

торым становится возможным распознавание других сайтов (Li et al., 2008). Однако основываясь на наших данных, можно выдвинуть гипотезу о том, что одна из основных функций roX состоит в обеспечении взаимодействия комплекса дозовой компенсации с белком CLAMP, который в свою очередь осуществляет привлечение комплекса к большинству специфичных сайтов на X-хромосоме.

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LONG NONCODING RNA roX IS NECESSARY FOR INTERACTION BETWEEN CLAMP PROTEIN AND DROSOPHILA MELANOGASTER DOSAGE COMPENSATION COMPLEX

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Drosophila melanogaster dosage compensation complex includes several proteins and long non-coding RNA roX, which is supposed to be necessary for dosage compensation complex assembly. roX also participates in dosage compensation complex recruitment on X-chromosome. However an importance of roX in pre-assembled complex maintaining is still unclear. DNA-binding CLAMP protein possibly participates in recruitment of the complex to the X-chromosome. Here, we demonstrate that RNA degradation leads to release of CLAMP protein from the complex. This finding shows the roX significance in structure maintenance of dosage compensation complex and its recruitment on X-chromosome.

Ключевые слова: dosage compensation, long-coding RNA, RNA-protein interactions, dosage compensation complex, MSL-complex