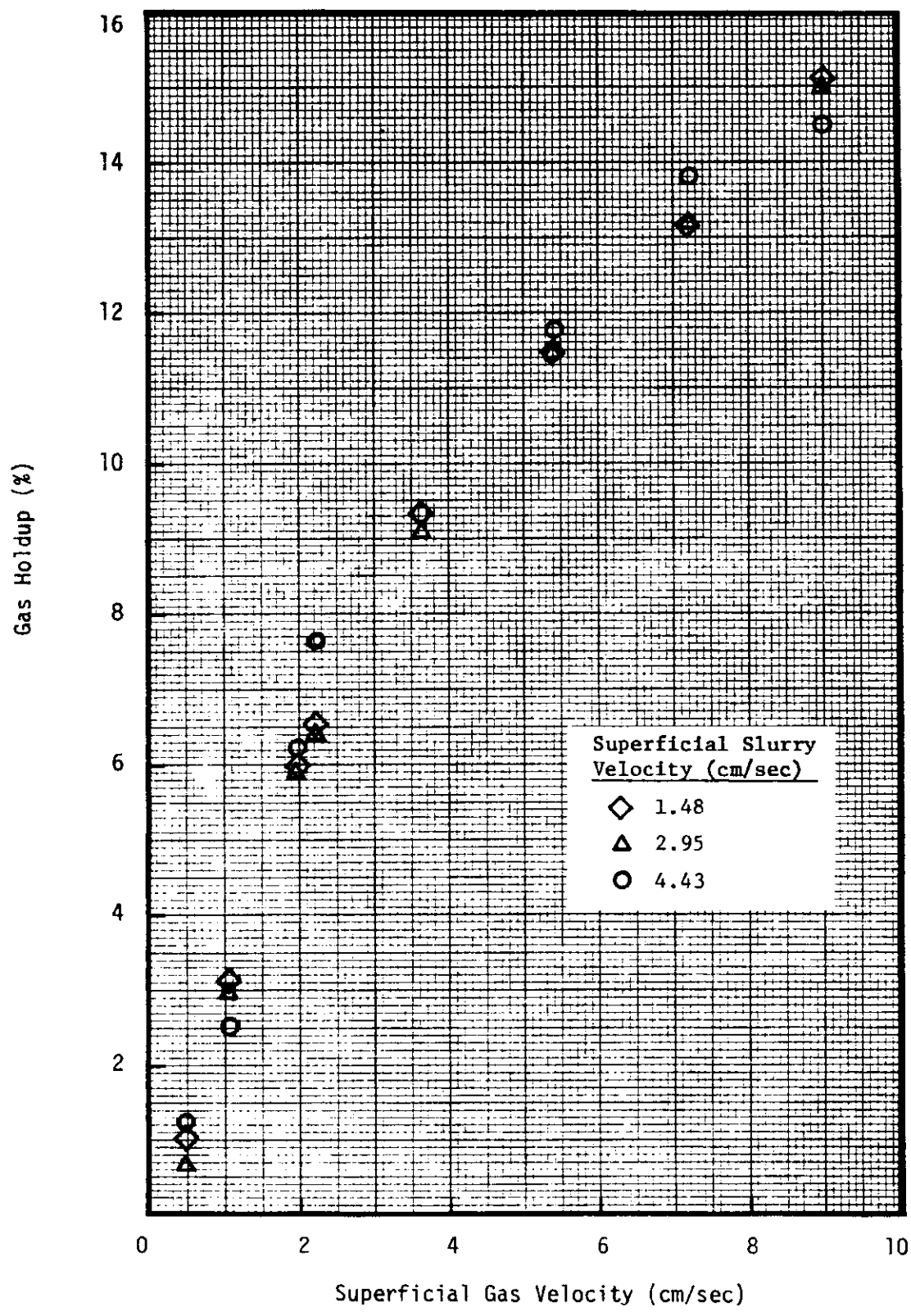


Figure 14
Holdup vs Superficial Gas Velocity
5 wt% 70-140 Mesh Beads

