(I) X, Y Fréchet-R.

$T : (X', \sigma(X', X)) \longrightarrow (Y', w^*)$ closed graph

$\Longrightarrow T$ w^*-w^*-cont. ?

(II) A, B w^*-closed $\subset X'$, alg. compl. $\Longrightarrow$

A, B w^*-top.

R., Math. Proc. Camb. Phil. Soc. 1977

(B) (X, τ) lcs, $(X, \tau(X, X'))$ seq. complete

(Y, ρ) metrizable

$T : (X', w^*) \longrightarrow (Y', w^*)$ cl. gr. $\Longrightarrow$ w^*-w^*-cont

T lin. cl. gr. $\left\{ \begin{array}{l} B \longrightarrow B \\ F \longrightarrow F \\ \text{tonneliert} \longrightarrow B_r\text{-compl.} \\ \text{ultrabornol.} \longrightarrow \text{webbed} \\ \quad \text{seq. cl. graph} \end{array} \right\} \Longrightarrow T$ cts.

M. De Wilde

Köthe II : p. 79 : $T : (X', w^*) \longrightarrow (Y', w^*) \Longrightarrow w^*$-$w^*$-cts
seq. closed

(A)

M. De Wilde p. 99 (thèse 69)

$\Longrightarrow \ell^\infty$ refl.

(A) X B-R., $x_n^* \xrightarrow{w^*} 0 \Leftrightarrow x_n \xrightarrow{\text{weakly}} 0$ (Bspl. ℓ^∞)

Case 1: $\ell_1 \subset X^*$: $T : \ell^1 \hookrightarrow X^*$ isom. into : T $\sigma(\ell^1, c_0) - \sigma(X^*, X)$ - seq. cl. gr.

$(\alpha_n)_n \xrightarrow{w^*} \alpha \in \ell^1$

$(T\alpha_n) \xrightarrow{w^*} x^* \Rightarrow T(\alpha_n) \longrightarrow x^* = T(\beta)$

$\beta = T^{-1}(T(\beta)) = \lim \alpha_n = \alpha$

$\overset{\Rightarrow}{(A)}$ $T : (\ell^1, \sigma(\ell^1, c_0)) \longrightarrow (X^*, w^*)$

$T(B_{\ell^1})$ w cpt. $\Rightarrow B_{\ell^1}$ w-cpt.

Case 2: $\ell^1 \not\subset X^* \overset{\text{Rosenthal}}{\Longleftrightarrow}$ every bd. seq. in X^* has a weak C-subseq. $\Rightarrow X^*$ refl.