

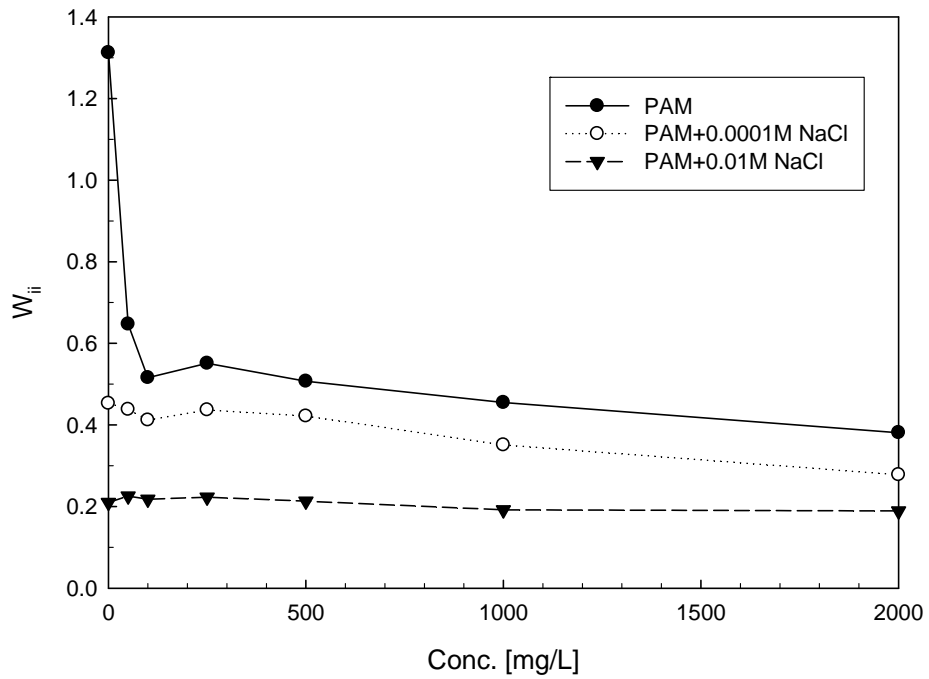
附錄 A

單一粒徑膠體粒子溶液的膠凝穩定圖

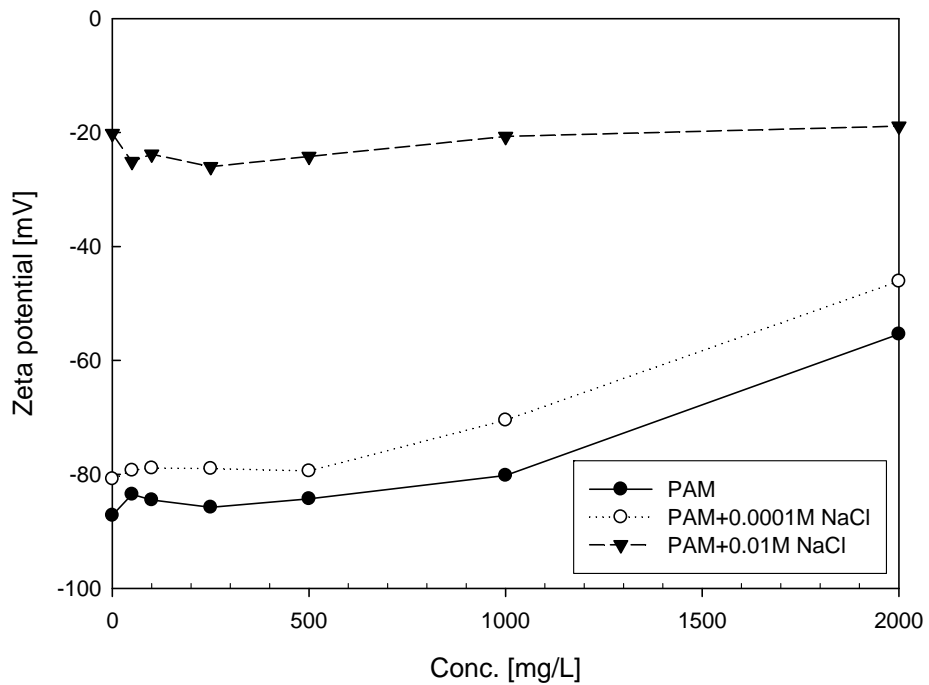
和

單一粒徑膠體粒子溶液的表面電位

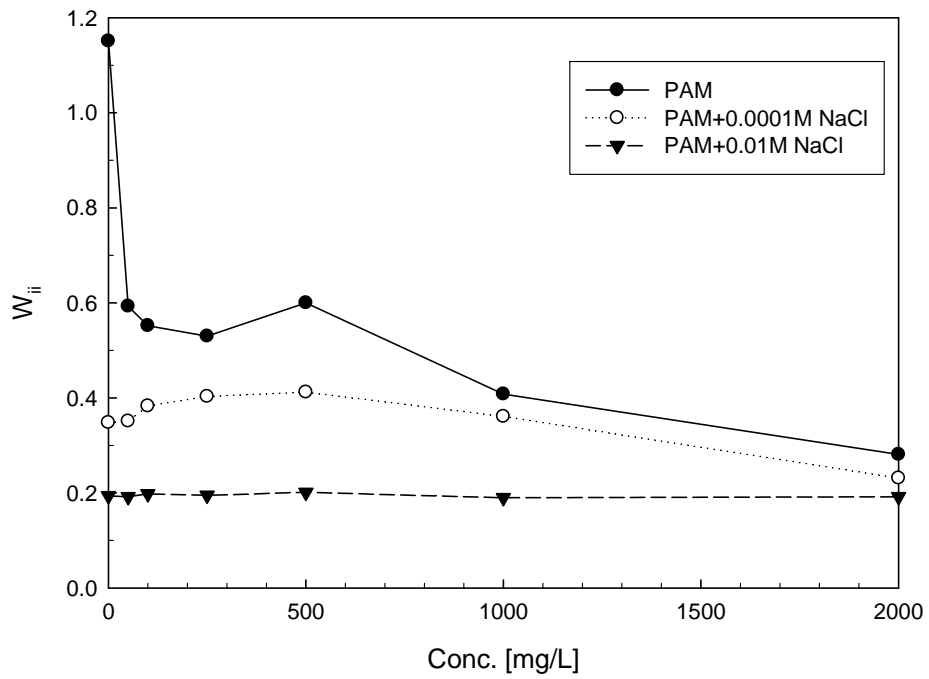




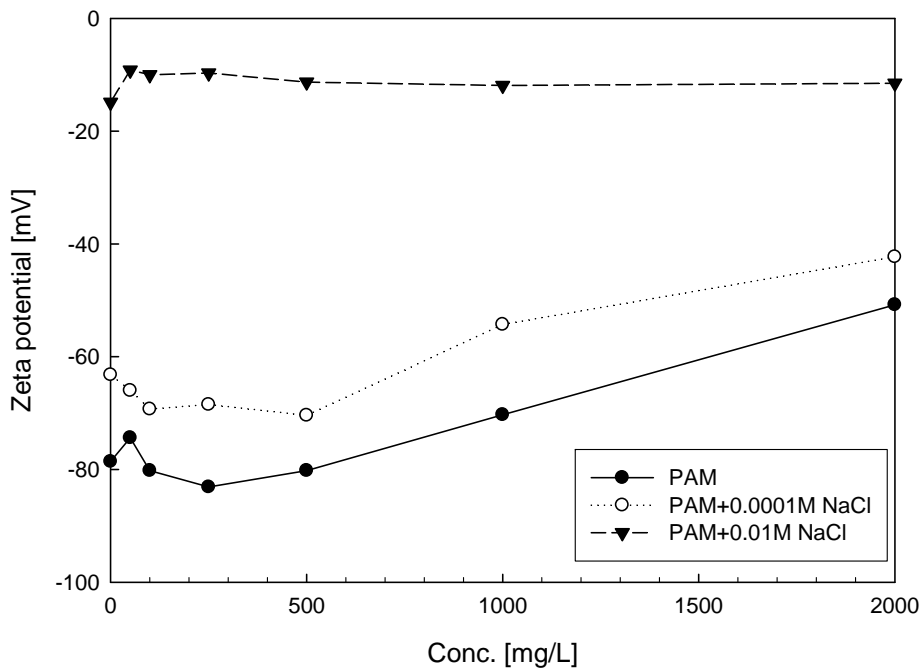
Fig[A-1] Experimental values of the stability ratio (W_{ii}) for 0.807 μ m colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



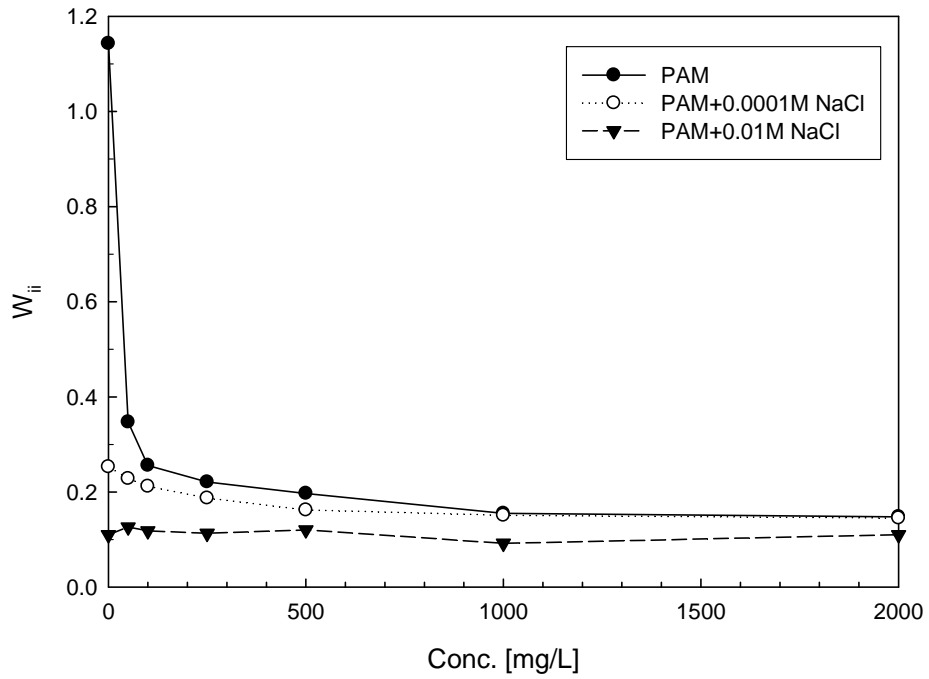
Fig[A-2] Plots of the zeta potential values for polystyrene colloids (particle diameter: 0.807 μ m) at 25 $^{\circ}$ C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



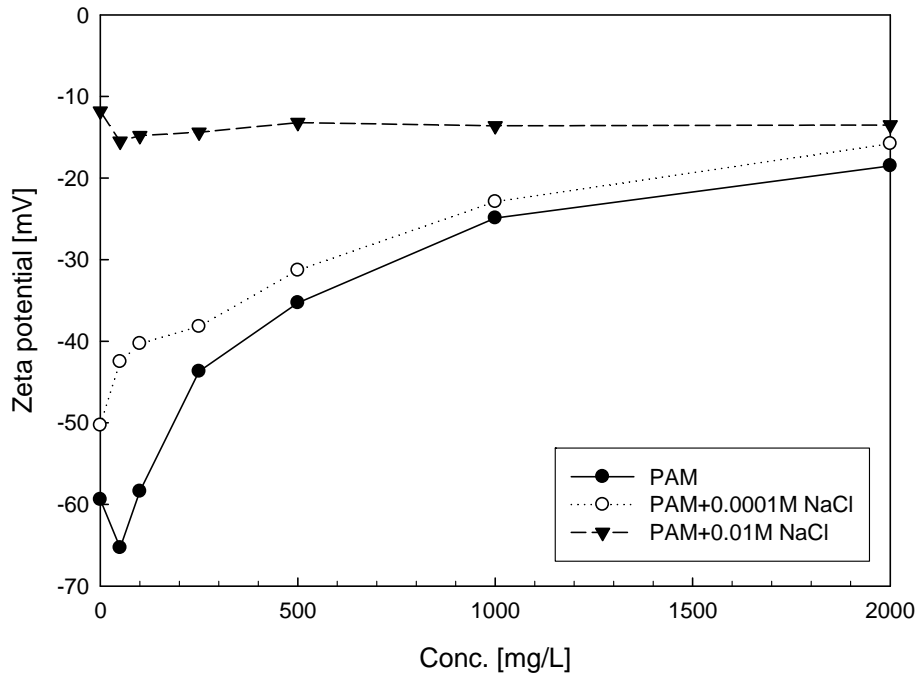
Fig[A-3] Experimental values of the stability ratio (W_{ii}) for $1.1\mu\text{m}$ colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



