

عنوان مقاله:

Correlation between Microbial Quality and Organic Content in the Effluent of an Activated Sludge Wastewater Treatment Plant

محل انتشار:

نشریه بین المللی علوم بهداشت، دوره 2، شماره 1 (سال: 1393)

تعداد صفحات اصل مقاله: 6

نویسندگان:

Gh.R Mostafaii - *Social Determinants of Health Research Center and Environment Health Department, Public Health Faculty, Kashan University of Medical Sciences, Kashan, Iran*

M.B Miranzadeh - *Environmental Health Department, Health Faculty, Kashan University of Medical Sciences, Kashan, Iran*

R Khodadadi - *Environmental Health Department, Health Faculty, Kashan University of Medical Sciences, Kashan, Iran*

L Iranshahi - *Environmental Health Department, Health Faculty, Kashan University of Medical Sciences, Kashan, Iran*

خلاصه مقاله:

Aims Regarding water as the main source of brio, not only its quantity and beingavailability is vital, but also its quality must be considered. This study was done inorder to determine the correlation between physicochemical BOD5 and microbiologicalparameters (FC and TC) in the Kashan University of Medical Sciences wastewater effluentof activated sludge system.**Materials & Methods** This descriptive study was done from July to October 2012 atKashan University of Medical Sciences. A total number of 130 samples were taken ondifferent days of the week over a 4-month period from effluent, randomly. All of thetaken samples were transferred to the water and wastewater laboratory for analysis,immediately. The SPSS 16 software and regression test for were used to analyze theobtained data, ultimately.**Findings** The mean value for BOD5 was $11.27 \pm 5.43 \text{ mg/L}$. The mean value of TC was $\log 1.62 \pm 0.32$. A linear correlation ($F=312.9$; $p<0.001$) was observed between TC and BOD5. The mean value of FC was $\log 1.42 \pm 0.31$. A linear correlation ($F=298.3$; $p<0.001$) was observed between FC and BOD5.**Conclusion** BOD5 parameter can be used .to predict the wastewater quality instead of TC and FC

کلمات کلیدی:

Biological Oxygen Demand Analysis, Water Pollution, Waste Water

لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/405629>



