The Long Interspersed Nuclear Element-1 (LINE-1) or L1 elements are active members of an autonomous family of non-LTR retrotransposons and comprise up to 17% of the human genome. The L1 elements re-integrate into the genome via RNA intermediates by using a self-encoded reverse transcriptase (RT). The majority are 5’ truncated with only approximately 80-100 copies are retrotransposition-competent.

We are conducting a systematic study of the polymerization properties of the reverse transcriptase encoded by the human L1 element. Here, we demonstrate further characteristics of DNA synthesis catalysed by the L1RT, namely the processivity and an accumulation of cDNA products of extended range *in vitro*. The accumulation occurs during the first DNA strand synthesis in which reverse transcription is primed by an oligonucleotide annealed to the L1 RNA template. The association of the termination probability for L1 RT with the distribution of the L1 insertion lengths in the human genome is discussed.