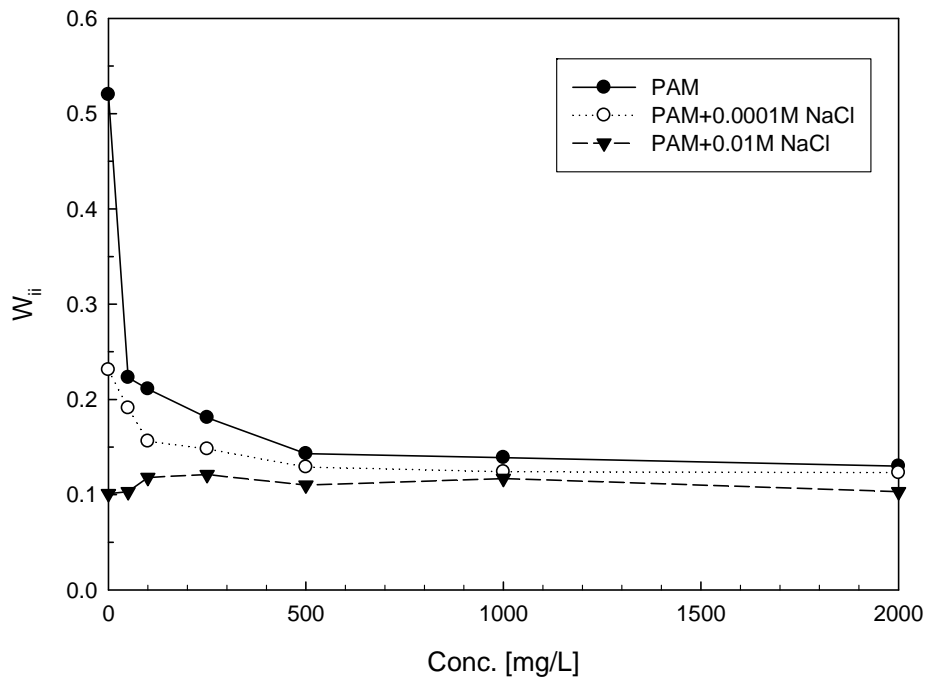
Fig[A-4] Plots of the zeta potential values for polystyrene colloids (particle diameter: $1.1\mu\text{m}$) at 25°C , as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



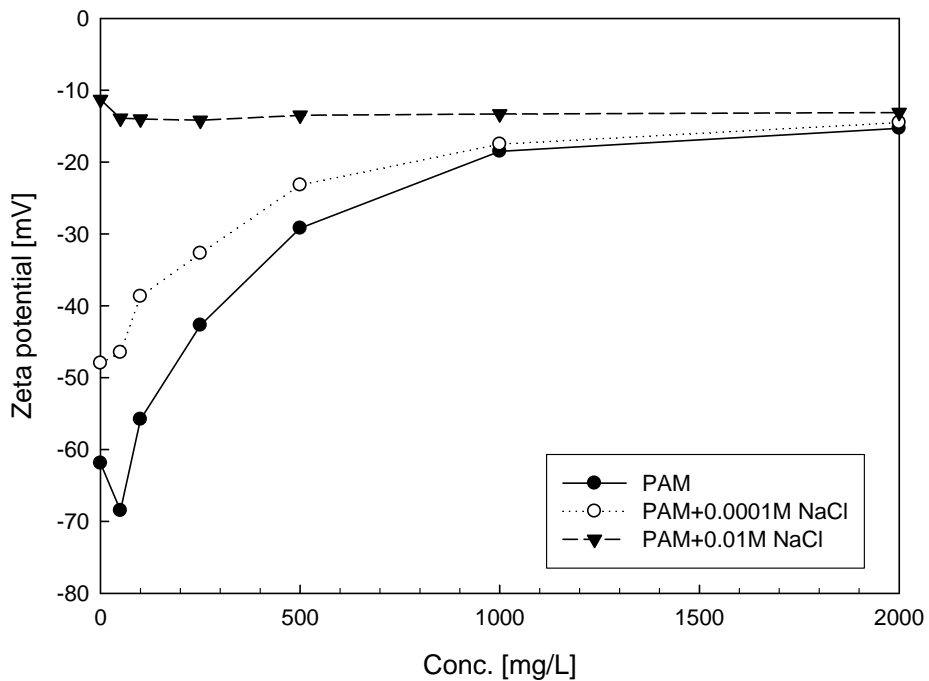
Fig[A-5] Experimental values of the stability ratio (W_{ii}) for 3.04 μ m colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



Fig[A-6] Plots of the zeta potential values for polystyrene colloids (particle diameter: 3.04 μ m) at 25 $^{\circ}$ C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



Fig[A-7] Experimental values of the stability ratio (W_{ii}) for 6.2 μ m colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



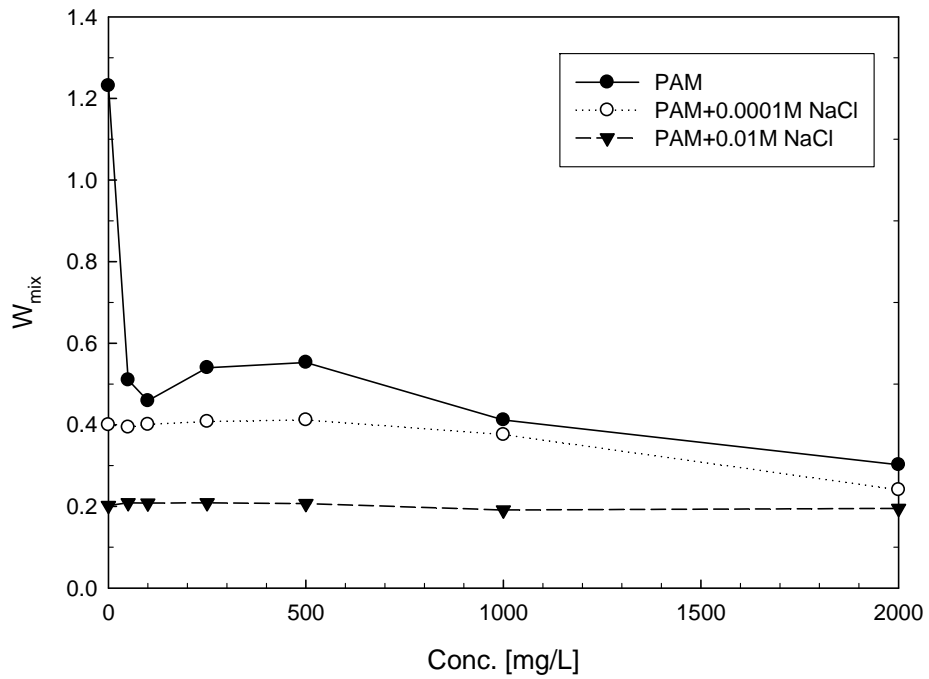
Fig[A-8] Plots of the zeta potential values for polystyrene colloids (particle diameter: 6.2 μ m) at 25 $^{\circ}$ C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.

附錄 B

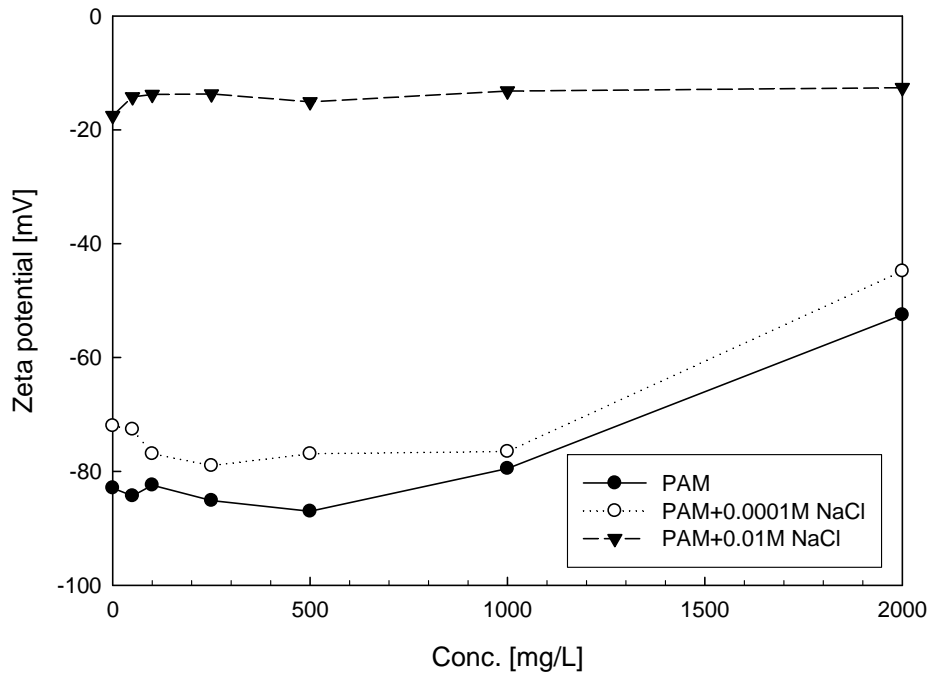
不同粒徑膠體粒子混合溶液的膠凝穩定圖

和

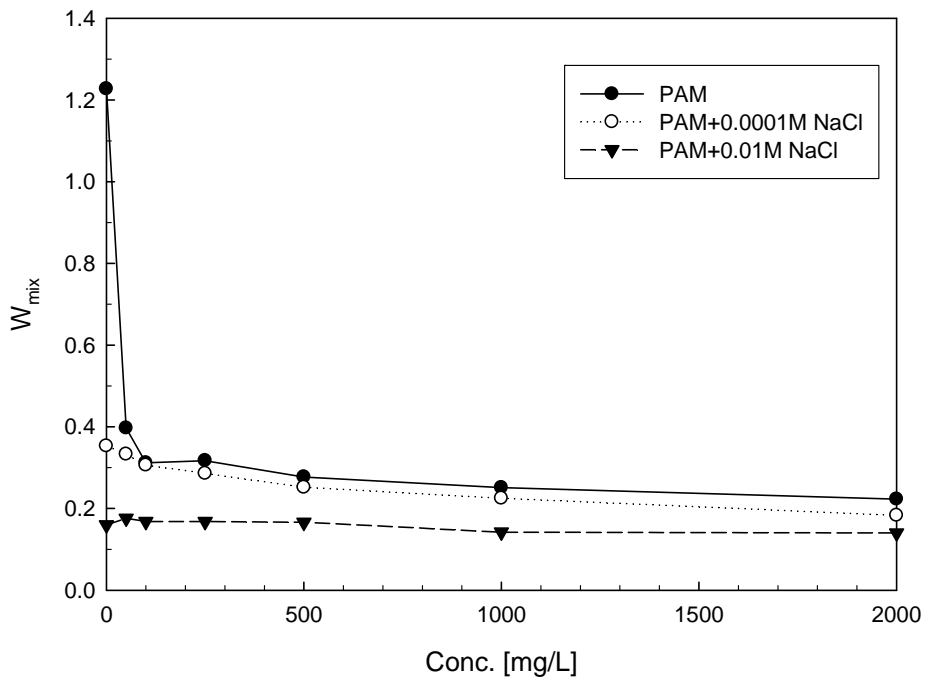
不同粒徑粒徑膠體粒子混合溶液的表面電位



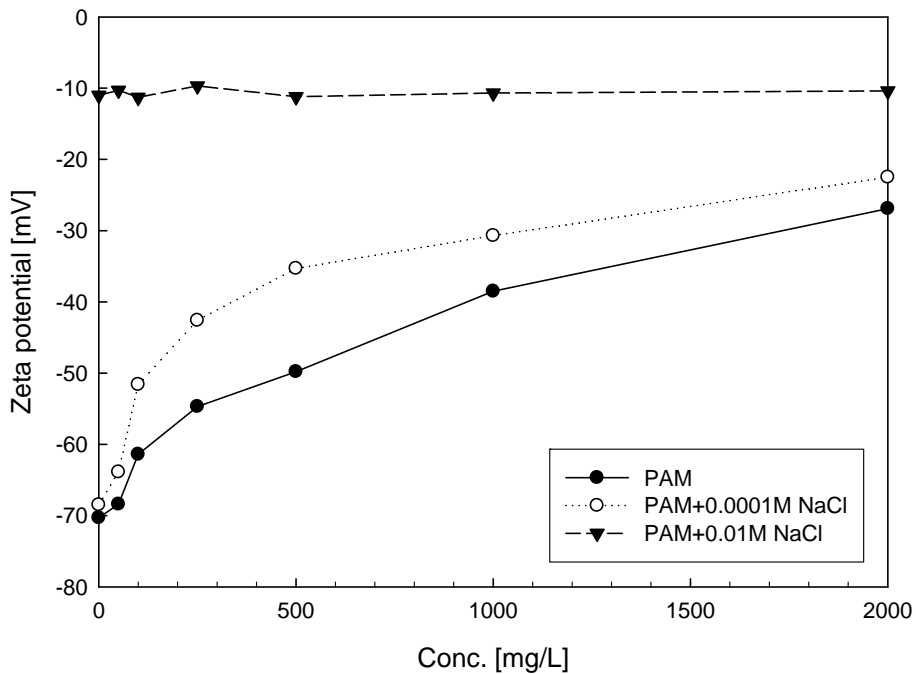
Fig[B-1] Experimental values of the stability ratio (W_{mix}) for 0.807 μm and 1.1 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



