

عنوان مقاله:

The Lime and Flocculant Dose Optimization in the Clarification Process of a Sugar Factory

محل انتشار:

فصلنامه شیمی نوین، دوره 6، شماره 3 (سال: 1398)

تعداد صفحات اصل مقاله: 5

نویسندگان:

Ehsan Darouneh - Chemical Engineering Faculty, Dezful Brach, Islamic Azad University, Dezful, Iran

Tahereh Pirhooshayan - Chemical Engineering Faculty, Dezful Brach, Islamic Azad University, Dezful, Iran

Hashem Shalagheh - Agro-Industry Company of Karoon, Khuzestan, Iran

خلاصه مقاله:

The objective of this research was the economic analysis of two different methods for the clarification of sugarcane juice. The first method was the method of using 700 ppm of CaO (final pH=7.9) and 1 ppm of Separan flocculant which previously was being used. The other method was using 500 ppm of CaO (final pH=7.4) and 3 ppm of Separan flocculant. This study was carried out on an industrial scale in the Karoon sugar industry in south west of Iran. The results showed that increasing the amount of Separan and reducing the amount of lime directly increases the purification and the brix of the juice besides reducing the amount of lime precipitation in the evaporators. Economic analysis of the total process showed that the second method of clarification was 5 % more economical.

کلمات کلیدی:

Clarification, Separan, lime, Economic Analysis, Sugarcane

لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/887687>

