Maximal green sequences for arbitrary triangulations of marked surfaces (Extended Abstract)

Matthew R. Mills $^{\ast 1}$

 1 University of Nebraska-Lincoln
 - 1400 R StreetLincoln, NE 68588, United States

Abstract

In general, the existence of a maximal green sequence is not mutation invariant. In this paper we show that it is in fact mutation invariant for cluster quivers associated to most marked surfaces. We develop a procedure to find maximal green sequences for cluster quivers associated to an arbitrary triangulation of closed higher genus marked surfaces with at least two punctures. As a corollary, it follows that any triangulation of a marked surface with at least one boundary component has a maximal green sequence.

*Speaker