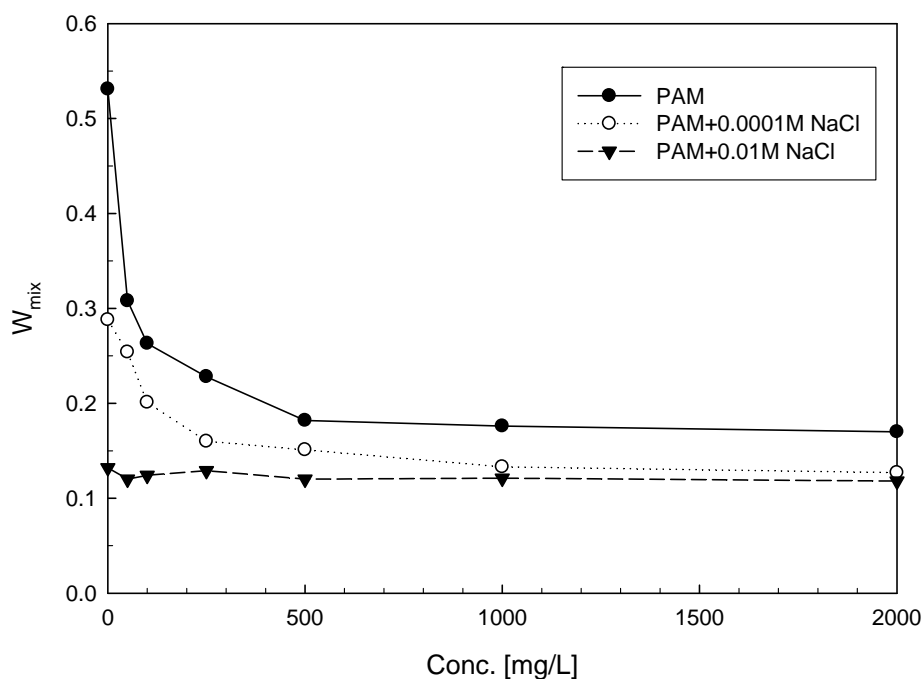
Fig[B-2] Plots of the zeta potential values for 0.807 μm and 1.1 μm colloids at 25°C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



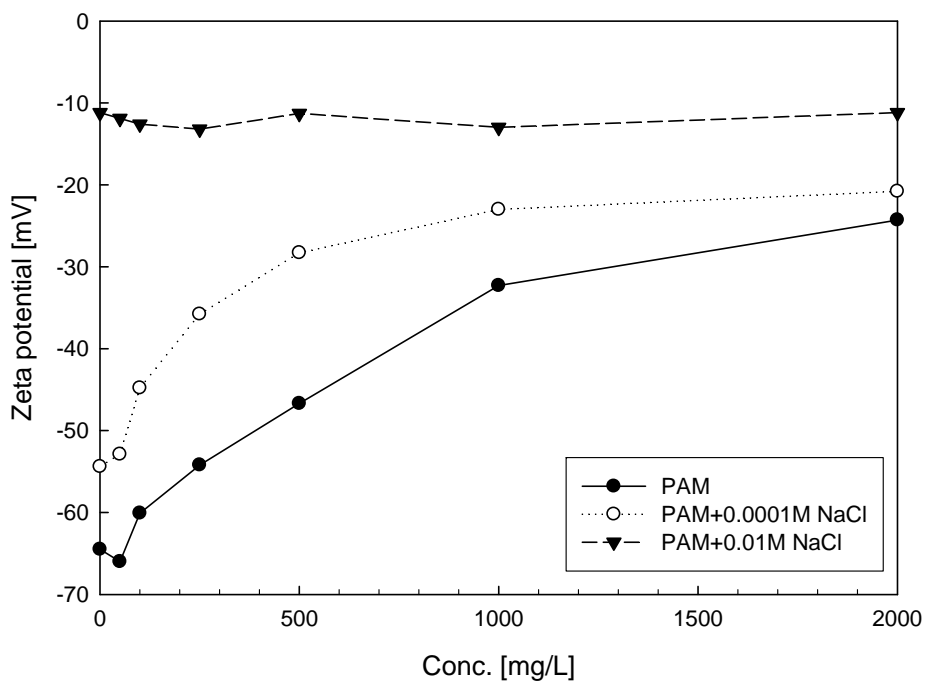
Fig[B-3] Experimental values of the stability ratio (W_{mix}) for 0.807 μm and 3.04 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



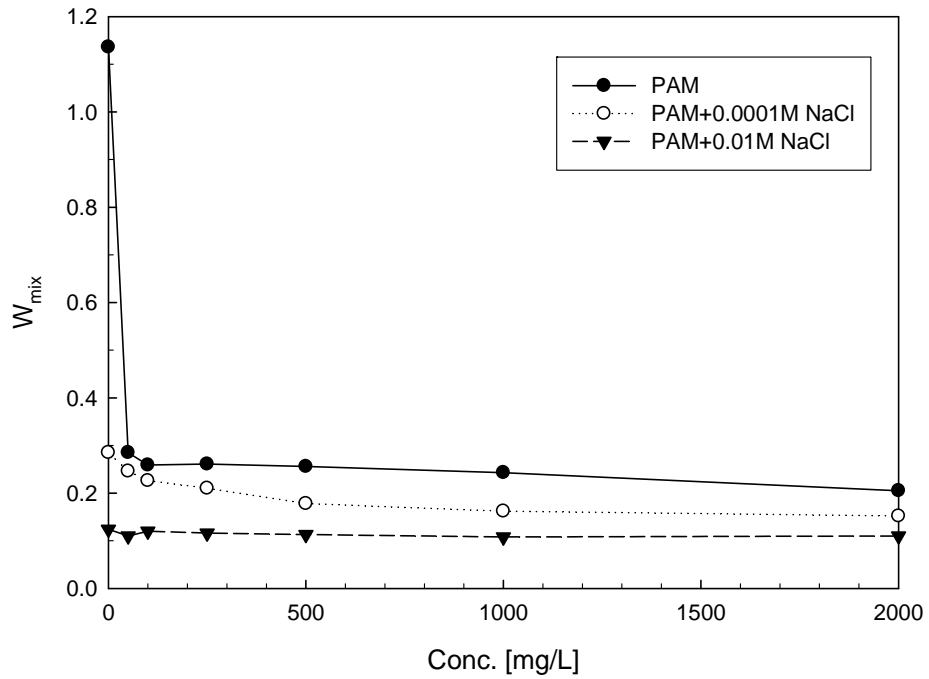
Fig[B-4] Plots of the zeta potential values for 0.807 μm and 3.04 μm colloids at 25 $^{\circ}\text{C}$, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



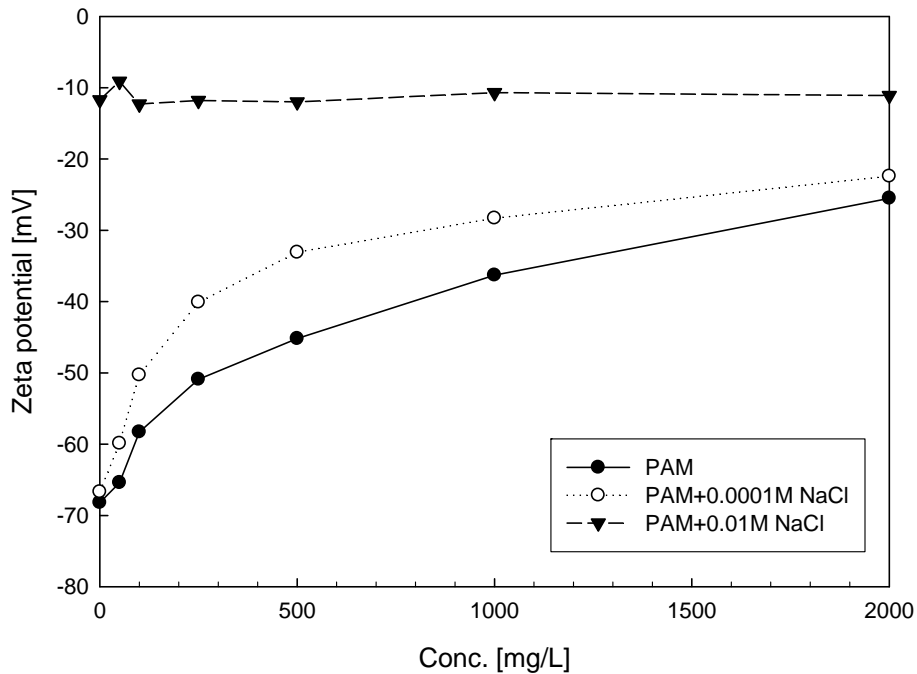
Fig[B-5] Experimental values of the stability ratio (W_{mix}) for 0.807 μm and 6.2 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



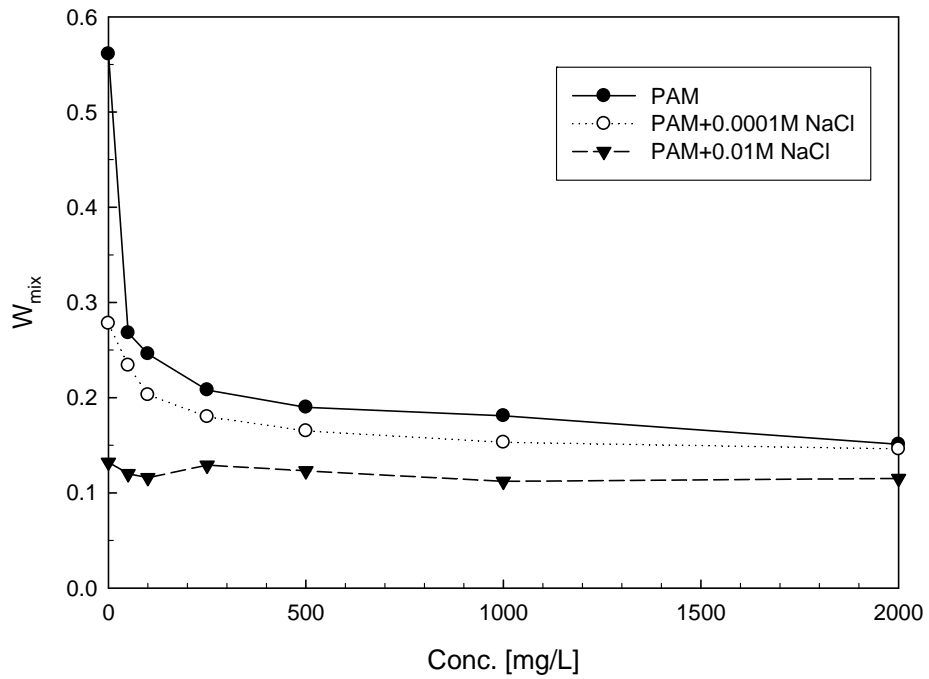
Fig[B-6] Plots of the zeta potential values for 0.807 μm and 6.2 μm colloids at 25°C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



