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*Lifting Tropical Self-Intersections*

Given a plane curve  $C$ , we say a tropical divisor  $D$  on  $\text{Trop}(C)$  is  $C$ -realizable if there exists a plane curve  $C'$  with  $D = \text{Trop}(C \cap C')$  and  $\text{Trop}(C) = \text{Trop}(C')$ . We prove that the set of  $C$ -realizable divisors form a polyhedral complex. Moreover, if the genus of  $C$  is at most 1, we give a combinatorial condition guaranteeing realizability of  $D$ . This is based on joint work with Yoav Len.