

In vitro reconstitution of rotavirus transcriptional activity using viral cores and recombinant baculovirus expressed VP 6

Kohli, Evelyne

Pothier, P.

Tosser, Gwenola

Cohen, Jean

Sandino, Ana Maria

Spencer, E.

Purified baculovirus-expressed group A rotavirus VP 6 polypeptide was shown to be active in the recovery of the transcriptase activity associated with the reconstitution of the single-shelled rotavirus particle. Recombinant VP 6 polypeptide was able to restore the transcriptional activity in purified viral cores from both SA-11 and RF rotavirus strains. Recombinant group C VP 6 (Cowden strain) is capable of binding as a trimer to group A viral core particles but unable to restore the transcriptase activity, suggesting that the binding of the polypeptide to cores is not the only requirement to restore the transcriptase activity. The VP 6 group A polypeptide was shown to bind as a monomer to viral cores, indicating that trimerization of VP 6 may be not required for reconstitution of the polymerase activity. © 1993 Springer-Verlag.