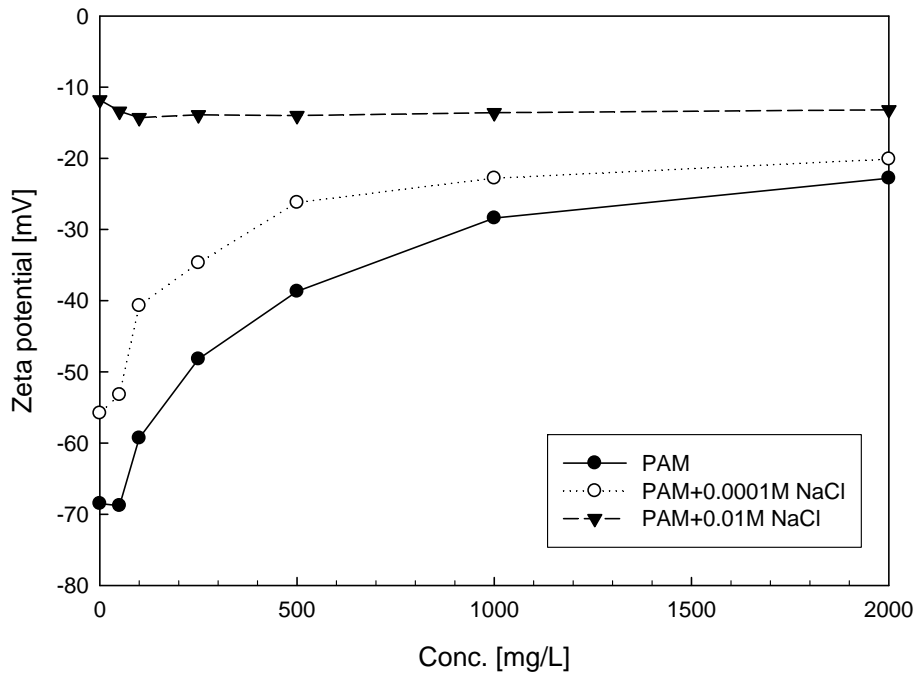
Fig[B-7] Experimental values of the stability ratio (W_{mix}) for 1.1 μm and 3.04 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



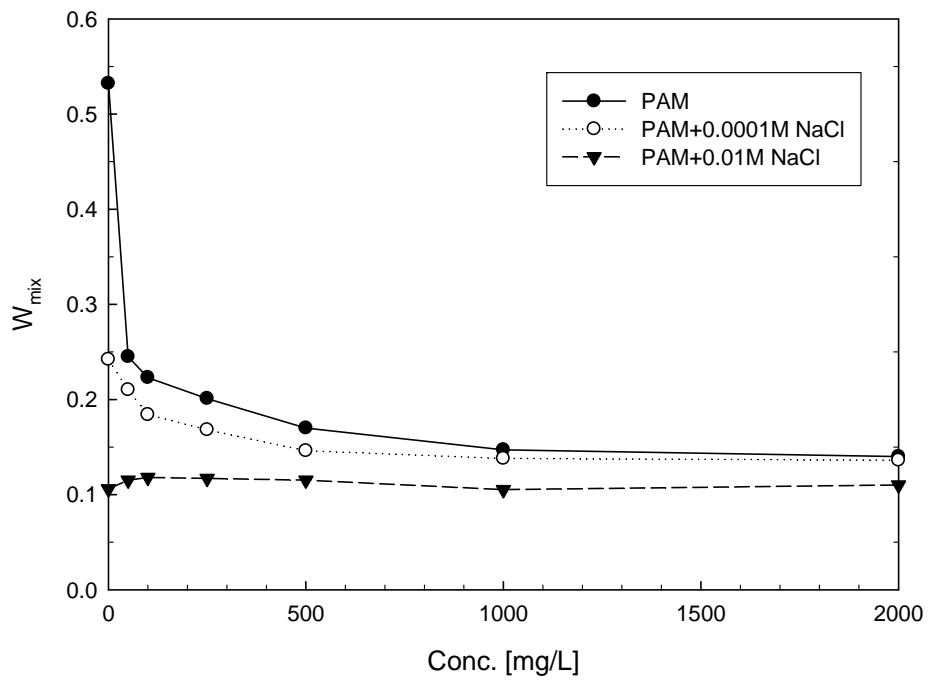
Fig[B-8] Plots of the zeta potential values for 1.1 μm and 3.04 μm colloids at 25°C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



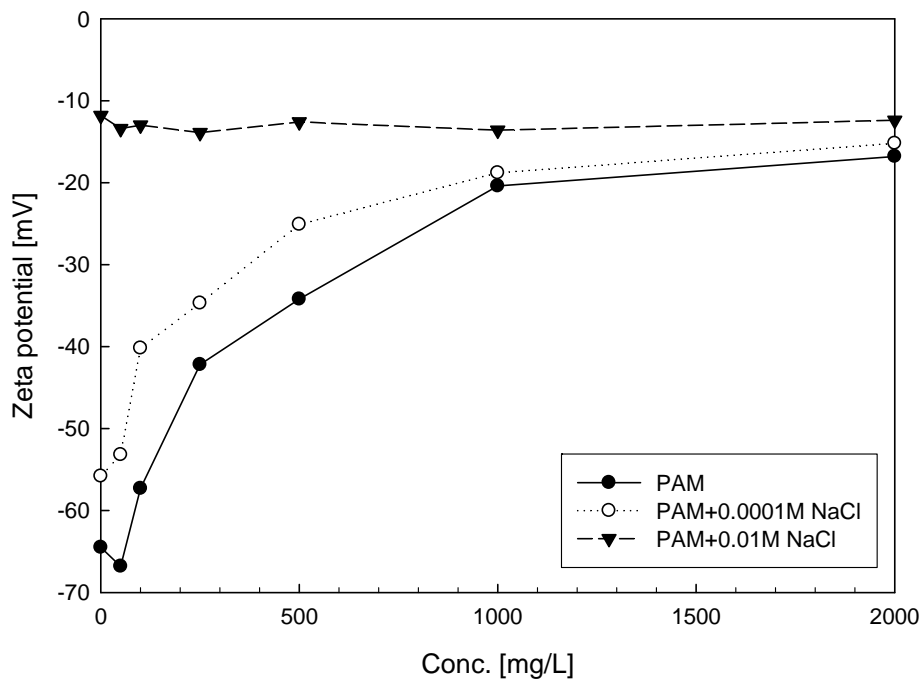
Fig[B-9] Experimental values of the stability ratio (W_{mix}) for 1.1 μm and 6.2 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



Fig[B-10] Plots of the zeta potential values for 1.1 μm and 6.2 μm colloids at 25°C, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.



Fig[B-11] Experimental values of the stability ratio (W_{mix}) for 3.04 μm and 6.2 μm colloids at different PAM concentrations without or with 10^{-4} M and 10^{-2} M NaCl.



Fig[B-12] Plots of the zeta potential values for 3.04 μm and 6.2 μm colloids at 25 $^{\circ}\text{C}$, as a function of the PAM concentration without or with 10^{-4} M and 10^{-2} M NaCl.

