

عنوان مقاله:

Recent progress on filtration technologies for the fabrication of effective COVID masks: A review

محل انتشار:

فصلنامه کامپوزیت ها و ترکیبات, دوره 3, شماره 9 (سال: 1400)

تعداد صفحات اصل مقاله: 12

نویسندگان:

Rupinder Singh - *Department of Mechanical Engineering, UIE, Chandigarh University, Mohali, Punjab, India*

Zahra Rabiei Dolatabadi - *Anatomical Sciences Department, Afzalipour School of Medicine, Kerman University of Medical Sciences, Kerman, Iran*

Nalini Tripathi - *Scientist-C, Department of Community Medicine, VMMC & Safdarjung Hospital, New Delhi, India*

۱۱۰۰۲۹

Shamim Mukhtar - *College of Earth & Environmental Sciences, University of the Punjab, Lahore, Pakistan*

Dhastagir Sultan Sheirff - *American University of Sovereign Nations (AUSN), Los Angeles, USA*

Fernando G Morais - *Institute of Physics, University of São Paulo, Rua do Matão ۱۳۷۱, CEP ۰۵۵۰۸-۰۹۰, São Paulo, Brazil*

خلاصه مقاله:

In the current pandemic COVID-۱۹, which started in late ۲۰۱۹, humans throughout the globe are living in a situation, where all aspects of their lives either social, economic, or emotional have been affected. To inhibit the COVID-۱۹ spread, using face masks in addition to social distancing and hand sanitation is suggested. In this survey, the idea of injecting natural agents that are biologically active into textile nanofibers is presented. Furthermore, we present recent trends which, affect the filtration efficiency of mask material. There is a wide variety of electro spinners on the market, which are easy to consume, secure, battery-powered, and handy that can be utilized to achieve the electrospun nanofiber mattresses without difficulty. The appropriate electrospun filter mats can be applied in the fully made mask. Choosing the right voltage, the right concentration, and the space in the middle of the syringe needle and the holding gatherer is of significant importance for the synthesis of uniform nanofibers.

کلمات کلیدی:

COVID-۱۹, Facemasks, Filtration, Electrospinning, Nanofiber-Based, Filter Media

لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/1501173>