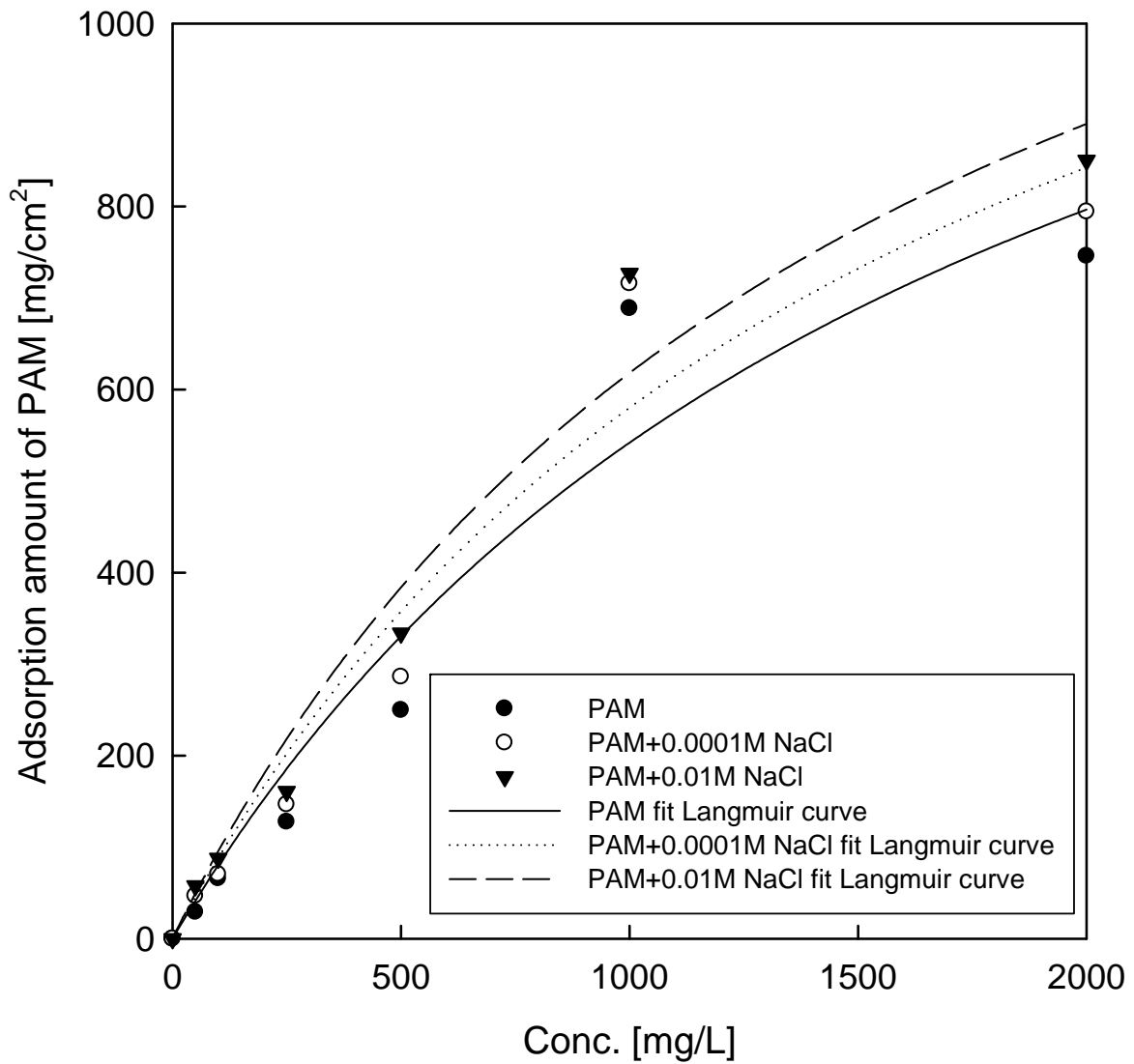
附錄 C

單一粒徑粒徑膠體粒子溶液

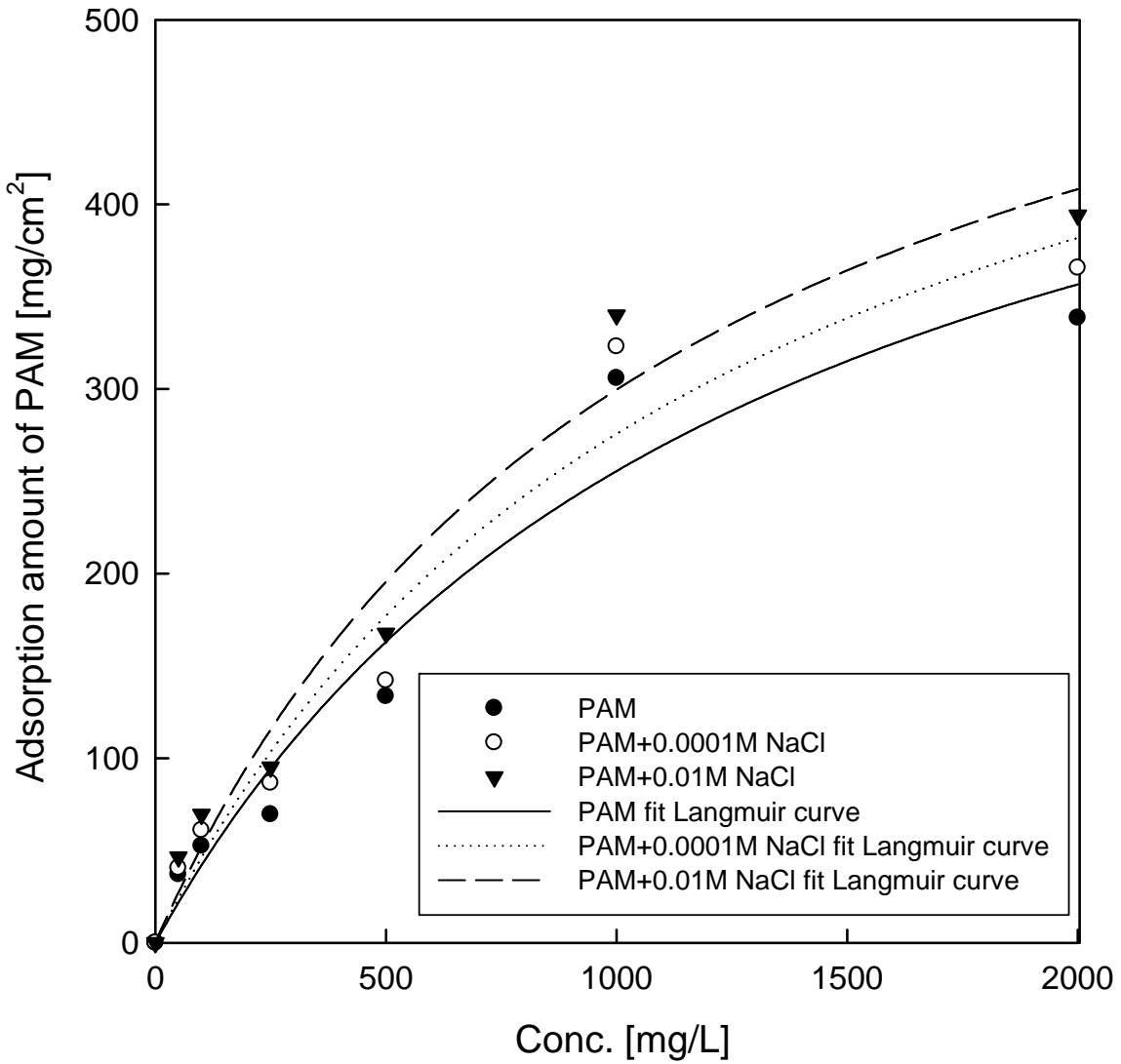
和

不同粒徑膠體粒子混合溶液

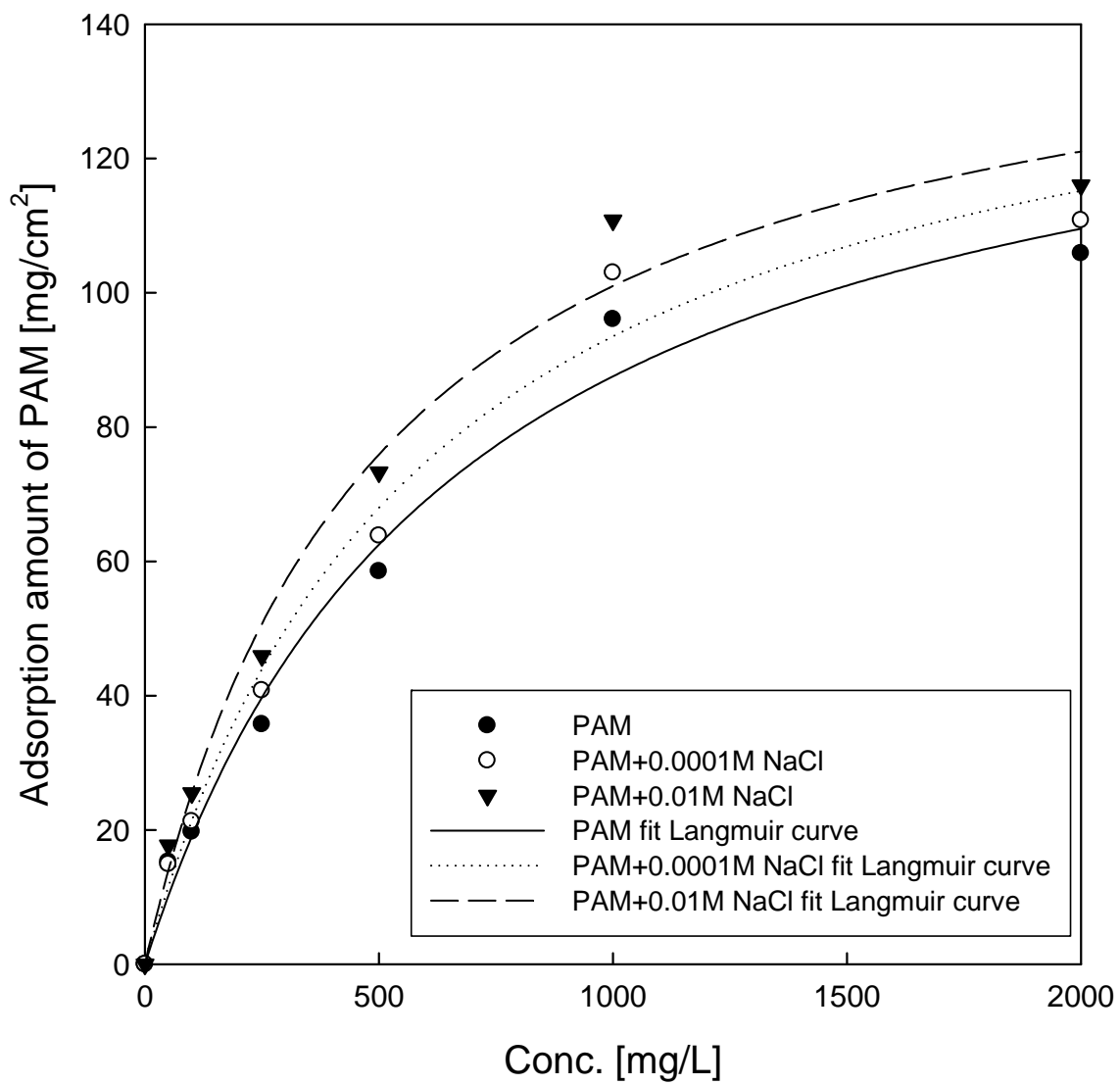
的 Langmuir 等溫吸附圖



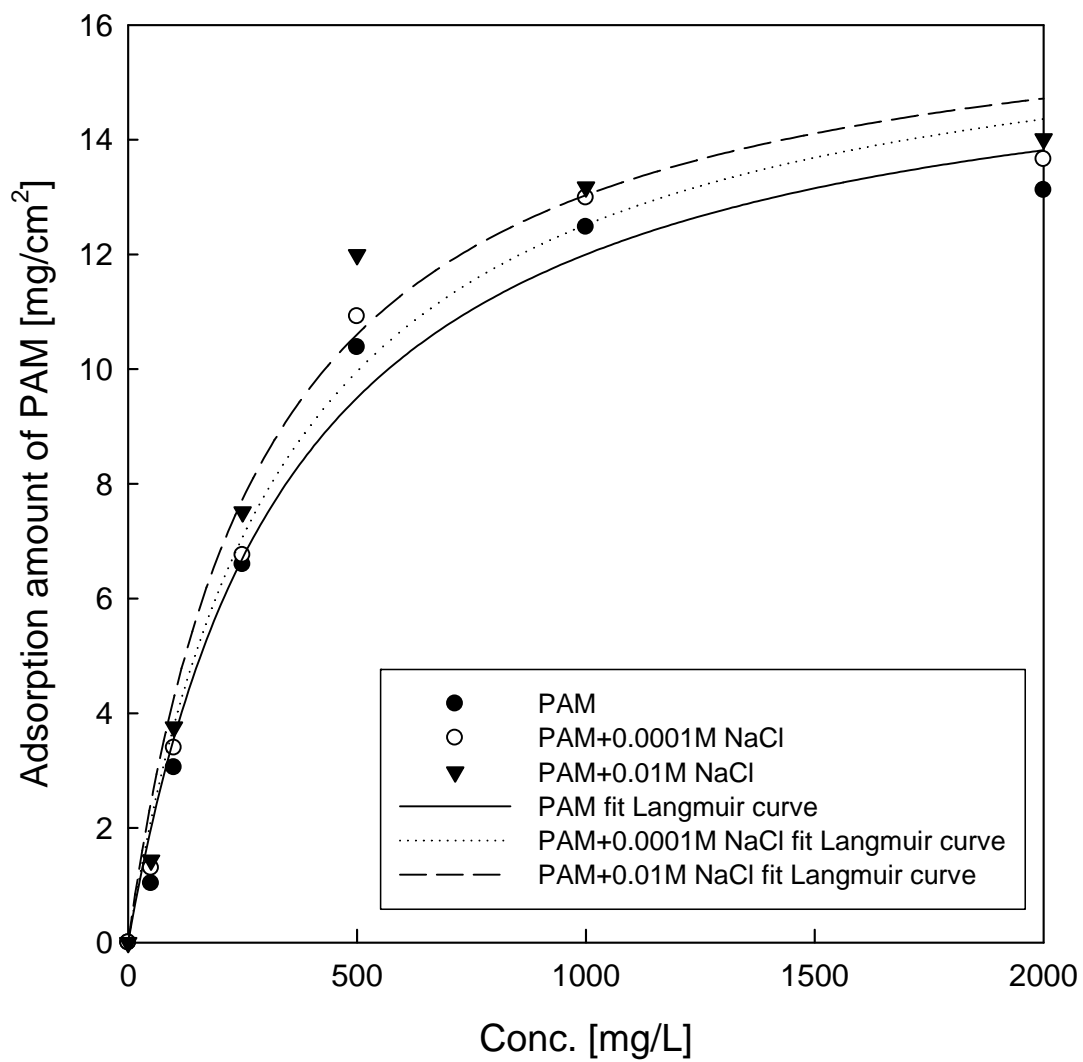
Fig[C-1] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto 0.807 μ m particles.



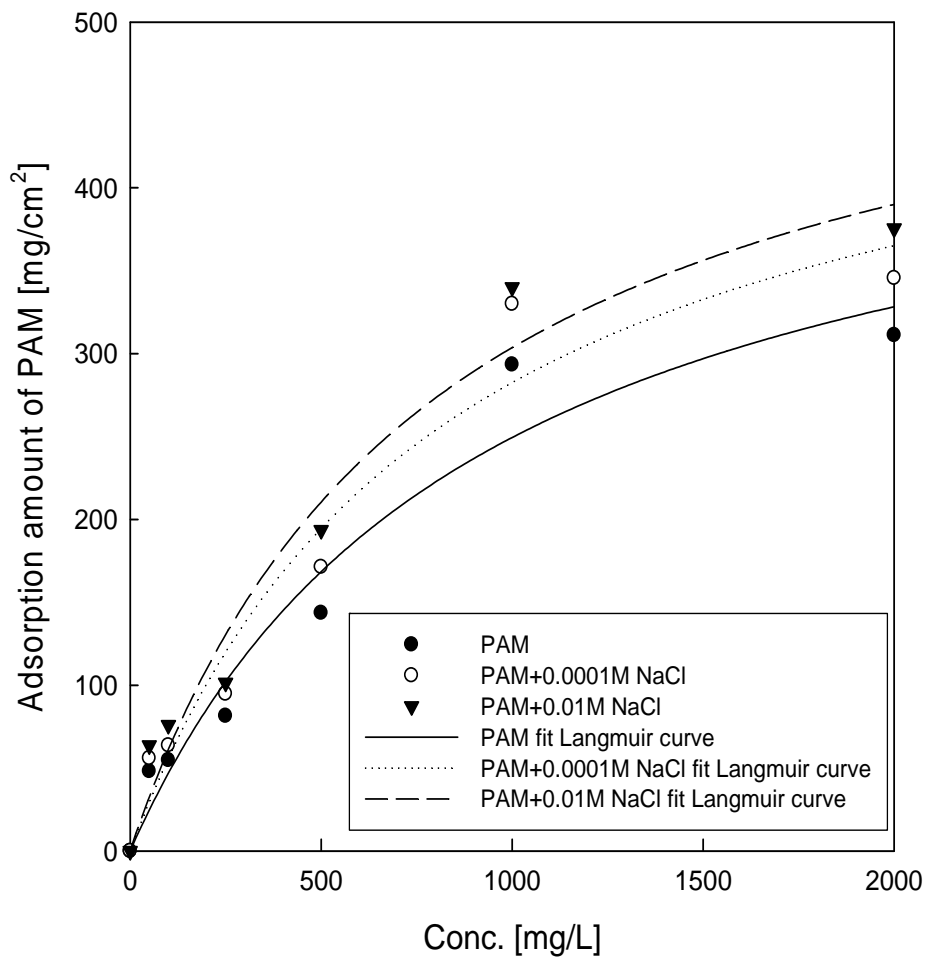
Fig[C-2] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto 1.1 mm particles.



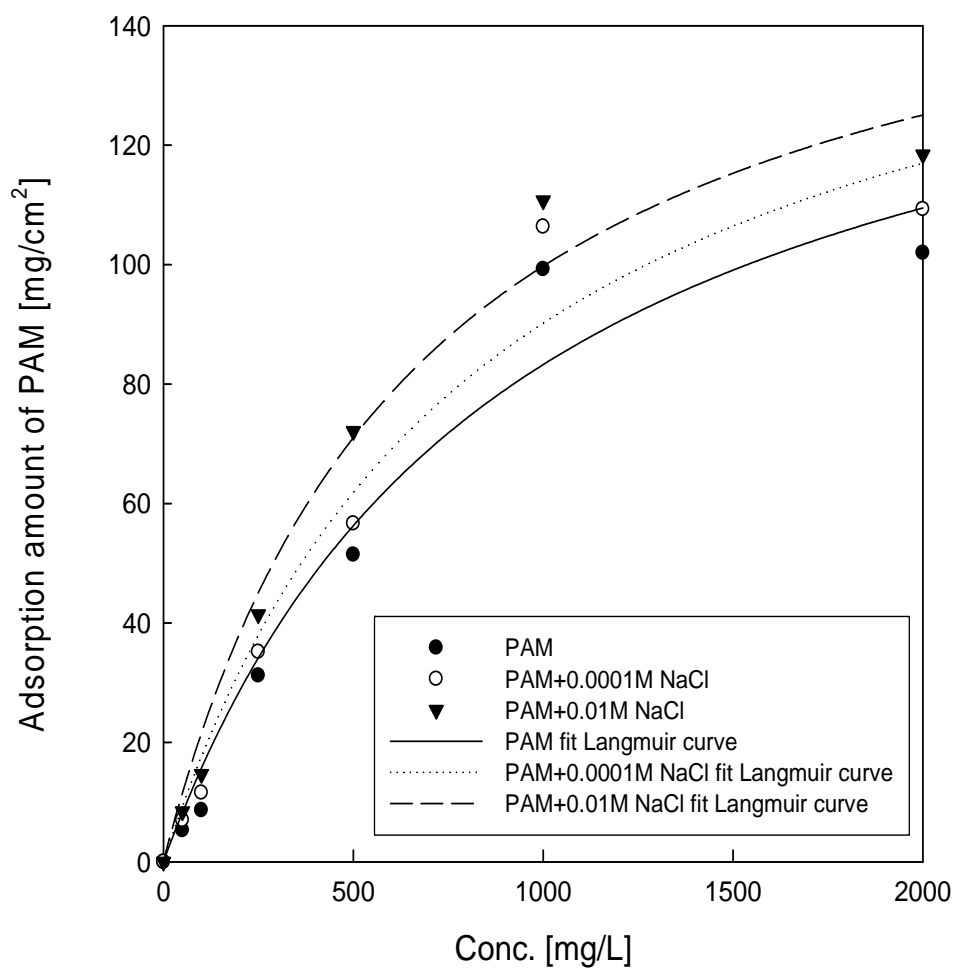
Fig[C-3] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $3.04 \mu\text{m}$ particles.



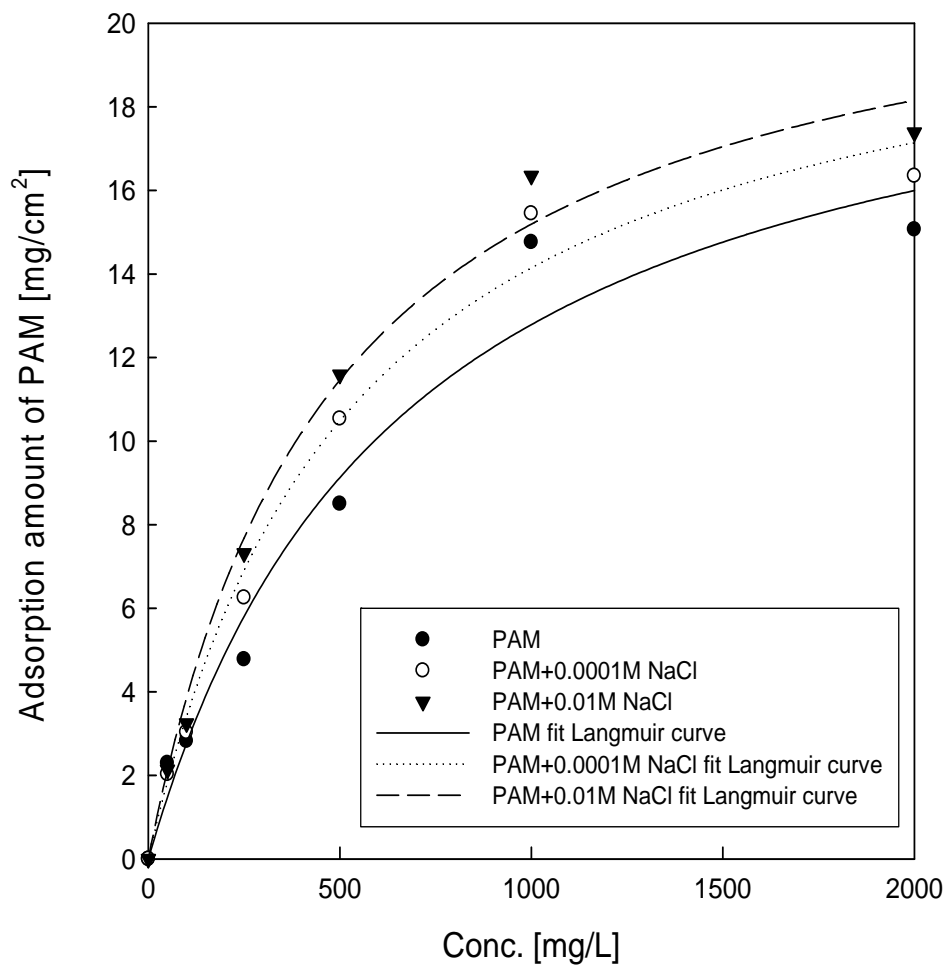
Fig[C-4] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $6.2 \mu\text{m}$ particles.



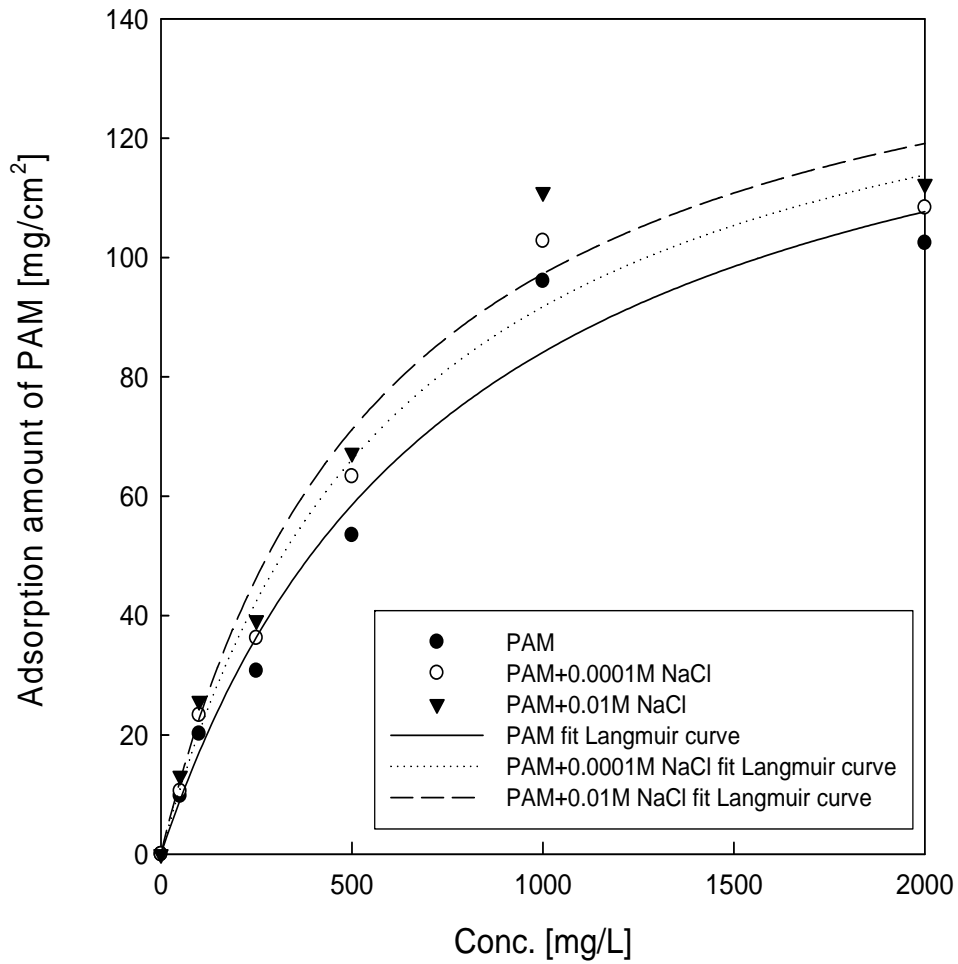
Fig[C-5] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $0.807 \mu\text{m}$ and $1.1 \mu\text{m}$ particles.



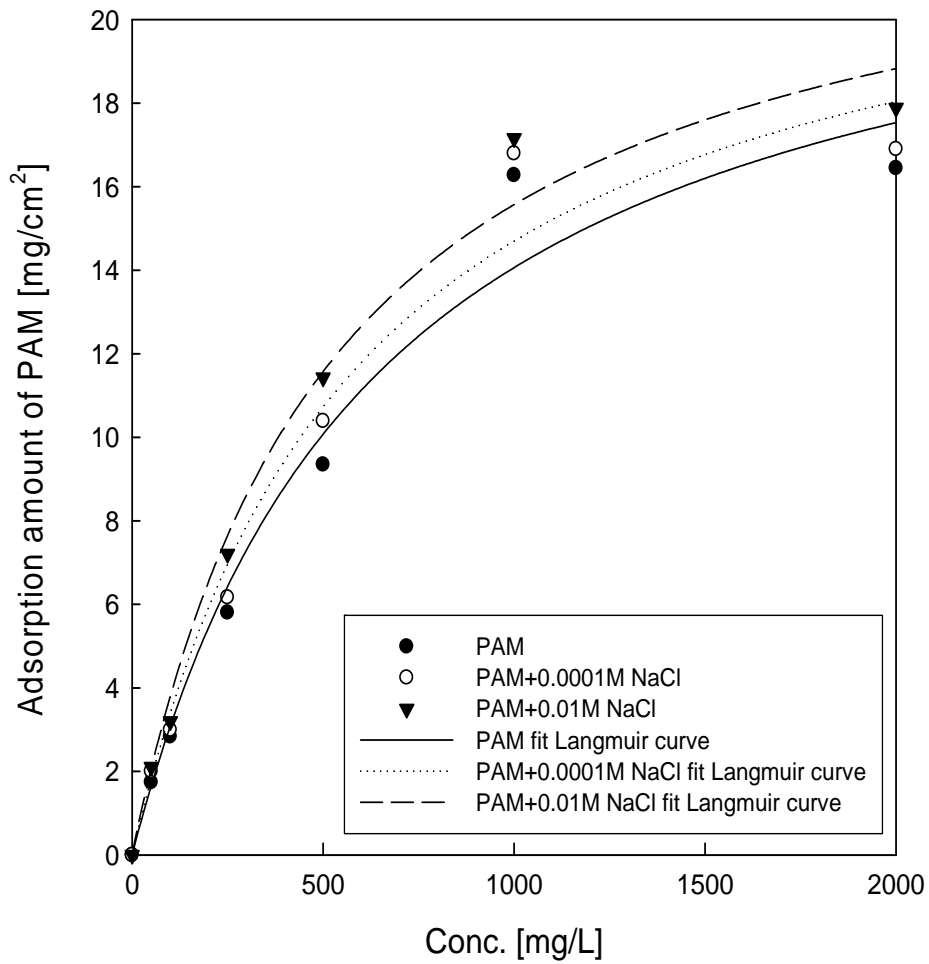
Fig[C-6] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $0.807 \mu\text{m}$ and $3.04 \mu\text{m}$ particles.



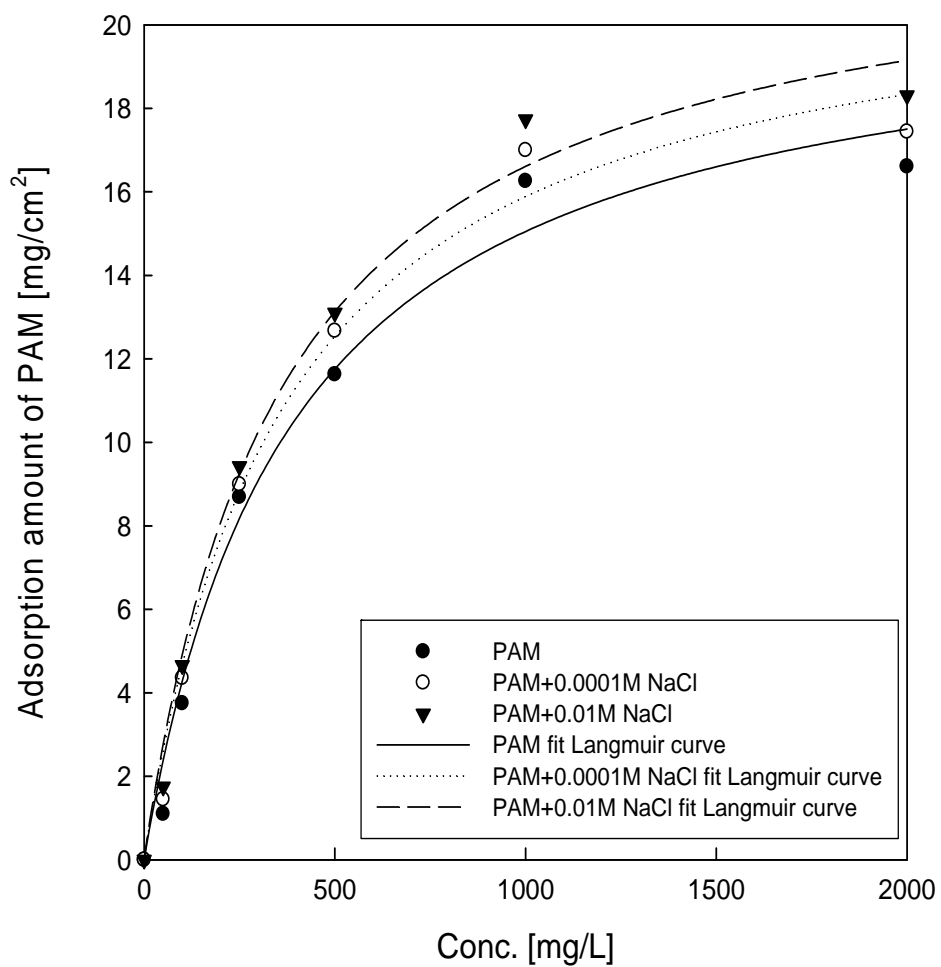
Fig[C-7] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto 0.807 μm and 6.2 μm particles.



Fig[C-8] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto 1.1 μm and 3.04 μm particles.

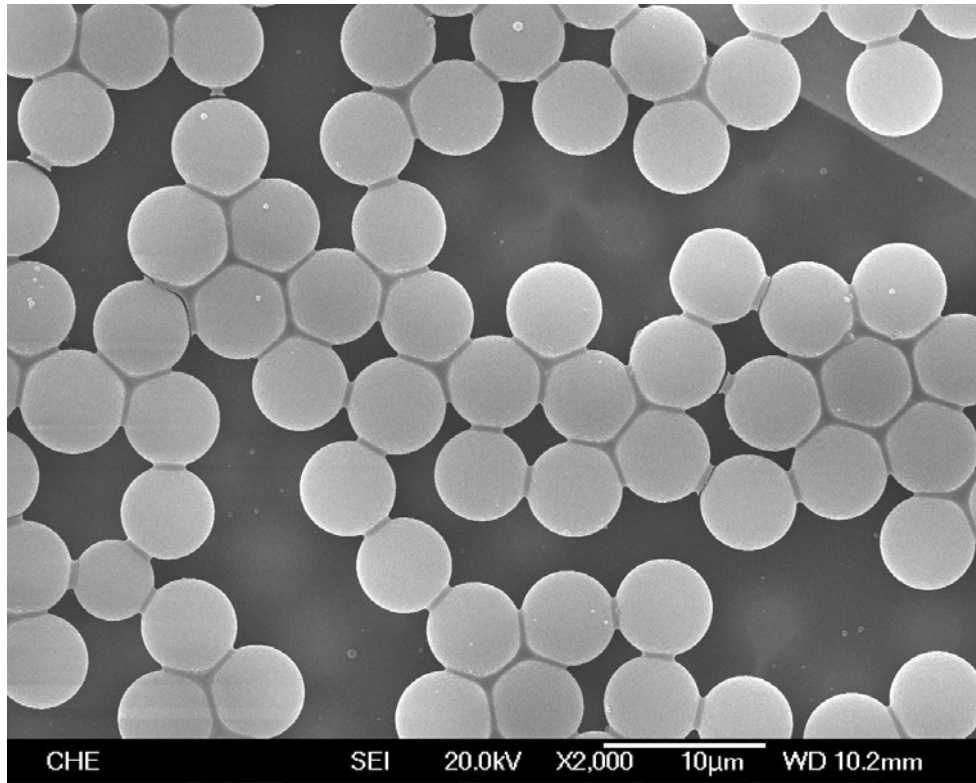


Fig[C-9] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $1.1 \mu\text{m}$ and $6.2 \mu\text{m}$ particles.

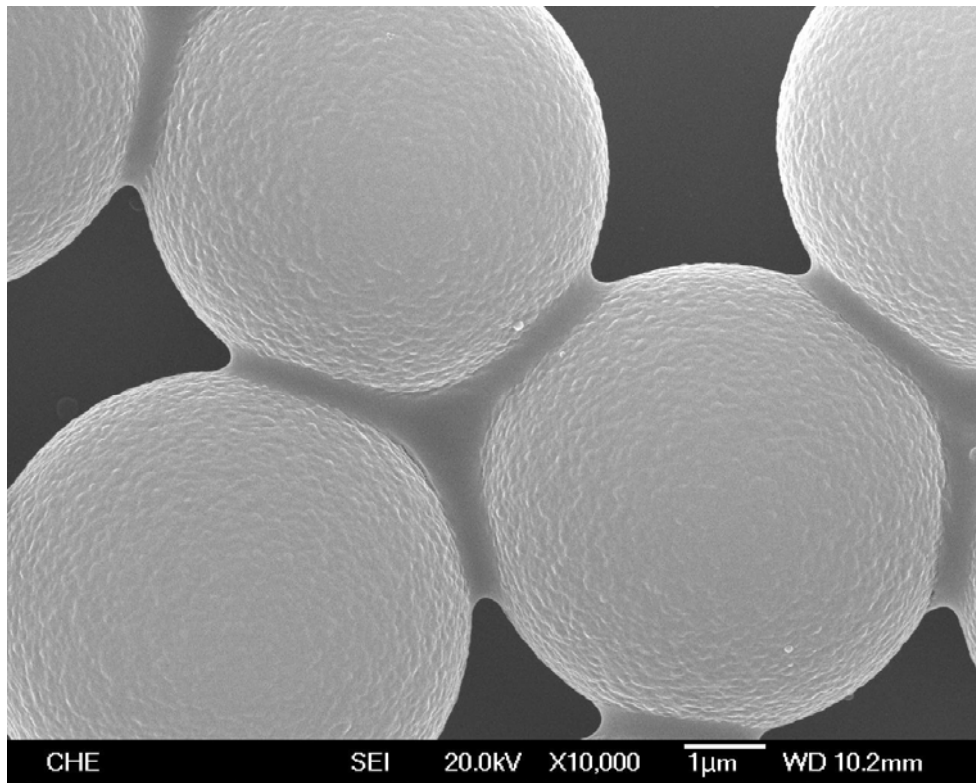


Fig[C-10] Langmuir adsorption isotherms of PAM without or with 10^{-4} M NaCl and 10^{-2} M NaCl onto $3.04 \mu\text{m}$ and $6.2 \mu\text{m}$ particles.

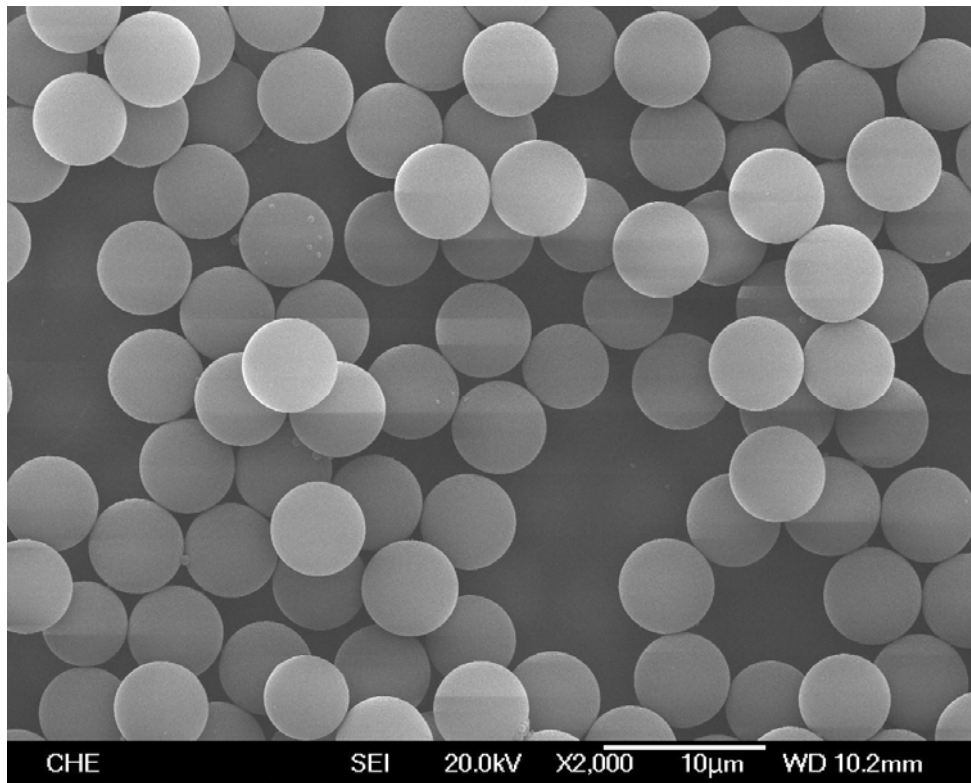
附錄 D
膠體粒子 SEM 影像



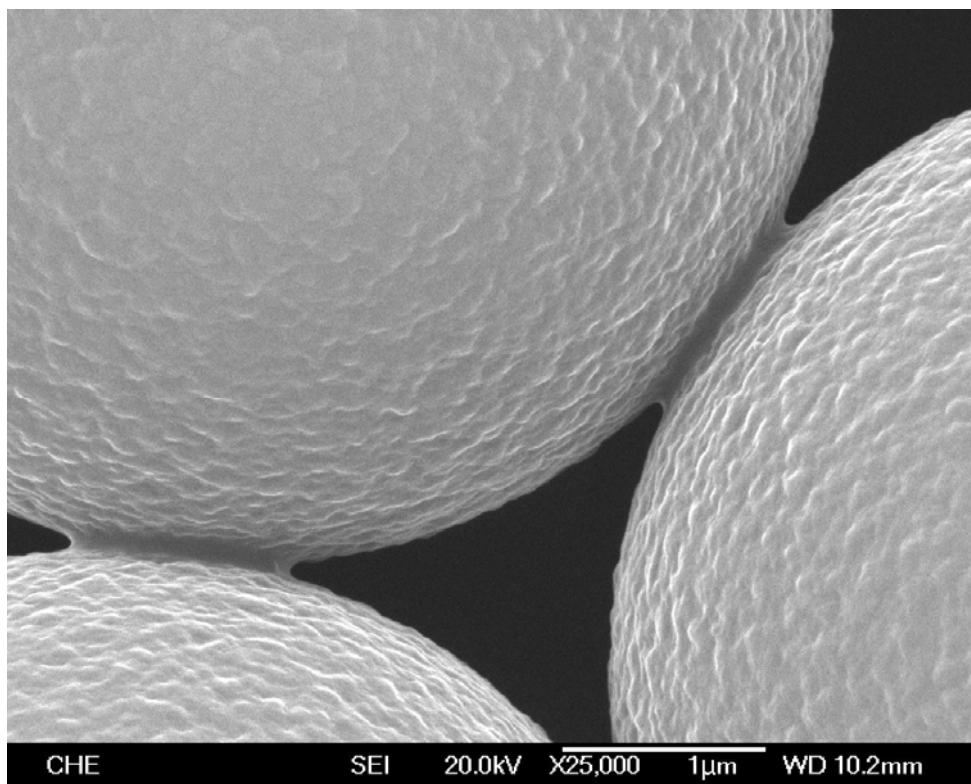
Fig[D-1] 1000ppm PAM+6.2 μ m 膠體粒子 2000 倍率 SEM 影像



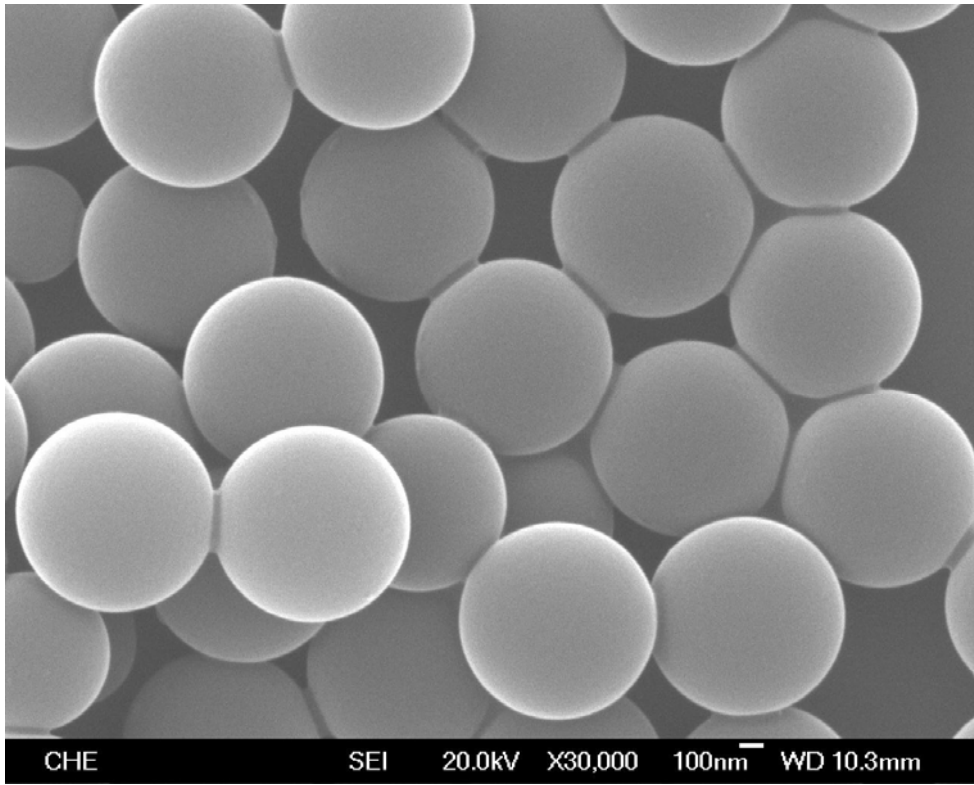
Fig[D-2] 1000ppm PAM+6.2 μ m 膠體粒子 10000 倍率 SEM 影像



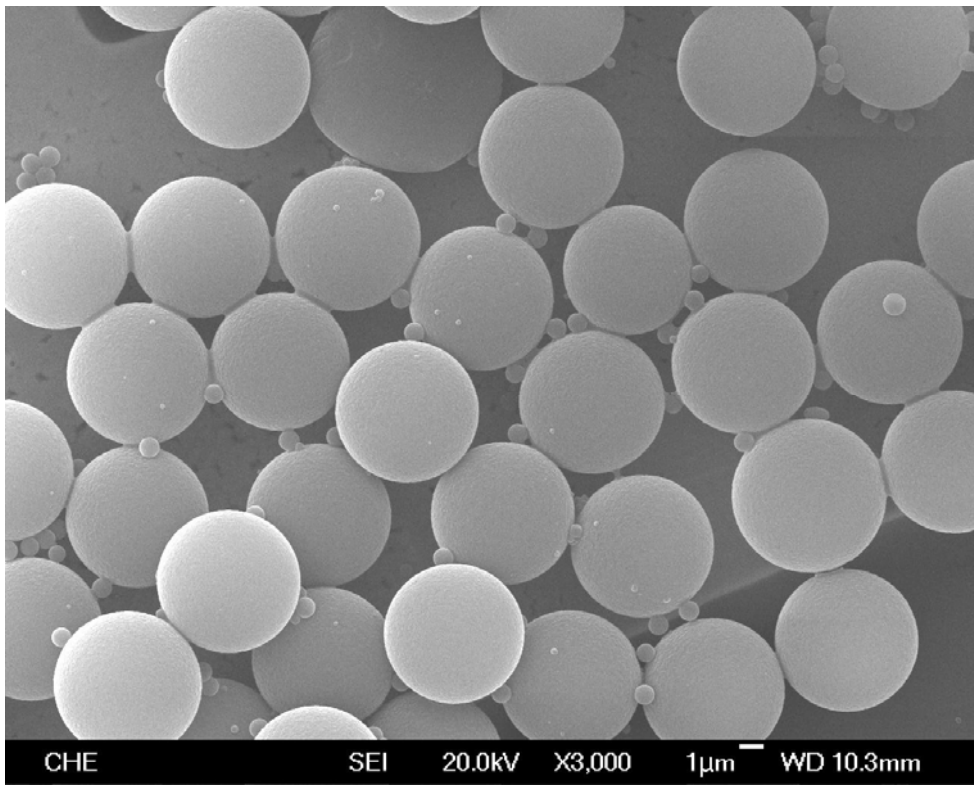
Fig[D-3] 500ppm PAM+6.2 μ m 膠體粒子 2000 倍率 SEM 影像



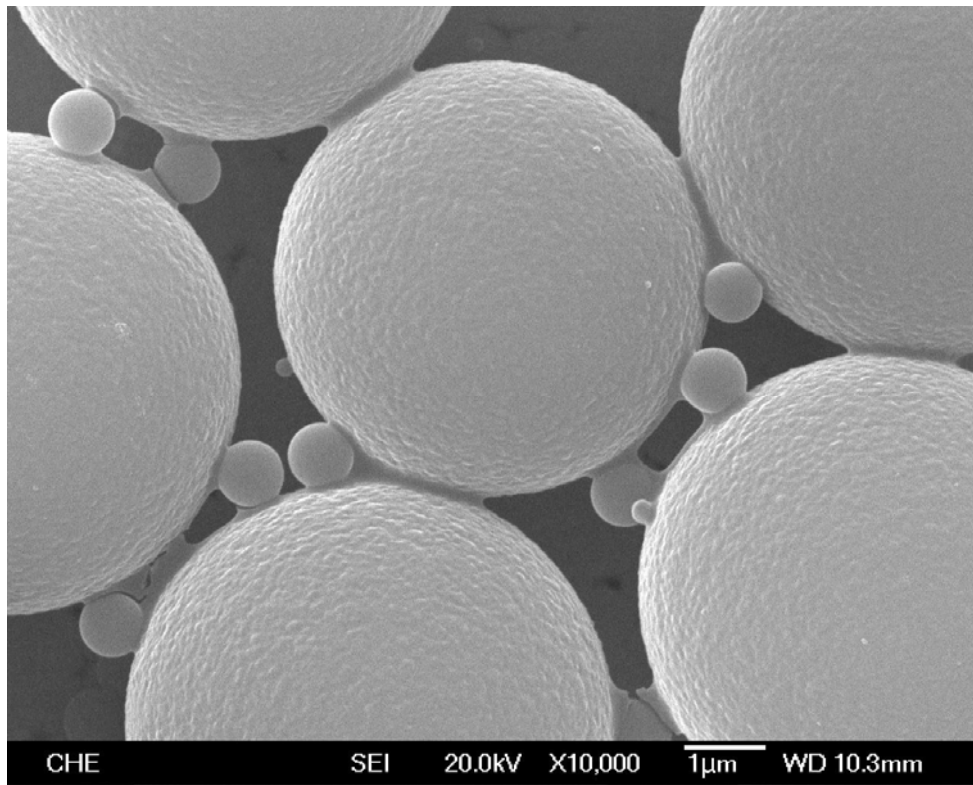
Fig[D-4] 500ppm PAM+6.2 μ m 膠體粒子 25000 倍率 SEM 影像



Fig[D-5] 1000ppm PAM+0.087 μ m 膠體粒子 30000 倍率 SEM 影像



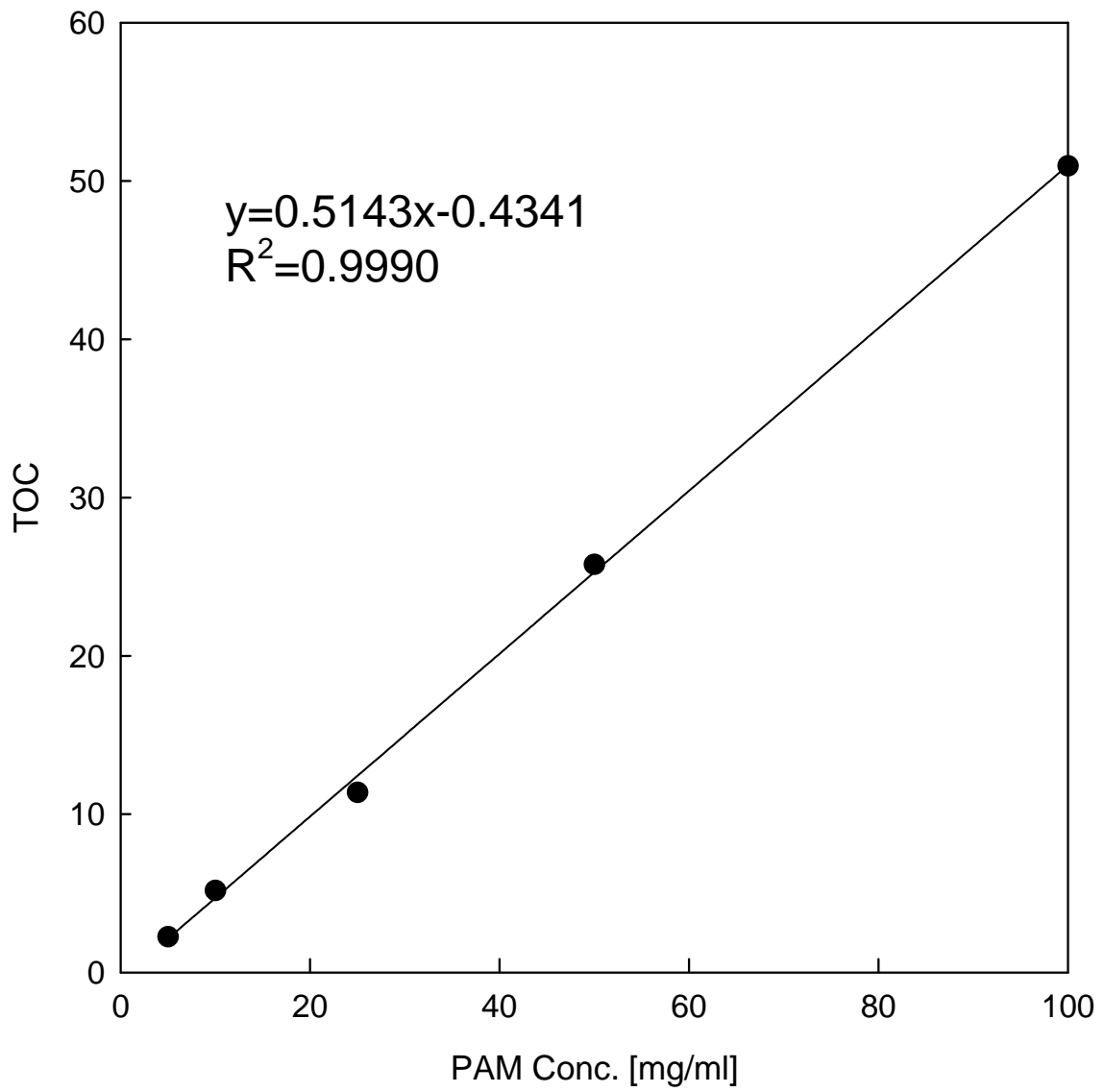
Fig[D-6] 1000ppm PAM+6.2 μ m+0.807 μ m 膠體粒子 3000 倍率 SEM 影像



Fig[D-7] 1000ppm PAM+6.2μm+0.807μm 膠體粒子 10000 倍率 SEM 影像

附錄 E

總有機碳數 (TOC) 對 PAM 濃度的檢量線



Fig[E-1]總有機碳數 (TOC) 對 PAM 濃度的檢量線